# FINANCIAL ACCESS TO HEALTH SERVICES

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#### Introduction

Financial issues are of paramount importance in any discussion of U.S. adolescents' access to health services. It is well established that health insurance coverage and ability to pay may determine when—or even whether-a person in this country seeks medical services (47,60,65). It has also been shown that while individuals in households with incomes below the poverty level have significantly fewer physician contacts than others in the same state of health, Medicaid coverage can help mitigate the effects of poverty on access to care (55).

This chapter explores the health insurance status of U.S. adolescents and addresses the following questions:

- How many adolescents are without health coverage and why are some adolescents insured and others not?
- Has the number of uninsured adolescents changed over time? If so, why has this change occurred?
- What are the benefits of private health insurance particularly for adolescent health needs?
- Who is eligible for Medicaid and what coverage does Medicaid provide?
- How many adolescents would be affected by three potential approaches to reducing the number of uninsured: a mandate that employers provide health insurance to their workers (and their dependents), an expansion of the Medicaid program, or a combination of the two?

#### Adolescents Without Health Insurance

# How Many Adolescents Lack Health Insurance and Who Are They?

In 1988, about 4.6 million U.S. adolescents ages 10 through 18—15 percent overall-had no public or private health coverage. The percentage of uninsured U.S. adolescents rose nearly 5 percent from the previous year, paralleling an overall increase in the Nation's nonelderly population without health insurance. The decline in coverage among adolescents and nonelderly adults in 1988 primarily results from a drop in the percentage of the population with private health insurance, particularly among those with coverage provided by small businesses employing fewer than 100 employees. U.S. adolescents who have health insurance are more than twice as likely as 25- to 54-year-olds to be covered by Medicaid.

According to data from the Current Population Survey, there was a 25-percent increase in the percentage of adolescents without health insurance between 1979 and 1986 (see figure 16-1). Trends in adolescents' health insurance status from 1979 through 1986 are briefly discussed in box 16-A. (In 1988, the health insurance section of the Current Population Survey questionnaire was modified substantially; therefore survey data *from* 1979 through 1986 cannot be compared with more recent statistics.)

#### Sociodemographic Characteristics of Uninsured Adolescents

Ninety-four percent of U.S. adolescents ages 10 to 18 live with their parents. Eleven percent of U.S. adolescents live with parents who do not have health insurance (see figure 16-2), and 63 percent of

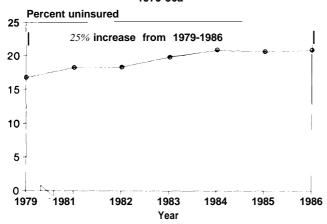
<sup>1</sup>Data for this analysis come from Current Population Surveys fielded in 1980 to 1989 by the U.S. Bureau of the Census (77). Each March, a supplement to the survey asks a variety of questions about work history and income during the previous year, and includes a set of health insurance questions. Responses to these questions are the basis for the analyses presented in this section. For a more in-depth analysis of these issues, see the July 1989 OTA background paper prepared by R. Kronick, Adolescent Health Insurance Status: Analyses of Trends in Coverage and Preliminary Estimates of the Effects of an Employer Mandate and Medicaid Expansion (44).

<sup>&</sup>lt;sup>2</sup>Estimates on the number of adolescents without health insurance were developed by R. Kronick for OTA and are based on U.S. Census Bureau's Current Population Survey data (44,45).

<sup>&</sup>lt;sup>3</sup>The individuals at greatest risk for being uninsured are 19- to 24-year-olds (44).

<sup>&</sup>lt;sup>4</sup>This figure includes adolescents living with two parents (70 percent), adolescents living with their mother only (2 1 percent), and adolescents living with their father only (3 percent) (44). Adolescents living with two parents do not necessarily live with their biological parents.

Figure 16-1—Trends in the Percentage of U.S. Adolescents Ages 10 to 18 Without Health Insurance, 1979-86a



a<sub>In</sub>1988 the Current Population Study questionnaire was modified substantially; therefore, survey data from 1979 through 1986 cannot be compared with more current data.

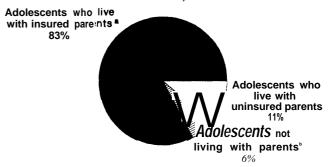
SOURCE: R. Kronick, Adolescent Health Insurance Status: Analyses of Trends in Coverage and Preliminary Estimates of the Effects of an Employer Mandate and Medicaid Expansion—Background Paper (Background Paper for OTA's Project on Adolescent Health), prepared under contract to the Carnegie Council on Adolescent Development and Carnegie Council of New York, for the Office of Technology Assessment, U.S. Congress, OTA-BP-H-56 (Washington, DC: U.S. Government Printing Office, July 1969).

uninsured adolescents live with parents who are also uninsured (see figure 16-3). To a large extent, then, the problem of uninsured adolescents is related to the problem of uninsured parents.

Family income is the most important determinant of health insurance status for all age groups. Those who are poor, regardless of other factors, are the most likely to be uninsured. Adolescents in poor or near-poor families are much more likely to lack health insurance than others; one-third of them are without any coverage whatsoever (see table 16-1). In contrast, only 14 percent of adolescents in families with income at between 150 and 299 percent of the Federal poverty level and 4 percent of adolescents in families at 300 percent of poverty or above are uninsured.

Despite the strong relationship between poverty and the likelihood of being uninsured, it is by no means true that all the uninsured adolescents are poor. About two-thirds of uninsured adolescents live in families with incomes above the Federal poverty

Figure 16-2—Percentages of U.S. Adolescents Who Live With Insured Parents, Uninsured Parents, or No Parents, 1988

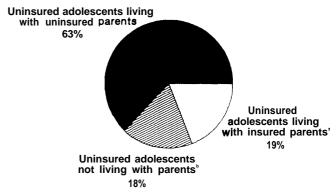


<sup>a</sup>This figure refers to the health insurance status of household head unless only the spouse had employment-based health coverage.

bThis category includes adolescents not living with their parents and married adolescents living with their parents.

SOURCE: R. Kronick, Adjunct Professor, University of California, San Diego, CA, calculations based on U.S. Department of Commerce, Bureau of the Census, March 1989 Current Population Survey public use files, 1990.

Figure 16-3--Distribution of Uninsured Adolescents, by Parent's Health Insurance Status, 1988°



aRefers t. th health insurance status of household head unless only the spouse had employment-based health coverage.

bThis category includes adolescents not living with their parents and married adolescents living with their parents.

SOURCE: R. Kronick, Adjunct Professor, University of California, San Diego, CA, calculations based on U.S. Department of Commerce, Bureau of the Census, March 1989 Current Population Survey public use files, 1990.

level: 33 percent of uninsured adolescents live in families with incomes between 100 and 199 percent of the Federal poverty level, and 29 percent live in families with incomes at 200 percent of poverty or above. <sup>67</sup>

Several demographic characteristics have fairly strong relationships with health insurance status

<sup>5</sup>*Poor* families are those with incomes below 100 percent of the Federal poverty level, and *near-poor* families are those with incomes between 100 and *149* percent of the Federal poverty level.

<sup>&</sup>lt;sup>6</sup>Percentages do not total 100 percent owing to rounding.

<sup>&</sup>lt;sup>7</sup>The Federal poverty level for a family of was \$10,560 in January 1990.

#### Box 16-A—Analysis of Trends in Adolescent Health Insurance Status, 1979-86

From 1979 through 1986, the percentage of American adolescents without any health insurance increased by 25 percent. In the early 1980s, the rise in the percentage of uninsured adolescents was strongly associated with increased poverty and a decline in Medicaid coverage of the poor and near-poor. Later, in the mid-1980s, as the country recovered from recession, these trends improved slightly; however, the percentage of the adolescent population at each income level with private insurance declined substantially. For a combination of reasons (including a decline in the absolute number of 10- to 18-year-olds from 1979 to 1986), there was no change in the aggregate number of uninsured adolescents.

The decline in Medicaid coverage of adolescents from 1979 to 1986 was greatest among adolescents living in or near poverty. This decline was due in part to Federal regulations, issued under the 1981 Omnibus Budget Reconciliation Act of 1981 (Public Law 97-35), that limited the working poor's eligibility for Aid to Families With Dependent Children (AFDC) and Medicaid benefits. Also, because many States did not adjust the income eligibility standards for inflation, the income threshold as a percentage of the Federal poverty level deteriorated substantially. In 1979,48 percent of adolescents living in families with incomes between 50 to 99 percent of the poverty level had Medicaid coverage. By 1983, this figure had dropped to 38 percent, but it rebounded slightly to 42 percent in 1984 and 1986. Meanwhile, almost half of the adolescents in families with incomes from 100 to 149 percent of poverty who were in the Medicaid program in 1979 had lost coverage by 1982.

The decline in private health insurance coverage of adolescents from 1979 to 1986 was also most significant among the poor. In 1979, 17 percent of adolescents in families with incomes below 50 percent of the poverty level were covered by some form of private insurance; by 1986, only 11 percent were enrolled in a private health plan. Adolescents in families with incomes between 50 to 99 percent of poverty experienced a similar trend; the proportion with private health coverage dropped from 27 to 22 percent during the same time period.

Eighteen percent of the overall rise in the percentage of U.S. adolescents without health coverage from 1979 through 1986 was due to a fall in the coverage rate among adolescents not living with any parent. In 1979,61 percent of these adolescents were uninsured by 1986, the figure had increased to 74 percent.

A principal reason why more U.S. adolescents were uninsured in 1986 than in 1979 is simply that more adolescents lived with uninsured parents in 1986 than in 1979. During the period 1979-86, the percentage of adolescents who lived with uninsured parents increased from 8.8 to 10.5 percent, accounting for 37 percent of the overall 1979-86 increase in the percentage of uninsured adolescents. At the same time, the percentage of uninsured adolescents who lived with uninsured parents also rose, increasing from 92 to 96 percent (contributing an additional 10 percent to the overall climb in the uninsured). The percentage of adolescents who obtained health insurance from their own jobs declined precipitously.

1 The method used here to determine family income and poverty status differs slightly from the calculations used by the U.S. Bureau of the Census and affects those adolescents who live in a "subfamily," for example, an unmarried Ill-year-old female and her child who reside with the 18-year-old's parents. The Census method for determining family income would consider this family unit as a 4-person family and count the 18-year-old's income as well as her parents' in calculating total family income and poverty Status. The results reported here treated the 18-year-old as a separate family unit and did not count her parents' income in determining total family income. Consequently, the above estimates of the percentage of adolescents living in poverty are slightly higher than Census Bureau reports. However, the differences are minor and do not affect any substantive conclusions. Note that the Census methodology is used for an other poverty and family income estimates present m this chanter

SOURCE: R. Kronick, Adolescent Health Insurance Status: Analyses of Trends in Coverage and Preliminary Estimates of the Effects of an Employer Mandate and Medicaid Expansion—Background Paper (Background Paper for OTA's Project on Adolescent Health), prepared under contract to the Carnegie Council on Adolescent Development and Carnegie Corporation of New York, for the Office of Technology Assessment, Us. Congress, OTA-BP-H-56 (Washington, DC: Us. Government Printing Office, July 1989)s

independent of family income. These include Hispanic ethnicity, parent's education, parental self-employment, and region. Hispanic adolescents are much more likely than others to be uninsured, regardless of family income. This may be because Hispanics are more likely than others to work in agriculture and domestic service, where coverage rates are historically low. If Hispanic families living

in poverty are more likely than others to include both husband 'and wife, they will be less likely to be eligible for Medicaid. In addition, Hispanic adolescents who are undocumented immigrants are not eligible for Medicaid.

. Although black adolescents are much more likely than whites to live in or near poverty and

Table 16-1—Health Insurance Status of U.S. Adolescents Ages 10 to 18,
by Family Income, 1988

		Health insurance status					
Family income as a percent	Proportion of all adolescents	Lack health	Have	health insu	rance:		
of the Federal poverty level*	at the specified poverty level	insurance coverage	Private only	Medicaid only	Other	Total	
Less than 50 percent	7.8%	29.8°/o°	1 3.7%	51 .l%	5.3%	100.00/0	
50 to 99 percent	9.1	35.8 <sup>d</sup>	21.4	36.4	6.5	100.0	
100 to 149 percent	9.8	30.9	47.9	13.3	7.9	100.0	
150 to 199 percent	9.7	19.8	68.6	5.0	6.6	100.0	
200 to 299 percent		11.9	79.4	1.2	7.4	100.0	
300 percent and above		4.6	0.6	0.6	5.4	100.0	
	100.0%						

a<sub>In 1988</sub>, the Federal poverty level was \$9,431 for a family of three.

SOURCE: R. Kronick, Adjunct Professor, University of California, San Diego, CA, calculations baaed on U.S.

Department of Commerce, Bureau of the Census, March 1989 Current Population Survey public use files, 1990.

to be uninsured, the correlation between race and lack of health insurance coverage almost disappears when family income is taken into account.

- At each income level, adolescents whose parents have little formal education are much more likely to be uninsured than adolescents whose parents have had more education.
- Among adolescents in middle- and upperincome families, those whose parents are selfemployed are much more likely than others to be uninsured.
- Adolescent children of parents who work for small firms (under 25 employees) are more likely to be uninsured than dependents of other working parents.
- More than 1 of 5 Southern and Western adolescents are uninsured, while less than 1 of 10 Northeastern and Midwestern adolescents are without coverage.

Reliable data on adolescents' health insurance status by State are not available, but estimates of the overall nonelderly uninsured population in each State are good indicators of the percentage of adolescents without coverage (see figure 16-4; table 16-2). The percentage of nonelderly people who lack health insurance among the States ranges from about 8 percent in Rhode Island to more than 26 percent in New Mexico.<sup>8</sup>

Further analysis shows that regional variations in health insurance coverage among adolescents are due primarily to differences in income-specific rates of Medicaid and private health coverage. In the South, it appears that more stringent Medicaid income eligibility requirements are key to the greater percentage of uninsured adolescents. If income limits for Medicaid eligibility were as high in the South as in the North, the percentage of Southern adolescents without health coverage would drop by approximately 25 percent. In the West, lower rates of private coverage appear to be the most critical factor, although lower Medicaid coverage rates are important as well. If income-specific rates of private insurance coverage were as high in the West as in the North, the percentage of uninsured Western adolescents would be reduced by about 19

bThere were 30.8 million adolescents, ages 10 to 18, in 1988.

COther includes the Civilian Health and Medical Program of the United States Medicare, or a combination of public and private coverage.

private coverage.

dOverall, one-third of adolescents living in poverty had no health insurance.

<sup>\*</sup>These estimates were drawn from combined March 1988 and March 1989 Current Population Surveys and were calculated by Richard Kronick for OTA. Current Population Surveys' sampling precludes developing reliable estimate-s for the adolescent population alone,

<sup>&</sup>lt;sup>9</sup>The U.S. census regions are defined as follows: *North* includes Connecticut, Maine, Massachusetts, New Hampshire, New Jersey, New York, Pennsylvania, Rhode Island, and Vermont; *Midwest* includes Illinois, Indiana, Iowa, Kansas, Michigan, Minnesota, Missouri, Nebraska, North Dakota, Ohio, South Dakota, and Wisconsin; *South* includes Ala-Arkansas, Delaware, Florida, Georgia, Kentucky, Louisiana, Maryland, Mississippi, North Carolina, Oklahoma, South Carolina. Tennessee, Texas, Virginia, and West Virginia; and West includes Alaska, Arizona, California, Colorado, Hawaii, Idaho, Montana, Nevada, New Mexico, Oregon, Utah, Washington, and Wyoming (76).

loIt is important to note that this analysisexamined the effects of applying Medicaid income standards used in Northern States to Southern States but did not consider how the cost of living differs between the two regions. Obviously, an income of \$1,500 in Mississippi for example, would not have the same value in New York.

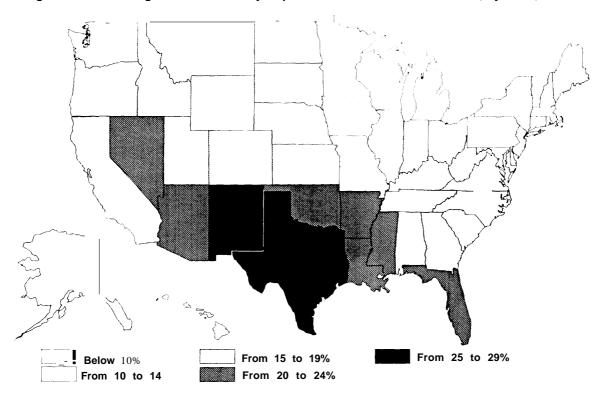


Figure 16-4-Percentage of the Nonelderly Population Without Health Insurance, by State, 1987-88°

aRates are rounded to the nearest whole number. See table 16-2 for actual data, standard errors, and confidence internals.

SOURCE: R. Kronick, Adjunct Professor, University of California, San Diego, CA, calculations based on U.S. Department of Commerce, Bureau of the Census, March 1988 and March 1989 Current Population Survey public use files, 1990.

percent. These results make clear that public policies designed to expand health insurance coverage--e.g., mandating employers to provide coverage or expanding Medicaid-would have markedly different regional effects. The effects in Western and Southern States would be quite different from the effects in the North.

### Adolescents With Private Health Insurance or Medicaid: What Coverage Provides

Adolescents with health insurance coverage, whether private or public, do not always have benefits for some of the health services they need. This section describes the benefits of both private health insurance and Medicaid. The emphasis is on those services most likely to be used or needed by adolescents, such as mental health care, substance abuse treatment, maternity care and related services, preventive services, services provided by nonphysician providers, dental care, and others.<sup>11</sup>

An important caveat to this review relates to the question of confidentiality in adolescent health care. Even if appropriate benefits are available, adolescents who are concerned about confidentiality may be reluctant to seek care from providers if their private health plan requires parents to submit a claim for reimbursement (as most do). An adolescent with Medicaid coverage who must present a parent's Medicaid card to gain access to care faces the same dilemma. 1 2 1 3

<sup>11</sup> This section should not be taken as an endorsement of specific services. Much of the remainder of OTA's adolescent health Report is devoted to analyzing the effectiveness of various services. See especially Vol. II of this Report.

<sup>12</sup>In five States (i.e., California, Kansas, Maryland, New Hampshire, and New York), adolescents who are dependents living in families that receive Medicaid are given their own Medicaid card.

<sup>&</sup>lt;sup>13</sup>For further discussion of confidentiality issues in adolescent health care, see ch. 17, "Consent and Confidentiality in Adolescent Health Care Decisionmaking," in this volume.

Table 16-2--Health Insurance Status of the Nonelderly Population, by State, 1987-88°

			Health insurance stat	us	
	Lack health insurance	95 percent	H	lave health insurance	
	coverage (in rank order)	Confidence intervals	Private only	Medicaid only	Other°
Rhode Island ,	8.1%(0.010)	6.1-10.0%	79.3%(0.015)	5.8% (0.008)	6.8% (0.009)
Massachusetts	8.4 (0.005)	7.4-9.3	79.7 (0.007)	6.8 (0.004)	5.1 (0,004)
Visconsin	8.7 (0.009)	6.9-10.4	82.4 (0.012)	5.4 (0.007-)	3.6 (0.006)
Minnesota	8.8 (0.009)	6.9-10.6	79.9 (0.013)	7.6 (0.009)	3.7 (0.006)
owa	8.8 (0.009)	7.0-10.6	82.3 (0.012)	5.7 (0.007)	3.2 (0006)
Michigan	8.8 (0.005)	7.9-9.8	75.9 (0.007)	8.8 (0.005)	6.5 (0.004)
Pennsylvania	8.9 (0.005)	8.0-9.9	80.4 (0.007)	61 (0.004)	4.6 (0.004)
Connecticut	9.0 (0.010)	7.0-11.0	84.2 (0.013)	3.0 (0.006)	3.7 (0007)
North Dakota	9.7 (0,009)	8.0-11.5	79.1 (0.012)	2.5 (0.005)	8.7 (0.009)
New Jersey	9.8 (0.005)	8.8-10.8	82.1 (0.007)	4.9 (0.004)	3.2 (0.003)
	10.1 (0,005)	9.1-11.1	76.9 (0.007)	ì _í	
Ohio	10.1 (0,003)	8.3-12.3	70.9 (0.007)	8.0 (0.005) 3.4 (0.006)	5.0 (0.004) 16.3 (0.012)
Maryland	10.6 (0.010)	8.7-12.5	74.7 (0.014)	6.5 (0.008)	16.3 (0.012) 8.2 (0.009)
Maine	10.6 (0.010)	8.6-12.7	73.2 (0.015)	8.6 (0.009)	7.6 (0.009)
Delaware	11.1 (0.011)	9.0-13.2	76.3 (0.015)	5.6 (0.008)	7.0 (0.009)
	` ,		` ,	ì _í	,
Kansas	11.1 (0.010)	9.2-13.1	80.3 (0.013)	2.6 (0.005)	6.0 (0.008)
Illinois	11.3 (0.006)	10.2-12.4	75.1 (0.008)	9.1 (0.005)	4.6 (0004)
Vermont	11.5 (0.011)	9.3-13.8	78.1 (0.015)	4.7 (0.008)	5.7 (0.008)
Nebraska	11.6 (0.010)	9.7-13.6	75.6 (0.013)	4.9 (0.007)	7.9 (0.008)
New Hampshire	12.1 (0.012)	9.8-14.3	81.6 (0.014)	1.0 (0.004)	5.4 (0.008)
/irginia	12.4 (0.010)	10.5-14.3	70.9 (0.013)	5.2 (0.006)	11.6 (0.009)
Missouri	12.6 (0.011)	10.5-14.7	76.0 (0,014)	6.8 (0.008)	4.5 (0,007)
New York	12.8 (0,005)	11.8-13.8	71.3 (0.007)	11.0 (0.005)	5.0 (0003)
Jtah	13.3 (0.011)	11.2-15.3	78.8 (0.013)	3.6 (0.006)	4.3 (0.006)
Washington	13,3 (0.011)	11.1-15.5	72.9 (0.015)	6.1 (0.008)	7.7 (0.009)
South Carolina	13.9 (0.011)	18.8-15.9	71.0 (0.014)	6.6 (0.008)	8.6 (0.009)
ndiana	13.9 (0.011)	11.8-16.0	77.2 (0.013)	3.6 (0.006)	5.2 (0.007)
Nyoming	14.1 (0.013)	11.6-16.7	75.1 (0.016)	3.8 (0.007)	6.9 (0.010)
North Carolina	14.9 (0.006)	13.7-16.1	73.3 (0.008)	4,2 (0.003)	7.7 (0005)
South Dakota	15.4 (0.010)	13.4-17.4	73.3 (0.013)	4.4 (0.006)	6.9 (0.007)
Colorado	15.5 (0.013)	13.0-17.9	70.9 (0.016)	5.2 (0.008)	8.5 (0.010)
West Virginia	15.9 (0.013)	13.4-18.4	65.9 (0.016)	11.4 (0.011)	6.8 (0.009)
Tennessee	16.0 (0.012)	13.6-18.3	69.3 (0.015)	8.3 (0.009)	6.5 (0.008)
Georgia	16.5 (0.011)	14.3-18.8	68.5 (0.014)	6.9 (0.008)	8.1 (0.008)
Oregon	17.1 (0.014)	14.4-19,8	72.1 (0.016)	5.9 (0.009)	4.9 (0.008)
Montana	17.2 (0.012)	14.8-19.7	67.5 (0.015)	7.6 (0.009)	7.7 (0.009)
daho	17.3 (0.012)	14.9-19.6	72.9 (0.014)	3.7 (0.006)	6.1 (0.008)
Kentucky	17.5 (0.012)	15.0-20.0	67.9 (0.016)	7.9 (0.009)	6.7 (0.009)
District of Columbia	18,4 (0.014)	15.7-21.1	66.3 (0.017)	10.4 (0.011)	4.9 (0,008)
Alaska	18.5 (0.012)	16.1-20.9	56.6 (0.016)	8.3 (0.009)	16.6 (0.012)
	18.8 (0.014)	16.2-21.5	` '	` ,	` ,
Alabama			66.6 (0.016)	8.5 (0.010)	
California	19.4 (0.006)	18.3-20,6	64.2 (0.007)	9.2 (0.004)	7.1 (0.004)
Vevada	20.3 (0.014) 20.7 (0.013)	17.5-23.1 18.2-23.3	68.4 (0.016)	2.9 (0.006) 11.4 (0.010)	8.4 (0.010)
Arizona	20.7 (0.013) 20.9 (0.014)	18.3-23.6	59.2 (0.016) 67.8 (0.016)	11.4 (0.010) 3.1 (0006)	8.7 (0.009) 8.2 (0009)
	` ,		` ,	, ,	` ,
Florida	21.2 (0.007)	19.9-22.5	65.1 (0.008)	5.1 (0.004)	8.6 (0.005)
Oklahoma	21.9 (0.013) 22.3 (0.014)	19.3-24.5 19.6-25.0	63.0 (0.016) 59.5 (0.016)	6.0 (0.008)	9.1 (0009) 5.6 (0.008)
Louisiana	22.6 (0.014)	20.0-25.3	59.5 (0.016) 61.2 (0.016)	12.6 (0.011)	, ,
Arkansas	24.8 (0.014)	20.0-25.3 23.4-26.0	62.6 (0.008)	9.6 (0.010) 5.4 (0.004)	6.6 (0.008) 7.2 (0004)
	26.3 (0.014)	23.6-28.9	55.8 (0.015)	7.0 (0.004)	11.0 (0010)
New Mexico	. ,	23.0-20.3	33.0 (0.013)	7.0 (0.000)	11.0 (0010)

aResults in parentheses are standard errors.

bConfidence intervals for estimates of the proportion of the State population without health insurance.

COther includes the Civilian Health and Medical Program of the United States, Medicare, or any combination of public and private coverage.

SOURCE: R. Kronick, Adjunct Professor University of California, San Diego, CA, calculations based on U.S. Department of Commerce, Bureau of the Census, March 1988 and 1989 Current Population Survey public use files, 1990.

#### Private Health Insurance Coverage<sup>14</sup>

About 21.7 million U.S. adolescents ages 10 through 18 (70 percent) are covered by private health insurance (44). What follows is a review of recent trends in private health insurance coverage, the limitations of existing data sources on current health benefits, the general nature of health insurance coverage, and an analysis of benefits provided by private health plans.

#### Trends in Private Health Insurance Coverage

The nature of private health insurance coverage changed dramatically in the 1980s, and the 1990s promise more change. Taking note of some of these trends is important because they have a direct effect on what private health benefits provide. One striking development has been the growth of self-insurance among the Nation's employers, largely due to the passage of the Employee Retirement and Income Security Act (ERISA) (Public Law 92-104) in 1974. ERISA freed self-insured plans from State health insurance regulations including State premium taxes and State mandates to insurers to provide minimum coverage for specific services, categories of providers, diseases, or individuals who might have difficulty in obtaining coverage (13,27). There is some evidence that many employers have chosen to self-insure to escape the costs and administrative burden of conforming with State mandates (28). It is not clear whether mandates are the principal cause of the shift to self-insurance, but it is certain that the potential pool of health plans that might be affected by mandates has greatly diminished. From the time of ERISA's enactment in 1974 to 1987, the percentage of employees covered by a self-insured employer-sponsored conventional health plan rose from about 5 percent to nearly 60 percent (26).

Since the 1970s, many States have enacted mandates expanding the health insurance benefits provided by traditional commercial health insurers and Blue Cross and Blue Shield plans .17 Between

1978 and 1988, the number of State-mandated benefits grew from 343 to 732 (28). There is now growing concern that the onus of providing ever more comprehensive coverage has contributed to growth in the population of the uninsured, particularly among workers (and their dependents) in small businesses (42). This concern is reflected in the growing number of States that have passed laws requiring evaluation of the social and financial impact of mandated health insurance benefits (39).

The way dependents are covered by employmentbased health plans is changing, and there is reason to be concerned that increasingly higher premium costs for family coverage combined with greater costsharing for dependent coverage may lead to more uninsured adolescents and other family dependents. About 47 cents of every dollar of health care expense incurred by privately insured employees is reported to be for the treatment of dependents (57). The average monthly cost of family health coverage exceeded \$260 in 1989 (parents paid an average share of \$55 to \$81 per month for the entire family depending on the type of plan) and was approximately 18 percent higher than the previous year (36). The ever-increasing cost of health benefits, in general, and dependent care, in particular, has recently moved employers to require parents to pay a larger portion of their health insurance premiums and to share more of the costs for their dependents (9,15,67). From 1980 to 1988, the percentage of participants, in medium and large private group health plans, required to contribute for family coverage increased from 46 to 63 percent (15). The U.S. General Accounting Office, in a 1988 investigation of the effects of cost increases on health coverage, found that some firms provide little or no contribution to dependent coverage' and "for lower-income families, the high cost of family coverage can lead to decisions to forgo dependent coverage' '(66). Meanwhile, some employers are planning to restrict or exclude dependent coverage, especially for mental health or substance abuse,

<sup>14</sup>In this discussion, the terms private health insurance, private health plans, and group health plans are often used interchangeably to refer to employment-based group plans regardless of sponsorship or financing arrangement (i.e., conventional plans, self-insured plans, health maintenance organizations, etc).

<sup>15</sup>A self-insured plan is a health benefit plan in which the financial risk for provided medical services is assumed by the employer Or sponsor.

<sup>16</sup>A conventional health plan is a traditional indemnity or fee-for-service health plan that typically reimburses the health provider on a "reasonable and customary" basis or as billed.

 $<sup>^{17}</sup>$ It is important to be aware that health coverage provided by self-insured employers, health maintenance organizations (HMOs), and individual family plans are usually not affected by State mandates. HMOs are often regulated independently from indemnity carriers and, as noted, self-insured plans are exempt from State insurance regulations. HMOs may be subject to their own mandated benefit rules.

while retaining the benefits for their own employees (9.57).

Equally important has been the rapid growth in managed health care. In 1987, more than 60 percent of Americans with group health insurance coverage were enrolled in a health maintenance organization (HMO), preferred provider organization (PPO), or a managed fee-for-service health care plan (27).<sup>18</sup> Patients in managed health care plans do not have open access to physicians or hospitals and usually must obtain prior approval before admission to a hospital. HMOs and PPOs may also require that the health provider's treatment plan be reviewed to ensure that the hospital care is necessary. Patients who do not follow the HMO or PPO guidelines may face larger out-of-pocket costs or be denied payment altogether (13). On the other hand, case management may allow for more flexibility in the care of high-cost illnesses. Some managed health care plans contain "individual benefits management" programs that allow for payment of otherwise uncovered benefits, such as home- and community-based services, in order to avoid more costly covered services (24).

#### Limitations of Data on Private Health Insurance

Comprehensive national data on benefit coverage are fairly limited. Survey data are the principal source of information on benefit coverage and have several key limitations. <sup>19</sup> Surveys of benefits are often confined to health plans provided by medium and large private employers and thus do not reflect coverage offered by small employers and nongroup family plans that are almost always less comprehensive and generous than others (41). <sup>20</sup> To date there

have been no surveys of private health benefits that have focused on adolescent needs in particular. Because available surveys examine benefits in general and do not report whether equivalent dependent coverage is available, this review must assume that survey findings apply to both the subscriber and his or her dependents. A notable exception, however, is maternity care, which often is provided only to the policyholder and spouse.<sup>21</sup>

#### What Private Health Insurance Coverage Provides

Group health plans have traditionally served as protection against the major costs of hospital and physician-provided services for the care of acute illness. Most Americans who participate in an *employment-based* group health plan have benefits for a wide range of hospital and medical services particularly if the subscriber works for a medium or large employer. Health benefits surveys by the Bureau of Labor Statistics and the Health Insurance Association of America show that 90 percent or more of employees with employer-based group health coverage have health benefits for hospital room and board, surgical services, physician visits (i.e., for the diagnosis, evaluation, and treatment of an illness or injury), diagnostic X-ray and laboratory procedures, outpatient prescription drugs, mental health, and substance abuse (see table 16-3). Other medical care services, such as routine physical exams, preventive diagnostic procedures (e.g., pap smears), vision, hearing, dental, home health, and extended care are less likely to be covered (see table 16-3) (31,32,84).

Most conventional private health plans require annual deductibles and coinsurance payments before

<sup>&</sup>lt;sup>18</sup>Healthmaintenance organizations (HMOs) are entities that act as both insurer and provider of comprehensive but specified medical services in return for prospective, periodic per capita payments. Preferred provider plans (PPOs) are groups of health providers that contract with employers, insurers, third-party administrators, or other sponsoring groups to provide services on a discounted fee-for-service basis; health plan participants who use these providers pay lower deductible and coinsurance payments. A managed fee-for-service health care plan is a conventional health plan which requires patients to obtain prior approval before admission to a hospital and prospective utilization review.

<sup>&</sup>lt;sup>19</sup>Two surveys serve <sub>as</sub> the principal data sources for this discussion. The most representative of employment-based group coverage is the Health Insurance Association Of America's 1988 survey of 1,665 randomly selected employers who offer health insurance to their employees (32). This sample represents an estimated 84 percent of those who receive employment-based health insurance from small, medium, and large firms in the private and public sectors. Interviews were conducted by telephone. Federal employees and individuals who obtain their own insurance were not included (32). Another survey, although not representative of small fins, is the U.S. Department of Labor annual survey of employee benefits in medium and large firms that is conducted by the Bureau of Labor Statistics (84,85). In 1988, the Bureau of Labor Statistics survey included a stratified sample of 1,922 private, nonfarm establishments employing at least 100 employees (84). Data for the survey were drawn from health plan documents collected by Bureau field representatives and analyzed by Bureau staff in Washington (84).

<sup>&</sup>lt;sup>20</sup>Medium and large firms are generally those with at least 100 or 250 employees, depending upon the industry, and represent approximately 49 percent of the Nation's work force (8). Non(group family plans refer to health insurance plans that are purchased on an individual basis and are not obtained through an employment or other membership group contract. Approximately 10 to 12 percent of individuals covered by private health insurance are in a nongroup individual or family plan.

<sup>&</sup>lt;sup>21</sup>Many privately insured adolescents are not eligible for coverage, in part because of a "loophole" in the Pregnancy Discrimination Act of 1978 (Public Law 95-555). See "Maternity Care and Related Services," below.

Table 16-3-Two Surveys' Estimates of the Percentage of Participants in Employment-Based Group Health Insurance With Some Coverage for Selected Benefits, 1988<sup>a</sup>

Category of medical care	Survey	Estimate of percentage with coverage	Category of medical care	Survey <sup>b</sup>	Estimate of percentage with coverage
Diagnostic X-ray and laboratory	BLS	980/0	Prescription drugs?	HIAA	93%
Hospital room and board	BLS	98	Treatment for substance abuse'	HIAA	90
Surgical services			Home health care®	HIAA	86
Inpatient	BLS	98	Extended care facility	HIAA	79
Outpatient	BLS	98	Preventive diagnostic procedures	HIAA	69
Physician visits			General dental care	HIAA	37
In hospital	BLS	98	Vision <sup>e</sup>	BLS	35
In office	BLS	98	Immunization and inoculation	BLS	29
Mental health			Routine physical exams	BLS	28
Outpatient care	HIAA	95	Hearing	HIAA	27
Hospital care	HIAA	98	Orthodontia °	HIAA	27

a Note that employment-based group health coverage is the most comprehensive form of health insurance. Details on the scope of coverage offered by

out-of-pocket expenses, and a separate consyment or deductible.

Benefits are typically subject t. Ilimitations such as scheduled dollar allowance and deductibles, copayments, and coinsurance requirements that are separate from other covered benefits.

Substance abuse benefits are almost always more limited than for "physical" health problems. Coverage is usually subject to separate limitations including a limited allowance of hospital days for detoxification or rehabilitation, a restricted number of outpatient visits, a maximum ceiling on total dollars reimbursed, a higher coinsurance rate, no ceiling on out-of-pocket expenses, a separate copayment or deductible, and a separate lifetime maximum.

9Some plans provide this care only to a patient whowas previously hospitalized and is recovering without need of the extensive care provided by a general hospital. Does not include hospice care

SOURCE: Office of Technology Assessment, 1991.

100 employees (77).

any benefits are paid; although total out-of-pocket expenses are often capped at a maximum less than \$2,000 per year (32). Once the insured's covered expenses exceed that amount, the health plan pays for the full cost of any subsequent covered expenses. HMO coverage is prepaid and members do not pay deductibles or coinsurance although minimal outpatient visit copayments may be required.

Preventive Services--A number of preventive services are typically recommended for adolescents: routine physical examinations, immunizations, and certain diagnostic tests (e.g., hematocrit, urinalysis) and preventive procedures including pap smears and screening for sexually transmitted diseases for the sexually active (62). The likelihood that an adolescent has preventive benefits depends largely on whether he or she is enrolled in a conventional health plan or HMO. Whether in an HMO or not, if routine physical exams are a covered benefit, coverage may be limited to a periodicity schedule such as that recommended by the American Academy of Pediatrics. The 1988 Bureau of Labor Statistics survey found that only 28 percent of all participants in employer-sponsored group health plans were covered for routine physical exams, as compared with 99 percent of HMO members (84). Coverage rates for immunizations and inoculations also varied by the type of health plan: 29 percent for all participants in group health plans and 99 percent for HMO members (84).

Benefits for *preventive* diagnostic tests and procedures (e.g., pap smears, mammograms) are also related to the type of health plan and, in conventional health plans, may be linked to whether the insurer

nongroup family plans is very limited, although typically such plans are known to be less generous.

bEstimates are drawn from 1988 surveys conducted by either the Health Insurance Association of America (HIAA) or the Bureau of Labor Statistics (BLS). Data from the HIAA survey are provided when available as they are more representative of employment-based group coverage; the HIAA sample includes 1,665 randomly selected employers and reflects an estimated 84 percent of those who receive employment-based health insurance from small, medium, and large firms in the private and public sectors (30). The BLS survey includes a stratified sample of 1,922 private, nonfarm establishments employing at least

Charges incurred in the outpatient department of a hospital and outside of the hospital. dB<sub>ss</sub>fits for mentalhealth problems, including diagnosable mental disorders, almost always are more limited than for "physical" health problems. Benefits are often subject to one or more of the following restrictions that are separate from other medical coverage: a limited allowance of hospital days (e.g., 30 per lifetime) and/or number of outpatient visits, a maximum ceiling on total dollars reimbursed, a higher coinsurance rate (e.g., 50 percent), no ceiling on

<sup>22</sup>A deductible is a specific dollar amount, usually about \$400 per family, that must& paid before a health plan begins paying benefits. Coinsurance payments are a specified percentage, commonly 20 percent, that the insured must pay for each covered medical service up to an annual limit (e.g., \$1,500), after which the health plan pays 100 percent of covered benefits (36,70).

<sup>&</sup>lt;sup>23</sup>For a discussion of periodicity schedules for routine health assessments, see ch.15, "Major Issues Pertaining to the Delivery of Primary and Comprehensive Health Services to Adolescents, " in this volume.

views the procedure as *diagnostic*. Coverage may depend upon whether the physician "justifies" the procedure with a specific suspected diagnosis. Benefits for *diagnostic* laboratory tests are virtually universal among medium and large employers (83). In contrast, the Health Insurance Association of America survey of employer-sponsored group health insurance found more limited coverage of *preventive* diagnostic procedures; coverage was available in 61, 72, and 98 percent of conventional, PPO, and HMO plans respectively (32).

Mental Health Care—Although coverage of mental health services is often provided by employersponsored group health plans, the benefits for mental health problems, including diagnosable mental disorders, are almost always more limited than for the benefits of "physical" health problems (see table 16-4). While 98 percent of employees in group health plans provided by medium and large employers have some inpatient and outpatient mental health coverage, only 27 percent are covered for inpatient mental health as for other illnesses and only 3 percent have equivalent mental and physical health outpatient coverage (84). Mental health benefits are often subject to one or more of the following restrictions that are separate from other medical coverage: a limited allowance of hospital days (e.g., 30 per lifetime); a limited number of outpatient visits; a maximum ceiling on total dollars reimbursed; a lower coinsurance rate (e.g., 50 percent); no ceiling on out-of-pocket expenses; and a separate copayment or deductible.

These benefit restrictions clearly have a major impact on the use and overall cost of mental health services (25). In fact, the amount of mental health services and the settings in which they are provided is often determined largely by the extent of reimbursable services (38). More details on benefit limitations are described below.

Inpatient Care for Mental Health—Many mental health professionals report that inpatient mental health benefits significantly influence both hospital admissions and length of stay (49). Mental health inpatient stays are commonly limited to 30 or 60 days per year, compared with 120 or 365 days for other hospital stays (84). Among participants in employer-sponsored health plans with mental health coverage, 45 percent had separate limitations on the duration of a hospital stay for mental illness in 1988 (84).

Table 16-4-Coverage of Mental Health Care: Percent of Full-Time Participants in Plans With Coverage by Extent of Benefits, Medium and Large Firms, 1988

Coverage limitation	mental	Outpatient mental health care
With coverage	98%	980/o
Covered the same as other		
illnesses	27	3
Subject to separate limitations <sup>a</sup>	71	95
Limit on days or visits	45	36
Per year	36	35
Per lifetime	2	_
Coinsurance limit	8	62
50 percent	4	49
Other b	4	14
Ceiling on out-of-pocket expenses		
does not apply	13	43
Separate copayment or deductible		14
Not covered	2	2

aThe total is less than the sum of the individual items because many plans had more than one type of limitation on mental health coverage. bIncludes plans with reduced coinsurance other than 50 percent and plans where the rate of reimbursement varied during the treatment period,

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Employee

Benefits in Medium and Large Firms, Bulletin 2338 (Washington, DC: U.S. Government Printing Office, 1989).

There is some evidence that limiting the number of allowable mental health days may affect adolescents and adults differently. One study of the psychiatric claims of eight companies covered by the same insurance carrier found that, given any use of mental health services, children and adolescents were much more likely than adults to be inpatient users (38). They also had significantly longer average lengths of stay, were more likely to have very long lengths of stays, and had a greater chance of incurring a catastrophically expensive psychiatric claim (38). Whether existing mental health and substance abuse benefits, which were designed principally for adults, are appropriate for adolescents is not clear. In 1986, the Oregon Health Planning and Development Agency was required by statute to evaluate the effects of a 1983 State mandate to provide insurance coverage of mental health and chemical dependency treatment. The planning agency concluded that the minimum benefit levels established for adults were "wholly inadequate for children and adolescents" (59). The following year the Oregon legislature enacted a bill requiring separate, higher benefit levels for children and adolescents age 17 and younger (58).

Many observers are also concerned that mental health benefits in private health plans that favor inpatient over outpatient or community-based care have led to inappropriate hospitalizations and overutilization of inpatient services by some adolescents (29). One particularly in-depth look at this issue led the researcher to conclude in referring to State-mandated mental health benefits that "the policies of jurisdictions that seek to discourage insurance-carrier discrimination against persons suffering from mental health problems may, in fact, be perpetuating a pattern of financial incentives that is detrimental to the well-being of the population they seek to serve' (86).

Partial Hospitalization—Partial hospitalization, also known as day treatment, is an alternative to traditional inpatient and outpatient care that provides adolescents an alternative to hospitalization and a transitional level of mental health services after discharge from an inpatient psychiatric unit or residential treatment facility. It can be used for adolescents who no longer need 24-hour care but are not yet ready to reenter school (7). When partial hospitalization is available, it can help avoid institutional placement. In 1986, less than 11 percent of participants in employment-based health plans were covered for partial hospitalization (4).<sup>25</sup>

Outpatient Care for Mental Health--Coverage for outpatient mental health care may be limited in a variety of ways. For more than 60 percent of participants in health plans surveyed by the Bureau of Labor Statistics in 1988, reimbursement for outpatient mental health services may not exceed an annual dollar maximum (e.g., \$750 to \$1,000) and a coinsurance rate of 50 percent rather than the usual 20 percent per visit may be required. (The average charge for a visit to a psychiatrist was \$80 in 1986 (4).) Thirty-six percent of participants in employersponsored health plans surveyed by the Bureau of Labor Statistics have an annual visit limit (84); more than 84 percent with visit limits are allowed more than 30 visits each year (4). An annual 50-visit maximum is most common (70). Some plans also limit visit fees (4,70). Combinations of any of these restrictions are common. The most common effect of such constraints is to cap total mental health outpatient coverage at about \$2,000 a year (70).

Eligible Mental Health Providers—Many health plans may not cover mental health services that are provided by nonphysicians. One employer survey found that in 1987 only 15 percent of employers provided plans that covered the services of psychologists and psychiatric social workers in addition to psychiatrists (23). However, most plans accept claims filed by a psychiatrist for services provided by another mental health professional under his or her supervision (23).

Annual and Lifetime Maximums-Annual and lifetime ceilings on payment for mental health services are a common feature of many health plans. One survey found that, among employers who limited payment for outpatient care, the average reported lifetime outpatient payment maximum was \$20,000 (19). The Bureau of Labor Statistics survey found that in 1988 health plans sometimes imposed a lifetime maximum (e.g., \$50,000) on all mental health benefits (84). Lifetime limits on care for other types of illness are not only more rare but also significantly higher (e.g., \$1 million maximum reimbursement for all covered expenses) (32).

HMOs' Mental Health Coverage—It is not known how many adolescents belong to an HMO, but it is likely that many young people rely on HMOs for their mental health as well other health care needs. In 1989, there were 491 HMOs with a total enrollment of 34.7 million (30). Almost one out of five people who are covered by a group health plan belongs to an HMO (34). A 1985 HMO survey by Interstudy found that almost all HMOs (99 percent) provide some level of mental health coverage and about one-quarter offer additional coverage at extra cost (37).<sup>28</sup> As they are in most conventional health plans, mental health services in HMOs are strictly controlled. The most common annual benefit limits are 30 inpatient days and 20 outpatient visits (30) but some have 30 inpatient days per lifetime. HMO copayments, however, are much less burdensome than those required by conventional health plans. Out-of-pocket payments for inpatient care are rarely required and outpatient copayments average only \$15 per visit (after five free visits) (46).

<sup>~</sup>For a discussion of inpatient mental health utilization by adolescents, see Ch. 11, "Mental Health problems: Prevention and Services," in Vol. II.

<sup>&</sup>lt;sup>25</sup>This figure is based on American Psychiatric Association tabulations of the 1986 Bureau of Labor Statistics employee benefits survey.

<sup>26</sup> This health benefits survey was conducted in 1987 by Fox Health Policy Consultants and included 150 small, medium, and large employers (23).

<sup>&</sup>lt;sup>27</sup>This could easily be spent on 1 year of inpatient treatment.

<sup>28</sup>The Interstudy HMO survey included 247 plans that were operational for more than 1 year at the end of 1935 (40).

Yet these relatively low fees may be countered by other access controls. HMOs typically require a primary care physician to approve of specialty services, and more than three-quarters of the HMOs surveyed by Interstudy require members to receive primary care physician approval in order to gain access to mental health services (40). Twenty-one percent of the surveyed plans indicated taking a careful screening approach to "limit entrance into the HMO's mental health system." Nonetheless, 53 percent reported that they may permit selfreferral. When access is controlled by a prior approval requirement, it is often limited to mental health problems that the HMO provider considers responsive to treatment within the benefit's time constraints. More than half of the surveyed Interstudy plans reported that they specifically exclude treatment of chronic mental illness, long-term psychotherapy, and psychosexual disorders from basic coverage. Another 17 percent also exclude eating disorders (40).

Current Changes in Mental Health and Substance Abuse Coverage Policy--It is important to recognize that employer and insurer attitudes toward coverage of mental health and substance abuse treatment (see below) are in flux, especially with respect to adolescents. In the last decade, utilization of benefits for mental health and substance abuse care grew dramatically, particularly among adolescents (12).<sup>29</sup> As benefits rapidly became widespreadcoverage for treatment of alcoholism almost doubled from 36.2 percent of participants in employmentbased health plans in 1981 to 70 percent in 1986expenditures soared. Employers spent \$207 per employee for mental health benefits in 1988 (14). One Blue Cross and Blue Shield plan, Independence Blue Cross of Philadelphia, experienced a 57percent increase in admission rates for substance abuse treatment in 2 years, while its expenditures for inpatient substance abuse treatment increased more than four times, from \$4 million to \$18.5 million (5).

Claims for mental health and substance abuse treatment services can now make up as much as 15 to 20 percent of an employer's health care dollarsmost of it for adolescents (6). One study of the health insurance claims of a large corporation found that 60 percent of mental health expenditures were for nonspouse dependents<sup>30</sup> (64). A study examining the experience of more than 200,000 employees covered by Metropolitan Life Insurance found the average expense per inpatient mental health admission for nonspouse dependents was \$18,036 in 1988, almost twice the cost for employees and their spouses (12). Inpatient treatment costs for substance abuse were also substantially higher for nonspouse dependents than for adults. As a result, many employers and health insurers are reconsidering how and whether to cover mental health and substance abuse treatment for dependents. A recent survey of corporate benefits decisionmakers found that more than half predicted restricting or excluding coverage for dependent mental health or chemical dependency illnesses (57).<sup>32</sup>

Substance Abuse Treatment<sup>33</sup>—Although health coverage for the treatment of alcoholism and drug abuse has traditionally trailed behind coverage for other illnesses, it has become much more widely available in recent years. It wasn't until the mid-1960s that limited coverage for alcoholism treatment was offered by a few commercial health insurers (50). Now the majority of participants in group health plans have some level of substance abuse benefits whether covered by a conventional plan (87 percent), an HMO (98 percent), or a PPO plan (93 percent) (32).

Coverage for both alcohol and drug abuse treatment, like that for mental health problems, is usually subject to special limitations. Employer-sponsored health plans most often cover short-term inpatient detoxification and frequently cover inpatient rehabilitation and outpatient treatment as well, though

<sup>29</sup> For further discussion of adolescent mental health utilization, see ch. 11, "Mental Health Problems: Prevention and Services," in Vol. II.

<sup>&</sup>lt;sup>30</sup>Nonspouse dependents were primarily children under 19 years who have never married but also included full-time college students age 19 to 24 and any unmarried dependents who were physically handicapped *or* mentally retarded.

<sup>&</sup>lt;sup>31</sup>Nonspouse dependents were found to be principally adolescents ages 11 to 19.

<sup>32</sup>This survey was conducted by the group insurance division of Northwestern National Life Insurance Co. and included 400 companies representing 3.9 million workers (57).

<sup>33</sup>Additional information on substance abuse treatment is presented inch.12, "Alcohol, Tobacco, and Drug Abuse: Prevention and Services, ' in Vol. I.

Table 16-5-Coverage of Alcohol Abuse Treatment: Percent of Full-Time Participants in Plans With Coverage by Extent of Benefits, Medium and Large Firms, 1988

Coverage limitation	Inpatient detoxification	Inpatient brehabilitation as	outpatient care
With coverage	95%	78%	84%
Covered the same as other illnesses	29	15	17
Covered the same as mental illness	. 7	6	18
Subject to separate limitations <sup>e</sup>	59	57	49
Limit on days		46	24
Per year		27	24
Per confinement		16	_
Per lifetime	15	17	7
Limit on dollars	21	19	28
Per day	1	1	6
Per year		8	19
Per lifetime		15	10
Coinsurance limit'		5	13
Ceiling on out-of-pocket expenses does not apply		5	10
Separate copayment or deductible		1	6
Other limitations		1	Ĭ
Without coverage	1	22	16

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

Detoxification is the systematic use of medication and other methods under medical supervision to reduce or eliminate the effects of substance abuse.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Employee Benefits in Medium and Large Firms, Bulletin 2336 (Washington, DC: U.S. Government Printing Office, 1989).

not to the extent of other illnesses and almost always with limitations (see tables 16-5 and 16-6).<sup>34</sup>In 1988, among full-time participants in health plans with drug or alcohol abuse coverage, approximately 95 percent had inpatient detoxification benefits, about 78 percent had inpatient rehabilitation benefits, and 81 to 84 percent were covered for outpatient care (84).

Although benefits for substance abuse treatment may be subject to the same restrictions as mental health care, they are most often provided under their own separate limitations including a limited allowance of hospital days for detoxification or rehabilitation, a restricted number of outpatient visits, a maximum ceiling on total dollars reimbursed, a lower coinsurance rate, no ceiling on out-of-pocket expenses, a separate copayment or deductible, and a

separate lifetime maximum. It appears that benefits for alcohol and drug abuse treatment are very similar; little difference in the scope of coverage for the two can be found in the results of the Bureau of Labor Statistics survey.

HMO benefits for alcohol and drug abuse treatment are as strictly controlled as they are for mental health. Almost one-third of HMOs provide benefits only for the strict purposes of detoxification and emergency drug abuse care (46). Interstudy's 1985 survey indicates that hospitalization, when provided at all, is most commonly limited to 34 days for alcohol and 36 days for drug abuse treatment (per benefit period) (37). Most plans allow 28 outpatient visits for alcohol abuse treatment while few report specific limits on ambulatory drug-related care (40).

<sup>&</sup>lt;sup>a</sup>Overall, the Bureau of Labor Statistics estimates that 80 percent of full-time participants in health plans provided by medium and large firms have alcohol abuse treatment benefits. The percents shown in this table apply to those participants who have benefits. So, for example, 95 percent of the 80 percent of those participants who have alcohol abuse benefits are covered for inpatient detoxification.

<sup>&</sup>lt;sup>C</sup>Rehabilitation is designed to alter abusive behavior in patients once they are free of acute physical andmental complications.

<sup>&</sup>lt;sup>d</sup>This category includes treatment in one or more of the following: outpatient department of a hospital, residential treatment center, organized outpatient clinic, day-night treatment center, or doctor's office. If benefits differed by location of treatment, doctor's office care was tabulated.

<sup>&</sup>lt;sup>9</sup>The total is less than the sum of the individual items because some plans contained more than one type of limitation. <sup>1</sup>Coinsurance rate is lower than that applying to other medical services.

<sup>9</sup>This category includes plans where coverage was subject to overall deductibles or maximum dollar amounts that differed from those for other medical services.

<sup>&</sup>lt;sup>34</sup>Detoxification is the systematic of medication and other methods under medical supervision to reduce or eliminate the effects of substance abuse. *Rehabilitation* is designed to alter abusive behavior in patients once they are free of acute physical and mental complications (84).

Table 16-6-Coverage of Drug Abuse Treatment: Percent of Full-Time Participants in Plans With Coverage by Extent of Benefits, Medium and Large Firms, 1988

Coverage limitation	Inpatient detoxification	Inpatient brehabilitation brehabilitation breaking breaki	outpatient care <sup>ad</sup>
With coverage	96%	77%	81 %
Covered the same as other illnesses	28	13	17
Covered the same as mental illness	. 7	6	18
Subject to separate limitations	61	58	46
Limit on days	. 47	46	21
Per year	. 26	27	20
Per confinement	18	17	_
Per lifetime	15	16	6
Limit on dollars	21	19	27
per day	—f		6
Per year	. 9	7	19
Per lifetime	16	16	11
Coinsurance limit <sup>®</sup>	7	6	13
Ceiling on out-of-pocket expenses does not apply	5	5	10
Separate copayment or deductible	1	1	6
Other limitations	1	1	2
Without coverage	4	23	19

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

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Employee Benefits in Medium and Large Firms, Bulletin 2336 (Washington, DC: U.S. Government Printing Office, 1989).

Maternity Care and Related Services<sup>35</sup>—Although private health insurance coverage of prenatal and maternity care is generally comprehensive, many privately insured adolescents are not eligible for coverage, in part because of a "loophole" in the Pregnancy Discrimination Act of 1978 (Public Law 95-555).

Pregnancy and Childbirth--Since the enactment of the Pregnancy Discrimination Act of 1978 (Public Law 95-555), almost all employment-based health plans provide maternity care benefits (35). The Pregnancy Discrumination Act, which amends the

Civil Rights Act of 1964 (Public Law 88-352), requires that employment-based health plans cover pregnancy, childbirth, or related medical conditions as they cover other medical care. Nevertheless, approximately one-third of privately insured adolescents are not covered for maternity-related services by their parents' employment-based health plan (1).

This situation is in part duetoa "loophole" in the Pregnancy Discrimination Act that affects adolescent daughters of privately insured parents more

aOverall, the Bureau of Labor Statistics estimates that 74 percent of full-time participants in health plans provided by medium and large firms have drug abuse treatment benefits. The percents shown in this table apply to those participants wtro have benefits. So, for example, 96 percent of the 74 percent of those participants who have drug abuse benefits are covered for inpatient detoxification.

bDetoxification is the systematic use of medication and other methods under medical supervision to reduce or eliminate the effects of substance abuse.

CRehabilitation is designed to alter abusive behavior in patients once they are free of acute physical and mental complications.

<sup>&</sup>lt;sup>d</sup>This category indudes treatment in one or more of the following: outpatient department of a hospital, residential treatment center, organized outpatient clinic, day-night treatment center, or doctor's office. If benefits differed by location of treatment, doctor's off ice care was tabulated.

e<sub>The</sub> total is less than the sum of the individual items because many plans had more than one type of limitation. Less than 0.5 percent.

<sup>9</sup>Coinsurance rate is lower than that applying to other medical services. hThis category includes plans where coverage was subject to overall deductibles or maximum dollar amounts that differed from those for other medical services

<sup>&</sup>lt;sup>35</sup>Maternity care is used here to refer to prenatal, delivery, and postpartum care.

<sup>36</sup> Health coverage provided by small employers is an exception; approximately 11 percent of employee groups under 25 do not provide maternity care benefits. The Pregnancy Discrimination Act does not extend to nongroup policies or employees of firms with 15 or fewer employees where maternity coverage is often limited or not available at all (1).

<sup>37</sup>This estimate is based on the Alan Guttmacher Institute's calculations of data from the 1984 Bureau of Labor Statistics survey of employee benefits in medium and large fins.

<sup>38</sup>Lack of maternity coverage appears to be a critical issue for a significant proportion of the uninsured. One study found that 40 percent of hospital patients who are self-paying or not billed for care are recipients of maternity care; how many are adolescents is not clear (61).



Photo reedit: March of Dimes Birth Defects Foundation

Approximately one-third of privately insured adolescents are not covered for maternity-related services by their parents' employment-based health plan.

than any other group. <sup>39</sup>The Pregnancy Discrimination Act's *regulations*, *in* referring to dependents other than spouses, state that employer-provided health "insurance does not have to cover the pregnancy-related conditions of other dependents" (29 CFR 1985 ed. 1604, App.).

In many States, the loophole can be overridden in cases of pregnancy complications. Twenty-six

States mandate that regardless of whether an individual has coverage for normal pregnancy, insurers must cover pregnancy complications in the same manner as any other illness (1).40 Thus, for an ectopic pregnancy, for example, adolescent mothers who are otherwise not eligible for maternity benefits but are privately insured through a parent's policy can get coverage for necessary care. The States typically provide some guidance to health plans as

<sup>39</sup>Note that 10 States (Illinois, Maine, Maryland, Massachusetts, Minnesota, New Jersey, New York, Ohio, Virginia, and Wisconsin) have mandated that the requirements of the Pregnancy Discrimination Act also extend to nonspouse dependents (e.g., adolescent mothers). (Virginia's mandate is limited to children who have been raped or females under 13 years who have been victims of rape or incest.)

<sup>&</sup>lt;sup>40</sup>Note that two States limit this requirement to group policies and two others limit it to nongroup policies (1).

to what constitutes a complication of pregnancy but case-by-case decisions are usually made by the insurance carrier (1).

When a pregnant adolescent dependent has private health coverage for maternity care, she is not treated differently from any other pregnant health plan beneficiary. Maternity benefits are rarely subject to special limitations, but standard coinsurance and deductibles are required. In some plans, the number of postpartum hospital days may be restricted (l). In addition, some important tests and procedures (e.g., Rho-gam, inpatient well-baby care) may be excluded from coverage (l).

Waiting periods and preexisting condition exclusions may be required in some health plans and are especially significant in maternity care given the critical importance of early prenatal medical attention. Forty-five percent of employees of medium and large firms are not eligible for health benefits until after completing some period of service, usually 3 months or less (84). Consequently, adolescents who become pregnant, before or shortly after a parent's job change, may not be covered for prenatal care, at least during the first trimester of pregnancy.

Waiting periods for preexisting conditions can also limit or even eliminate maternity coverage if conception occurred previous to the effective date of the health policy. The 1984 Bureau of Labor Statistics survey found that almost 60 percent of health plan participants were not covered for preexisting conditions for 10 or more months after health coverage starts (l). It is not clear how many adolescent mothers lose access to maternity coverage as a result.

It is important to note that the newborn infants of privately insured adolescent mothers are especially at risk for being uninsured. In 1987, the Alan Guttmacher Institute surveyed Blue Cross and Blue Shield plans and leading commercial insurers regarding maternity and newborn health coverage (1)<sup>42</sup>The survey's results indicated that almost 70 percent of the health plans did not cover newborns of nonspouse dependents (e.g., adolescent daughters). Thirty percent of the plans covered neither the adolescent mother for her maternity-related care nor her newborn.

Abortion Services--Although there are no data describing private health coverage of abortion, it appears that some health plans may exclude it. At least eight States (i.e., Idaho, Kentucky, Minnesota, Missouri, Nebraska, North Dakota, Pennsylvania, and Rhode Island) have mandated some restriction of private health insurance benefits for abortions (33). Four States (i.e., Idaho, Kentucky, Missouri, and North Dakota) require that coverage be provided only on an optional basis and at extra cost. 43 Nebraska, Pennsylvania, and Rhode Island prohibit abortion coverage in health plans provided to public employees; however, they allow exceptions when the mother's life is threatened. 4 Pennsylvania and Rhode Island also allow coverage for public employees in cases of rape or incest. 45 Minnesota prohibits a State mandate for HMO abortion coverage unless the mother's life is threatened (33).

The Pregnancy Discrimination Act does not preclude coverage, but it specifically relieves employers of any obligation to provide abortion benefits "except where the life of the mother would be endangered if the fetus were carried to term, or except where medical complications have arisen from an abortion" (Public Law 95-555). If abortion coverage is provided, however, "the employer must do so in the same manner and to the same degree as it covers other medical conditions" (29 CFR 1985 ed. 1604, App.).

Each year since 1982, the Federal Government has prohibited funding for abortion in the Federal Employee Health Benefits Program except when the life of the mother would be endangered if the fetus

<sup>41</sup> ARho-gam (Rho immune globulin immunization) is indicated for Rh negative pregnant women to prevent the formation Of antibodies against the fetus that can cause a miscarriage or stillbirth (I).

<sup>42&</sup>lt;sub>The Alan</sub> Guttmacher Institute survey was conducted in early 1987 and included 100 leading commercial group health insurers and all the Nation's Blue Cross and Blue Shield plans; the response rate was 73 percent (1).

<sup>43&</sup>lt;sub>The</sub> Pennsylvania regulation requiring an additional premium for abortion coverage was feud to be unconstitutional in Federal court [American College of Obstetricians v. Thornberg 737 F2d 283,303 [3rd Cir.1984]]. The State continues, however, to prohibit abortion as a "basic" benefit and requires that coverage for induced abortions be offered only on an optional basis.

<sup>44</sup>A1984 Federal court decision ruled that Rhode Island could not direct municipalities from withholding funds for abortion coverage but the State may (and does) prohibit abortion coverage for State employees.

<sup>&</sup>lt;sup>45</sup>Rhode Island's regulation mandating that coverage be offered only as an optional benefit and at extra cost was struck down **as unconstitutional** by a Federal court **decision**, *National Education Association of Rhode Island et al. v. J. Joseph Garrahy et al. in 1984 (598 F. Supp. 1374*, 1984).

were carried to term (Public Law 100-202, Title V, Sec. 517, 1987).

Contraception—Although health benefit survey data do not provide specific details on family planning coverage, some inferences can be drawn from available information on preventive services and prescription drugs. The typical adolescent family planning visit consists of several components, including a pelvic examination, pap smear, sexually transmitted disease screening, counseling, and possibly a prescription for a birth control drug or device. Since private health plan benefits for routine physical exams and related tests are often not covered, except in an HMO setting, it is less likely that such a visit would be reimbursable unless the claim was associated with a diagnosis (e.g., nonmenstrual bleeding). The laboratory tests would always be covered if they were interpreted by the insurer as "diagnostic' rather than preventive. Prescription drug benefits are available to 93 percent of participants in employee-based health plans, Thus, most privately insured adolescents probably have coverage for birth control pills. Whether birth control devices (e.g., diaphragms) are covered by most health plans is not known.

Dental Care-In 1988, 37 percent of participants in employer-sponsored group health plans had general dental care coverage and 27 percent were covered for orthodontic expenses (32). Most of these plans include benefits for preventive care, such as routine examinations and X-rays, and restorative procedures (e.g., fillings, periodontal care).

Dental benefits are typically provided with separate annual dollar maximums, deductibles, and coinsurance requirements. In 1988, the most common annual maximum benefit was \$1,000. Coinsurance requirements often depend on the type of procedure. The less costly procedures (e.g., examinations, X-rays) are usually covered at a higher rate, typically ranging from 80 to 100 percent of the "usual, customary, and reasonable" charge (84). Expensive procedures, including orthodontia, are commonly limited to a 50-percent maximum. Payment for orthodontia is also frequently restricted to a lifetime maximum of no more than \$1,000 per child dependent (84).

Long-Term Care for the Chronically Ill or Disabled—In 1987, a survey focusing on private health insurance coverage of chronically ill children younger than 18 years old was conducted for the first time (24). <sup>46</sup>The findings are summarized below.

Ancillary Services, Equipment, and Supplies— The researchers concluded that the basic therapeutic needs of chronically ill children are not always met by employment-based health plans (24). Physical therapy, speech therapy, and occupational therapy were covered by 89 percent, 77 percent, and 57 percent, respectively, of the surveyed health plans. In some benefit plans, these therapies were only available for short-term rehabilitation purposes. However, many ancillary medical services, such as diagnostic X-ray and laboratory services, medical supplies and medical equipment, and outpatient prescription drugs were covered by more than 90 percent of the surveyed health plans. Benefits for nutritionists' services were rarely available and coverage was restricted to physician prescriptions for purposes other than weight loss or control.

Long-Term Care—Traditional benefits for longterm care, such as institutional care, visiting nurse, and home health aide services are usually rather limited if available at all (24). Most of the health plans surveyed restrict the number of in-home nurse and home health aide services; only one-third provided for a limited stay in a skilled nursing home facility. Yet health insurance coverage of high-cost illnesses and conditions that require long-term attention is evolving. Many insurers and employers have introduced more comprehensive coverage that includes skilled nursing, home health aides, physical therapy, respiratory therapy, and benefits for medical social work, in order to contain the more expensive costs of institutionalization. Sixty-nine percent of the surveyed health plans took this approach, although the number of covered visits for most of the plans was limited to 90 visits per year. Home care benefits are often provided as a substitute for hospitalization and are usually not reimbursable unless they help reduce or avoid a stay in a more costly institution. Sometimes home care benefits are provided only in order to cut short an ongoing hospital stay.

<sup>&</sup>lt;sup>46</sup>This survey included 150 employers including 50 small (O to 100 employees), 46 medium (101 to 500 employees), and 54 large (more than 500 employees) firms chosen at random from the Dun and Bradstreet U.S. Business Directory and the Business Insurance Directory (24).

Some health plans reflect a new flexibility in the coverage of costly chronic conditions and now include provisions for "inclividual benefits management" (24). These new health plan provisions allow for payment of otherwise *uncovered* home- and community-based services as long as the total cost of providing care is less than the cost of more expensive *covered services*. Half of the surveyed health plans either had such a program or allowed it on a case-by-case basis when requested by a physician or family member even if the provided services were not explicitly covered.

Nonphysician Providers and Alternative Settings--Private health insurance coverage is principally oriented towards payment for physicians and physician-supervised or physician-ordered services. Data describing coverage of nonphysician providers is sketchy at best. How nurse practitioners, psychologists, clinical social workers, drug addiction counselors, and other nonphysician health care providers are paid for their services can be key to developing additional low-cost community adolescent health resources. While many States allow these providers an expanded scope of practice, they may face obstacles in getting direct reimbursement for their services whether they practice in a traditional health care setting or elsewhere. Although many States mandate private health insurance coverage of some nonphysician providers, especially psychologists, social workers, nurse practitioners, and clinical nurse midwives, it is not clear how many health insurance plans allow for direct payment for their services since a substantial percentage of employmentbased health coverage is free from State insurance

regulation (see earlier discussion of the Employee Retirement and Income Security Act).

### Medicaid Coverage 47 48 49

An estimated 4.58 million U.S. adolescents ages 10 through 18 had Medicaid coverage at some point in time during fiscal year 1988. Although nearly all adolescents with Medicaid coverage live in families with incomes below the Federal poverty level, poor adolescents are still more likely to be uninsured than others. In fact, in calendar year 1988, one out of three poor adolescents, more than 1.7 million overall, had neither Medicaid nor private health insurance coverage. An additional 932,000 adolescents whose families lived just above the poverty level (i.e., from 100 to 149 percent of the Federal poverty level) were also without coverage.

Instead of being regarded as a single program, the Medicaid program may be more aptly described as a confederation of 50 State programs, Although Federal guidelines determine broad eligibility and coverage criteria, each State designs and manages its own Medicaid program. Consequently, eligibility requirements, services offered, utilization limits, and provider payment policies vary widely among the States. How well Medicaid covers poor adolescents depends to a large extent on these Statespecific features and, thus, they are the focus of this review. The State-specific information reported here, unless noted otherwise, is based on a 1989 survey of State Medicaid benefits and eligibility policies, conducted by Fox Health Policy Consultants and McManus Health Policy, Inc. (48).<sup>52</sup>

<sup>47</sup>For a more in-depth discussion and review of the complex regulations governing Medicaid eligibility and coverage, see the Medicaid Source Book: Background Data and Analysis (69).

<sup>48</sup> Every State but Arizona participates in the Medicaid program. Arizona provides federally funded medical assistance through a demonstration program that has received waivers of certain Medicaid requirements. The Arizona Medicaid program is not included in this review.

<sup>&</sup>lt;sup>49</sup>The District of Columbia is included in any data s<sub>ummarizing</sub> State Medicaid programs.

<sup>50</sup>This estimate was developed for OTA by the Office of the Actuary, Health Care Financing Administration (HCFA), U.S. Department of Health and Human Services, and includes all individuals ever-enrolled in fiscal year 1988. HCFA estimates that children in the AFDC program are enrolled for an average of 9 months during a fiscal year (see app. C in this volume for details on HCFA's method of estimation). In contrast, data from the March 1989 Current Population Survey, a household-based survey of noninstitutionalized persons, found that 2.% million adolescents had Medicaid coverage only in calendar year 1988. An additional 23 to 25 percent had both Medicaid and private coverage in 1988 according to the Current Population Survey.

<sup>51</sup>This number is based on estimates from the U.S. Census Bureau's March 1989 Current Population Survey developed by Richard Kronick for OTA (45).

<sup>52</sup>This Medicaid survey was supported by a grant (# MCH-063500) from the Bureau of Maternal and Child Health and Resources Development, and the Bureau of Health Care Delivery and Assistance, Health Resources and Services Administration, Public Health Service, U.S. Department of Health and Human Services. The survey was conducted by telephone in the spring of 1989 and focused on selected mandatory and optional Medicaid services critical to adolescents. An attempt was made to interview each State's director of Medicaid coverage policy. If that person was unavailable, a deputy or other responsible individual was contacted. Draft summary tables of the survey findings were returned to the State Medicaid director for their review and comment.

Table 16-7—Estimated Medicaid Enrollment and Expenditures, by Age Group, Fiscal Year 1988

Age group	Estimated number of enrollees (in millions)	Average cost per enrollee <sup>b</sup>	Estimated expenditures (in millions)	Percent of total program costs <sup>6</sup>
0-5 <sup>d</sup>	6.048	\$ 669	\$4,046	8.40/
6-14	5.417	445	2,411	5.0
10-18	4.583	725	3,322	6.9
15-20	2,737	1,109	3,035	6.3
21-24	6.642	1,939	12,879	26.6
45-64	2.079	3,627	7,541	15.6
65 and over	3.779	4,899	18,513	38.2
All ages	26.702	\$1,814	\$48,425	100,070

aNumbers of individuals ever enrolled in fiscal year 1988.

SOURCE: Off ice of Technology Assessment, 1991, based on unpublished HCFA-2082 data on Medicaid enrollment and expenditures in fiscal year 1988 from the Off ice of the Actuary, Health Care Financing Administration, U.S. Department of Health and Human Services, Baltimore, MD, June 1990.

Throughout this review, it is critical that the reader keep in mind that what is described are State policies, *not* actual availability of services. It is well established that despite the features of Medicaid that have enabled *some* poor children and adolescents to gain access to health care, this access is often constrained by both Federal and State Medicaid policies and requirements.

#### Who Pays for Medicaid?

Medicaid is a joint Federal-State entitlement program and its costs are shared by Federal and State governments. The Federal share in each State's Medicaid program ranges from 50 to 80 percent and in fiscal year 1990 total expenditures were projected to total approximately \$70.5 billion (71). Federal funds account for 56.9 percent of total Medicaid program expenditures, an estimated \$40.2 billion in fiscal year 1990 (71).

#### Medicaid Expenditures on Adolescents<sup>53</sup>

Actual data on Medicaid expenditures for adolescents are not available. Using vendor payment data from a sample of 35 States, however, the Health Care Financing Administration (HCFA) has estimated that fiscal year 1988 national Medicaid expenditures for adolescents ages 10 to 18 totaled approximately

\$3.322 billion; about 44 percent of this was spent on 10- to 14-year-olds and 56 percent on 15- to 18-year-olds (81). Overall, adolescents ages 10 to 18 made up 17.1 percent of Medicaid enrollment and 6.9 percent of overall Medicaid expenditures in fiscal year 1988 (see table 16-7).

Table 16-8 shows the allocation of fiscal year 1988 Medicaid expenditures by type of service. Hospital inpatient, physician services, and intermediate care facilities for the mentally retarded (ICF/MR) accounted for more than half of all Medicaid expenses incurred for adolescents. Although the distribution of costs for younger adolescents (10- to 14-year-olds) v. older adolescents (15- to 18-year-olds) was similar, per enrollee expenditures were almost three-quarters higher for older adolescents than for the younger group, Per enrollee costs for family planning, hospital inpatient, ICF/MR, home health care, inpatient mental health, and physician services were substantially higher for 15- to 18-year-olds than for younger adolescents.

#### Which Adolescents Are Eligible for Medicaid?

One reason that so many poor adolescents are not covered by Medicaid is that eligibility has generally been linked to participation in the AFDC cash welfare program (69). AFDC eligibility hinges not

bCosts per enrollee were calculated based on the number of individuals ever enrolled in Medicaid in fiscal year 1988. Percentages may not total 100 due to rounding.

d<sub>In</sub>some States, expenditures for newborn infants maybe assigned to the mother.

<sup>53</sup> These estimates were developed by the Office of the Actuary, Health Care Financing Administration (HCFA), U.S. Department of Health and Human Services and were based on fiscal year 1988 HCFA-2082 (vendor payment) data for Alabama, Alaska, Arkansas, Colorado, District of Columbia, Florida, Georgia, Idaho, Illinois, Iowa, Kansas, Louisiana, Maine, Maryland, Massachusetts, Mississippi, Montana, Maine, Nevada, New Jersey, New Mexico, New York, North Carolina, North Dakota, Ohio, Oklahoma, Oregon, Rhode Island, South Carolina, South Dakota, Tennessee, Texas, Utah, Virginia, and West Virginia (81). Enrollee data include all institutionalized and noninstitutionalized individuals ever enrolled in Medicaid during fiscal year 1988. For further details regarding HCFA'S method of estimating Medicaid enrollees and expenditures, see app. C in this volume.

Table 16-8-Estimated Medicaid Expenditures on Adolescents Ages 10 to 14 and 15 to 18, by Type of Service, Fiscal Year 1988

	Estimated expenditures (in millions)			Percentage of total costs			Estimated costs per enrollee <sup>b</sup>	
Type of service	10-14	15-18	10-18	10-14	15-18	10-18	10-14	15-18
Hospital (general)°	\$ 421	\$ 667	\$1,088	28.70/.	36.0%	32.8%	\$159	\$346
Hospital (mental health)	155	193	348	10.6	10.4	10.5	58	100
Intermediate care facility for the mentally								
retarded (ICF/MR)	145	252	397	9.9	13.6	12.0	55	131
Intermediate care facility/other	7	4	11	0.5	0.2	0.3	3	2
Skilled nursing facility	29	30	59	2.0	1.6	1.8	11	15
Physician services	172	210	382	11.7	11.3	11.5	65	109
Dental services	73	55	128	5.0	3.0	3.9	28	28
Other practitioners	25	19	44	1.7	1.0	1.3	10	10
Hospital outpatient		153	307	10.5	8.3	9.2	58	79
Clinic services		53	116	4.3	2.9	3.5	24	28
Home health care		20	37	1.2	1.1	1.1	6	11
Family planning	3	13	16	0.2	0.7	0.5	1	7
Lab/radiology	28	36	64	1.9	1.9	1.9	11	18
Prescription drugs		66	142	5.2	3.6	4.3	29	34
EPSDT	10	5	15	0.7	0.3	0.5	4	3
Rural health clinics	1	1	2	—е	—е	—е	1	ĺ
Other care			165	6.1	4.1			
Total	\$1,468	1,854	\$3,322	100.0%	100.0%	100.0%	\$552	\$963

apercentages may not total 100 because of rounding.

SOURCE: Office of Technolgy Assessment, 1991, based on estimates from unpublished HCFA-2082 data on Medicaid enrollment and expenditures in fiscal year 1988 from the Office of the Actuary, Health Care Financing Administration, U.S. Department of Health and Human Services, Baltimore, MD,

only on whether family income and resources fall within the State's AFDC limits but also, with few exceptions, on whether the family has a so-called "deprivation factor" (i.e., at least one parentis dead, disabled, continually absent from the home, or, as of October 1990, in two-parent families whose principal breadwinner is unemployed).<sup>54</sup>

States have the option, under Federal law, to offer Medicaid to "medically needy" children and adolescents when their family income and resources lie above the AFDC need standards if they meet AFDC's categorical requirements (e.g., an absent parent or disability). Thirty-seven States currently operate medically needy programs (53). Each State has the right to set its own medically needy

eligibility standards, provided they do not exceed 133.33 percent of the maximum AFDC assistance thresholds for similarly sized families (see table 16-9). Through a spend-down provision, individuals with incomes above the medically needy standard also may become eligible if their medical expenses are high enough to reduce their countable income below the medically needy maximum. Those who enter the program by "spending down" typically have erratic access to Medicaid and may only be eligible for a single accounting period (e.g., 6 months). If a State has a medically needy program, it must provide participants all mandatory Medicaid benefits and may elect to offer the same optional benefits package available to the categorically needy in the State. Most of the 37 States with medically

bCosts per enrollee were calculated using the following estimates of individuals ever enrolled in fiscal year 1988: 2.657 million10- to 14-year-olds and 1.926 million 15- to 18-year-olds.

CThis includes mental health stays in psychiatric units of general, acute care hospitals if the unit is not administrativelyseparate for billing purposes. dEarly and Periodic Screening, Diagnosis, and Treatment program benefit screening costs only. eLess than 0.5 percent.

<sup>54</sup>The Family Support Act of 1988 (Public Law 100-485) requires that, starting Oct. 1, 1990, all States provide AFDC and Medicaid coverage to families whose principal wage-earner is unemployed if they meet AFDC income and resource requirements. Coverage is limited, however, to 6 months out of any 12-month period.

<sup>&</sup>quot;' 'Categorically needy' refers to those who are Medicaid-eligible by belonging to certain categories of poor people, such as those who are a member of a family with dependent children where one parent is absent, incapacitated, or (in some States) unemployed.

Table 16-9-Annualized Income Thresholds for Medicaid Eligibility, by State, January 1990

States	AFDC threshold for a family of 3	r Percent of poverty level (\$10,580')	Medically needy threshold for a family of 3°	Percent of poverty level (\$10,580°)
Alabama	. \$ 1,416	13.4%	NA	NA
Alaska	10,152	76.9	NA	NA
Arizona	. 3,516	33.3		NA
Arkansas	,	23.2	\$ 3,300	31.370
California	•	78.9	11,208	106.1
Colorado	*	47.8	NA NA	NA
Connecticut	-,	63.1	8,856	83.9
Delaware	,	37.8	NA	NA
District of Columbia	-,	46.5	6,540	61.9
Florida	•	33.4	4,800	45.5
			,	
Georgia	•	47.0 59.5	4,404	41.7 59.5
Hawaii	,		7,224	
	-,	35.8	NA 5 004	NA 55.9
Illinois	,	41.7 32.7	5,904 NA	NA
	•			
lowa	,	46.6	6,600	62.5
Kansas	,	43.5	5,580	52.8
Kentucky	,	59.8	3,696	35.0
Louisiana	•	21.6	3,096	29.3
Maine	. 7,824	74.1	7,296	69,1
Maryland	4,752	45.0	5,508	52.2
Massachusetts	. 6,468	61.3	9,300	88.1
Michigan	6,900	65.3	6,660	83.1
Minnesota	. 6,384	60.5	8,508	80.6
Mississippi	4,416	41.8	NA	NA
Missouri	. 3,468	32.8	NA	NA
Montana	. 4,308	40.8	4,920	46.6
Nebraska	•	41.4	5,904	55.9
Nevada		37.5	NA	NA
New Hampshire	. 7,116	67.4	6,072	57.5
New Jersey	5,088	48.2	6,792	64.3
New Mexico	•	30.0	NA	NA
New York	,	70.8	8,508	80.6
North Carolina	, -	31.5	4,404	41.7
North Dakota	,	43.9	5,220	49.4
Ohio	. 3,852	36.5	NA	NA
Oklahoma	_,	53.5	5,196	49.2
Oregon	_'	49.1	6,900	65.3
Pennsylvania		47.8	5,604	53.1
Rhode Island		61.7	8,700	82.4
South Carolina		47.6	3,300	31.3
South Dakota	-,	42.8	NA	NA
Tennessee	•	44.0	3,000	28.4
Texas		20.9	3,204	30.3
Utah	,	58.6	6,192	58.6
Vermont		75.2	10,596	100.3
Virginia	•	33.1	4,296	40.7
Washington		56.9	7,188	68.1
West Virginia		28.3	3,480	33.0
Wisconsin		58.8	8,268	78.3
Wyoming	•	40.9	0,200	76.3 NA
	7,040	<del></del> U.J		11/4

SOURCE: National Governors' Association, "MCH Update-State Coverage of Pregnant Women and Children," Washington, DC, January 1990.

NA – not applicable; the State does not cover the medically needy under its Medicaid program.

aThe term "threshold" refers to that income limit that truly drives program eligibility. inmost States, this is the payment standard. In Colorado, Georgia, Kentucky, Maine, Michigan, Mississippi, Oklahoma, South Carolina, Tennessee, and Utah, thethreshold istheState's need standard. Please note, in these IoStates, thethresholdthatappears on thetableisnotwhatthe State pays to AFDC recipients. These States' paymentstandardsare actually significantly lower than the eligibility threshold.

The Federal poverty level for a family of three is \$10,580 in all States but Alaska and Hawaii where the levels are higher: Alaska family of three = \$13,200; Hawaii family of three = \$12,150.

Tha "medically needy" are not covered in Alabama, Alaska, Arizona, Colorado, Delaware, Idaho, Indiana, Mississippi, Missouri, Nevada, New Mexico, Ohio, South Dakota, and Wyoming.

needy programs provide participants the full range of Medicaid benefits offered in their State (80).<sup>56</sup>

Eligibility for Medicaid among poor adolescents varies a great deal among the States because income and resource standards for the AFDC and medically needy programs are determined by the individual States. In many States, the standards underlying eligibility are quite stringent. In the South, as noted earlier in the discussion on uninsured adolescents, it appears that more stringent income eligibility requirements are key to that region's greater proportion of uninsured adolescents.<sup>57</sup>

As of January 1990, very few State AFDC and medically needy income standards approached Federal poverty levels and many fell short of 50 percent of the Federal poverty guideline of \$10,560 for a family of three (see table 16-9).58 Annual AFDC Medicaid eligibility thresholds for a family of three range from a low of \$1,416 in Alabama to a high of \$8,328 in California (53). In many cases, the States have failed to adjust the AFDC income standards for inflation and, consequently, the income threshold as a percentage of poverty has been eroded substantially, from an average of 71 percent in 1975 to 47 percent in January 1990 (51). Whether all States would be able to bear the burden of improving eligibility requirements, without further Federal assistance, is unclear.

The Medicaid link with AFDC participation is the Primary, but not the only, way to establish Medicaid eligibility. Under Federal law, in addition to providing mandatory Medicaid coverage of AFDC recipients, States may also choose to cover children who

meet the AFDC program's income and resource requirements but are without a "deprivation factor"—e.g., adolescents who live in a financially needy two-parent family. 60 Thirty-four States have implemented this option. 61 62 The Family Support Act of 1988 (Public Law 100-485) requires that, starting October 1, 1990, all States must provide AFDC coverage to families whose principal wage earner is unemployed if they meet the income and resource requirements of AFDC eligibility.

Congress has acted in recent years to sever the eligibility link between Medicaid and AFDC for pregnant women and young children. But with the exception of some pregnant adolescents, today's generation of poor adolescents have not benefited from these reforms. The most recent Medicaid eligibility reform occurred in the Omnibus Budget Reconciliation Act of 1990 (OBRA-90) (Public Law 101-508) and required States to provide Medicaid coverage to all children ages 6 to 19, born after September 30, 1983, with family incomes up to 100 percent of the Federal poverty level. In the previous year, the Omnibus Budget Reconciliation Act of 1989 (OBRA-89) (Public Law 101-239) required that as of April 1, 1990, States provide Medicaid benefits to all pregnant women and children up to age 6 with family incomes up to 133 percent of the Federal poverty level. (See box 16-B for a summary of OBRA-89 and OBRA-90's Medicaid provisions affecting adolescents.) Earlier legislation gave States the option to extend Medicaid eligibility up to 185 percent of poverty for pregnant women, and 15 States have done this; 63 and another 4 States have

<sup>&</sup>lt;sup>56</sup>Twenty-two States provide the full range: California, Connecticut, District of Columbia, Georgia, Hawaii, Illinois, Kansas, Kentucky, Maine, Maryland, Massachusetts, Michigan, Minnesota, Montana, Nebraska, New Hampshire, New York, North Carolina, North Dakota, Texas, Vermont, and West Virginia (80),

<sup>&</sup>lt;sup>57</sup>The u.s. Bureau of the Census defines Southern States as Alabama, Arkansas, Delaware, Florida, Georgia, Kentucky, Louisiana, Maryland, Mississippi, North Carolina, Oklahoma, South Carolina, Tennessee, Texas, Virginia, and West Virginia (77).

<sup>58&</sup>lt;sub>In</sub> order t. be eligible for AFDC payments and automatically eligible for Medicaid, a family must pass two income tests: a gross income test and a 'countable' income test. Gross monthly income cannot exceed 185 percent of the State's need standard. Countable income must be less than the State's need standard allowing for child care costs up to \$160 per child and a standard allowance of \$75 per month. AFDC recipients are allowed an additional "income disregard" as an incentive to return to or enter the workforce (69).

<sup>59&</sup>lt;sub>The</sub> eligibility threshold in Alaska is even higher (i.e., \$10,152), but this is not comparable to the thresholds in the contiguous 48 States. The Federal Government has established separate poverty levels for both Alaska and Hawaii because of their unique economic conditions.

<sup>60</sup> Often referred to as "Ribicoff children" after former Senator Ribicoff, the sponsor Of legislation authorizing coverage for this group.

<sup>61&</sup>lt;sub>The 34</sub> States are Alaska, Arkansas, California, Connecticut, District of Columbia, Florida, Georgia, Hawaii, Illinois, Iowa, Kansas, Kentucky, Maine, Maryland, Massachusetts, Michigan, Minnes o@ Mississippi, Missouri, Nebraska, New Jersey, New York, North Carolina, North Dakota, Ohio, Oklahoma, Pennsylvania, South Carolina, Tennessee, Texas, Utah, Vermont, Virginia, and Wisconsin.

<sup>62</sup>States may choose to extend categorically needy coverage to other groups of AFDC-related persons; for greater detail see the Medicaid Source Book: Background Data and Analysis (69).

<sup>63</sup>The 15 States are California, Connecticut, Hawaii, Iowa, Maine, Maryland, Massachusetts, Michigan, Minnesota, Mississippi, New York, Rhode Island, South Carolina, Vermont, and Washington.

## Box 16-B—Provisions of the Omnibus Budget Reconciliation Acts of 1989 and 1990 That Affect Medicaid Coverage of Adolescent

#### Me&aid Eligibility

- . States must extend Medicaid eligibility to all pregnant women and children and to children up to age 6 with family incomes up to 133 percent of the Federal poverty level (i.e., the poverty level is \$10,560 for a family of three). (OBRA-89)
- States must extend Medicaid eligibility to all children ages 6 to 19, who were born after September 30, 1983, and whose family incomes are up to 100 percent of the Federal poverty level. (OBRA-90)

#### Medicaid Coverage

Early and Periodic Screening, Diagnosis, and Treatment (EPSDT) (OBRA-89)

- Any State Medicaid coverage limitations on diagnosis or treatment are eliminated for health conditions identified during the course of an EPSDT screen as long as the services are within the limits of Federal Medicaid guidelines and are deemed medically necessary.
- States are required to provide periodic screens at intervals which meet reasonable standards of medical and dental practice as determined by the State after consultation with recognized medical and dental organizations. Unscheduled screenings must be permitted if medically necessary.
- . Screening services must include health education and anticipatory guidance.
- Vision, hearing, and dental services must be provided, each according to its own periodicity schedule that meets reasonable practice standards.

Pediatric and Family Nurse Practitioners (OBRA-89)

. State Medicaid programs must cover certified pediatric and family nurse practitioners to the extent that they are legally authorized by State law to provide services, even if they are not practicing under the supervision of, or associated with, a physician or other provider.<sup>3</sup>

#### Physician Payment (OBRA-89)

- •States must submit annual plans specifying Medicaid payment rates for obstetrical and pediatric services for the Secretary's review, and in 1992 average Medicaid payments for specific obstetric and pediatric procedures must be reported
- The Physician payment Review Commission must examine the adequacy of physician payment, physician participation, and access to care by Medicaid beneficiaries and report to Congress by July 1.1991.

#### Medicaid and Private Insurance (OBRA-89)

• Requires States to pay group health insurance premiums with Medicaid funds, if cost effective, for individuals or families with one Medicaid eligible member (whose incomes are below the Federal poverty level) if they are eligible for such insurance coverage.<sup>4</sup>

#### Other Provisions

- States must cover the ambulatory services of community health centers, migrant health centers, and health care for the homeless programs receiving funds under sections 329,330, or 340 of the Public Health Service Act, and must reimburse these services at 100 percent of reasonable cost. Health center services must include physician services, physician assistant and nurse practitioner services (to the extent allowed by State law), clinical psychologist—services, and clinical social worker services. (OBRA-89)
- The Secretary is directed to Conduct demonstration projects in several States to assess ways of extending Medicaid coverage, or alternative coverage, to pregnant women and children up to age 20 who are otherwise ineligible for Medicaid and whose family incomes are below 185 percent of poverty. Alternative coverage may include, but is not limited to, such options as enrollment under employer plans, the State's plan for its own employees, a State uninsured plan, or an HMO. (OBRA-89)

Continued on next page

<sup>&</sup>lt;sup>1</sup>All provisions of the Omnibus Budget Reconciliation Act of 1989 (Public Law 101-239) regarding Medicaid eligibility or coverage became effective Apr. 1, 1990, unless noted otherwise.

 $<sup>^2</sup>$ This provision of the Omnibus Budget Reconciliation Act of 1990 (Public Law 101-508) becomes effective July 1, 1991, and will be phased in over 10 years.

<sup>&</sup>lt;sup>3</sup>This provision became effective July 1,1990,

<sup>&</sup>lt;sup>4</sup>This provision became effective Jan. 1, 1991.

## Box 16-B—Provisions of the Omnibus Budget Reconciliation Acts of 1989 and 1990 That Affect Medicaid Coverage of Adolescents-Continued

- . The Secretary is directed to conduct up to four demonstration projects to test innovative methods of providing health insurance to medically uninsurable children underage 19. (OBRA-89)
- . The Secretary is directed to conduct 3-year demonstration projects in three four States to provide Medicaid to families with incomes below 150 percent of poverty who are currently ineligible for Medicaid (OBRA-90). Each project must begin no later than July 1,1991.

SOURCE: 1989 provisions: Commerce Clearinghouse, Inc., "omnibus Budget Reconciliation Act of 1989, Explanation of the Conference Committee Affecting Medicare Medicaid Program" Medicare and Medicaid Guide, vol. 3 (Chicago, IL: Dec. 1S, 1989); 1990 provisions: U.S. Congress, House of Representatives, "Omnibus Budget Reconciliation Act of 1990, Conference Report 101-964" (Washington, DC: U.S. Government Printing Office, 1990).

raised the income eligibility limit to 150 percent of Poverty <sup>64</sup> (53).

Federal law also dictates that children and adolescents under age 21 are eligible for Medicaid if they are in foster care under Title IV-E of the Social Security Act. In addition, every State but New Hampshire has extended Medicaid coverage to blind or disabled children and adolescents receiving cash assistance from the Supplemental Security Income (SSI) program. States have the option of Limiting coverage of SSI recipients by requiring them to meet more restrictive eligibility standards although 42 States cover all disabled adolescents who receive Federal SSI cash assistance (21).

Although adolescents principally gain access to Medicaid through their parents, some, especially poor pregnant or parenting adolescent females, may establish eligibility on their own. Total numbers are not available; however, among adolescents ages 10 to 18 who received AFDC benefits in fiscal year 1987, approximately 5 percent participated in AFDC (and presumably Medicaid as well) as an "adult" or head of household (78). Overall, more than 110,000 female adolescents and almost 11,000 males were "adult' AFDC recipients that year.

#### What Medicaid Coverage Provides

As noted earlier, each State defines not only the eligible Medicaid populatiom it serves but also its

own Medicaid benefit package (within broad Federal guidelines). All States are required to offer a core group of services, referred to as "mandatory," including but not limited to inpatient and outpatient hospital services, laboratory and radiology services, physician services, clinical nurse midwife services, <sup>65</sup> certified pediatric and family nurse practitioner services, family planning services and supplies, <sup>66</sup> and Early and Periodic Screening, Diagnosis, and Treatment (EPSDT) services for children and adolescents under age 21 (see table 16-10).

In addition, Federal law permits State Medicaid programs, at their discretion, to provide a range of "optional" services to the categorically needy, including clinic services, dental services, physical therapy, occupational therapy, speech pathology and audiology, rehabilitative services, case management, inpatient psychiatric services for persons under age 21, other licensed practitioner services (such as psychologists), and prescription drugs (see table 16-10),

Although a Medicaid card appears to entitle a poor adolescent to a rather expansive package of health benefits, States can and do establish strict limits on the frequency and number of covered services regardless of whether they are mandatory or optional benefits. In addition, States may impose utilization control measures to ensure that services are medically necessary. Under Medicaid, "a serv-

<sup>64</sup>The four States are Florida, Kansas, North Carolina, and West Virginia.

<sup>65</sup> Mandatory nurse midwife services are whatever services the nurse midwife is authorized to practice under State law or regulation.

<sup>66</sup> Mandator/ family plarming services and supplies include services and supplies for women of childbearing age, including sexually active minors who desire such services and supplies. Abortions are excluded from family plarming services, and Federal Medicaid matching payments for abortions have been limited, by language in the U.S. Department of Health and Human Services' appropriations bills, to cases where the life of the mother is in danger (69).

## **Table 16-10-Mandatory and Optional** Services Covered Under Medicaid

#### Mandatory services

- · Inpatient hospital services
- Outpatient hospital services
- Physician services
- Early and Periodic Screening, Diagnosis, and Treatment services for children under age 21
- · Family planning services and supplies
- · Laboratory and X-ray procedures
- Skilled nursing facility and home health care services for adults (i.e., 21 years and older)
- · Rural health clinic services
- Services of certified nurse-midwives, pediatric and family nurse practitioners
- Community health centers, migrant health centers, and health care for the homeless program~receiving funds under sections 329, 330, or 340 of the Public Health Service Act

#### Optional services

- · Case management
- Additional home health services
- Dental services
- Services of other licensed practitioners, including psychologists, chiropractors, optometrists, and podiatrists
- Clinic services
- Other diagnostic, screening, preventive, and rehabilitative services
- Prescription drugs
- Intermediate care facility services, including intermediate care facility services for the mentally retarded
- Eyeglasses, prosthetic devices, dentures, and orthopedic shoes
- . Home and skilled nursing facility care for children
- Private duty nursing
- Inpatient psychiatric care for children under age 21
- Physical, occupational, and speech, hearing, and language disorder therapies
- Other medical or remedial care recognized under State law, including personal care in the home, transportation, and emergency services, skilled nursing facility for children under age 21, Christian Science nurses and sanitariums, hospice care services, respiratory care service

aTo the extent they are authorized to practice under State law or regulation.

SOURCE: U.S. Department of Health and Human Services, Health Care Financing Administration, Division of Intergovernmental Affairs, Medicaid Services State by State, HCFA Pub No. 02155-90 (Washington, DC: U.S. Government Printing Office, October 1959)

ice is medically necessary if it is reasonably calculated to prevent, diagnose, correct, cure, alleviate, or prevent the worsening of conditions that endanger life, cause suffering or pain, result in illness or infirmity, threaten to cause or aggravate a handicap, or cause physical deformity or malfunction, and if there is no other equally effective (although more conservative or less costly) course of treatment available or suitable for the recipient requesting the service" (10).

State Medicaid benefits of particular relevance to adolescents—including the EPSDT benefit, physician services, nurse practitioner services, hospital outpatient services, school-based clinics, mental health care services, and substance abuse treatment—are reviewed below.

The Early and Periodic Screening, Diagnosis, and Treatment (EPSDT) Benefit-As part of OBRA-89 (Public Law 101-239), Congress significantly expanded adolescents' and other children's access to Medicaid-covered services by reforming the EPSDT program.<sup>67</sup>

States are mandated by the Federal law to periodically screen Medicaid-eligible adolescents for any illnesses, abnormalities, or treatable conditions and refer them for definitive treatment. Screens must contain certain key components, including the following:

- comprehensive health and developmental history (including assessment of both physical and mental health development),
- comprehensive unclothed physical exam,
- appropriate immunizations according to age and health history,
- \* laboratory tests, and
- health education (including anticipatory guidance) (42 CFR 441.56(a)).

Vision, hearing, and dental services must be provided as well, each according to its own periodicity schedule that meets reasonable practice standards.

The EPSDT benefit is, in effect, the Nation's largest preventive health program for children and adolescents (68). The OBRA-89 amendments dramatically broadened Medicaid coverage of children and adolescents by essentially eliminating any State Medicaid limitations on diagnosis or treatment for any health condition identified during the course of an EPSDT screen as long as the services are within the limits of Federal Medicaid guidelines and are deemed medically necessary. Services provided under EPSDT must be sufficient in amount, duration, or scope to reasonably achieve their purpose; however, States are permitted to set "appropriate" limits on EPSDT services based on medical necessity (79). The act further aims to improve access to

<sup>&</sup>lt;sup>67</sup>The EPSDT amendments became effective Apr. 1, 1990.

<sup>&</sup>lt;sup>68</sup>See details on the periodicity schedule below.

Table 16-11—EPSDT Screening Costs, by Age Group, Fiscal Year 1988

Es Age group	stimated number of enrollees (in millions)	Average screening cost per enrollee	Estimated total expenditures (in millions)	
0-5	6.048	\$15	\$90.7	(72.00/o)
6-14	5.417	5	27.1	(21.5%)
10-14	2.657	4	10.6	(8.4%)
15-18	1.926	3	5.8	(4.60A)
15-20	2.737	3	8.2	(6.5%)
Overall				
(20 and under)	14.202	\$9	\$126.0	(100%)

SOURCE: Office of Technology Assessment, 1991, based on estimates from unpublished HCFA-2082 data on Medicaid enrollment and expenditures in fiscal year 1988 from the Office of the Actuary, Health Care Financing Administration, U.S. Department of Health and Human Services, Baltimore, MD, June 1990.

EPSDT by expanding the pool of eligible EPSDT providers and permitting more frequent screenings.

Here is an example of the potential of EPSDT to go beyond the limitations of a State's Medicaid program:

A 14-year-old boy receives an EPSDT health screen and evidence of cocaine use is detected. After intense questioning, the boy admits to regular use of cocaine and his parents agree to have him enter a drug detoxification and counseling program. Under the State plan, the only drug treatment Medicaid will reimburse is heroin detoxification, Medicaid now would be obligated to reimburse for the boy's detoxification and counseling program to the extent it is medically necessary since the need for the treatment was discovered during the EPSDT screen (20).

Clearly, the potential for providing comprehensive health services using EPSDT will not be fully realized, however, if adolescent Medicaid recipients do not get screened. Although the EPSDT program has been shown to improve children's health and reduce health care costs, however, use of EPSDT services by children of all ages is extremely low, especially in rural areas (82), Average program expenditures were only \$9 per Medicaid enrollee up to age 20, in fiscal year 1988, and were directed largely towards younger children. HCFA estimates that while, in fiscal year 1988, average per enrollee expenditures for EPSDT screening were \$15 per child under age 5, they were only \$4 for adolescents ages 10 to 14 and \$3 for adolescents ages 15 to 18 (see table 16-11). If all eligible children were screened by the EPSDT program, the costs would be higher. overall, approximately 72 percent of HCFA expenditures for EPSDT screening have been for O-to 5-year-olds. In addition, although EPSDT was intended to encompass mental as well as physical assessment, it has tended to be more concerned with the identification and treatment of physical problems (19).

The broad sweep of the OBRA-89 reforms led one policy analyst to conclude that "the potential of this legislation both to improve the health status of poor adolescents and to stretch the limits of State Medicaid programs is great" (54). However, the statute comes "at a time when the Federal Government is requiring States to shoulder more and more of the burden of health care financing" (54). There is reason to be concerned about the States' capacities to assume these new responsibilities. Medicaid programs now consume an average 14 percent of States' budgets, up from 9 percent in 1980 (43).

EPSDT Screening Schedules-OBRA-89 codifies the periodic nature of EPSDT services and requires that screens be provided at intervals which meet reasonable standards of medical and dental practice as determined by the State after consultation with recognized medical and dental organizations (79). It also requires that any medically necessary interperiodic screening service be covered. But little is known about what health screening periodicity is most appropriate and effective for poor adolescents, especially those at high risk for the common morbidities of adolescence.

The American Academy of Pediatrics recommends that, from ages 10 to 18, adolescents should be screened five times (2). The U.S. Preventive Services Task Force concluded that, from the ages of 7 to 18, except for routine pap smears for sexually active girls from ages 13 to 18, and a tetanus-diphtheria booster between 14 and 16 years, the scheduling of additional visits and the frequency of individual preventive services should be left to

Table 16-12—EPSDT Periodicity Schedules in State Medicaid Programs

	Number of EPSDT scheduled	N	lumber of EPSDT scheduled
State	screenings for ages 10 to 21	State	screenings for ages 10 to 21
States that offer fewer	than five	States that offer five or more	
scheduled EPSDT scre	eens:	scheduled EPSDT screens:	
Alaska	4	Alabama	6
Arkansas	3	Delaware,	6
California		Florida	6
Colorado	4	Georgia	6
Connecticut	4	Hawaii	
District of Columbia	3	Illinois	6
Idaho	1	Indiana	6
lowa	3	Maine	6
Kansas	4	Maryland	11
Kentucky	4	Massachusetts	
Louisiana		Michigan	6
Mississippi		Nebraska	
Missouri		New York	
Montana		North Dakota	11
Nevada		Ohio	11
New Hampshire		Oregon	
New Jersey		Pennsylvania	
New Mexico		Rhode Island	6
North Carolina	4	Vermont	6
Oklahoma	2	Washington	10
South Carolina		West Virginia	
South Dakota		Wisconsin	6
Tennessee		States that askedule as many ED	SDT corespo
Texas		States that schedule as many EP	SUI Screens
Utah		as medically necessary:	NA
Virginia		Minnesota	NA
Wyoming			

NA = not applicable.

SOURCE: P. McManus, H. Fox, P. Newacheck, et al., unpublished data from a 1989 survey of State Medicaid programs, supported by a grant (#MCH-063500) from the Bureau of Maternal and Child Health and Resources Development, and the Bureau of Health Care Delivery and Assistance, Health Resources and Services Administration, Public Health Service, U.S. Department of Health Human Services, Rockville, MD, 1989.

clinical discretion because of lack of data and differing patient risk profiles (85).

In 1989, State EPSDT periodicity schedules varied widely. Twenty-two States covered five or more EPSDT visits for adolescents and young adults ages 10 to 21 (see table 16-12). Maryland, North Dakota, Ohio, and Washington State covered annual EPSDT visits compared with only minimal allowances for one or two preventive visits from ages 10 to 21 in Idaho, Oklahoma, Texas, and Wyoming. Minnesota covers as many EPSDT visits "as medically necessary."

Partial EPSDT Screening---OBRA-89 also clarifies that Statesman not restrict "partial screeners." This means that the use of all types of providers is now encouraged and those who are qualified to furnish only one EPSDT service cannot be prevented

from participating in the program (79). In the past, many States accepted only those providers able to perform "complete" EPSDT screens. Here is an illustration of how this provision might make EPSDT screening services more available to adolescents:

A teenage girl visits a Planned Parenthood clinic for information on birth control methods. She has no regular primary care physician. Although the clinic does not provide vision or hearing services, it has been certified as an EPSDT screening provider for the purposes of furnishing the comprehensive health and developmental screening component. As a result, the girl is able to obtain a partial EPSDT screening service at the same time she receives family planning services (20).

It is important to note that because of the recent expansion in the EPSDT program, State Medicaid

<sup>@</sup>Issues regarding the cost-effectiveness of particular periodicity schedules for younger children were addressed indepthin a 1988 OTA study, Healthy Children: Investing in the Future (73).

program limits on the physician and other services described below only apply to conditions that are not discovered by EPSDT screening services.

Physician Services-Although all State Medicaid programs are required by Federal law to cover physician services, many States restrict visits to physicians. States may place limits on settings where Medicaid recipients' care can be provided, on the number of visits, and the types of physician services to be covered. Table 16-13 displays each State Medicaid program's coverage of and restrictions on physician services. <sup>70</sup> In 1989, nine States imposed some ceiling on the annual number of office visits to physicians, ranging from 12 to 24 visits per year. Six States did not permit more than one or two physician visits per day; two others set monthly visit limits. Five States require prior authorization for additional physician care after a specified number of visits.

Services of Nurse Practitioners and Other Nonphysician Providers--Whether a State Medicaid program covers nonphysician providers can be key to the development of community resources for adolescent health care. Many school-linked and community-based health centers are staffed principally by nurse practitioners and other nonphysician providers. <sup>71</sup> Under OBRA-89, starting July 1, 1990, State Medicaid programs must cover certified pediatric and family nurse practitioners to the extent that they are legally authorized by State law to provide services, even if they are not practicing under the supervision of, or associated with, a physician or other provider. Thirty-one States currently recognize nurse practitioners in statute or regulation and grant them an expanded scope of practice beyond that of registered nurses (20), but nurse practitioners' legal scope of practice, and the extent of physician supervision they must receive, vary from State to State. Since HCFA regulations are not yet available and only seven States (Florida, Idaho, Kansas, Montana, New Hampshire, Nevada, and Washington) covered nurse practitioners previous to

OBRA-89, it is not clear what Medicaid restrictions will be placed on their services.

Forty-five States allow services provided by physician-supervised office staff (e.g., registered nurses) to be reimbursed as a physician service. So, for example, an adolescent's visit for a routine allergy shot given by a physician's nurse can be covered under Medicaid as a physician office visit. Seventeen States exclude physician-supervised speech and other ancillary therapists from the Medicaid program (see table 16-13).

States use a variety of other regulations to govern Medicaid coverage of physician-supervised health providers. Almost half of the 49 States that covered physician-supervised services in 1989 required that the physician be on the premises. Six States required that the physician have direct contact with the patient. Other States used different definitions of physician supervision.

Clinic Services, Including Those of School-Linked Health Centers<sup>72</sup>—Although States are not required by Federal law to cover clinic services under Medicaid, all but three do (Mississippi, Rhode Island, and Wisconsin). States may limit the types of clinics whose services they cover and may include or exclude school-linked health centers, community mental health centers, and substance abuse clinics, among others.<sup>73</sup>

In 1989, only two States--Connecticut and Illinois-permitted school-linked health centers to be authorized Medicaid clinic providers. Even though they are not specifically cited as qualified clinics in a State Medicaid plan, however, school-linked health centers in the other 48 States may receive Medicaid reimbursement. Some of them may receive Medicaid reimbursement because they have been set up as a satellite to an outpatient hospital department or other type of clinic (e.g., rural health clinic or a community health center). School-linked health centers may also receive Medicaid reimbursement through physicians or other qualified providers,

Note that services provided by psychiatrists are subject to separate limitations in 13 States; see discussion of coverage for mental **health** and substance abuse treatment below.

<sup>&</sup>lt;sup>71</sup>For a discussion of school-linked health centers, see ch. 15, 'Major Issues Pertaining to the Delivery of Primary and Comprehensive Health Care Services to Adolescents," in this volume.

<sup>&</sup>lt;sup>72</sup>Clinic services are defined under Medicaid to include preventive, diagnostic, therapeutic, rehabilitative, or palliative items Or services that are provided to outpatients under direction of a physician or dentist without regard to whether the clinic itself is administered by a physician (69). Clinics providing covered services may provide general health care services or may focus on specific services, for example, mental health services (69).

<sup>&</sup>lt;sup>73</sup>See ch. 15, "MaJorlssues Pertaining to the Delivery of Primary and Comprehensive Health Services to Adolescents," in this volume for more details on the financing of school-linked health centers.

Table 16-13-Coverage of and Restrictions on Physicians' and Physician-Supervised Services in State Medicaid Programs, 1989

			Physician-supervised care		
State	Limits on office visits	Prohibited settings	Off ice nurses <sup>a</sup>	Other practitioners (e.g., physician assistants, ancillary therapists)"	
Alabama	12 visits/year	_	Yes	No	
Alaska	_	<b></b>	Yes	Yes	
Arkansas	12 visits/year°	School, day care	Yes	No	
California	_ ,	_	Yes	Yes⁴	
Colorado	_	_	Yes	Yes	
Connecticut	_	_	Yes	No	
Delaware	•	_	Yes	Yes	
District of Columbia	_	School,day care, and other	Yes	No	
Florida	_	School, day care, and other	Yes	No	
Georgia	—е		Yes	No	
lawaii	_	_	Yes	No	
daho	_	_	Yes	Yes	
llinois	_	_	Yes	Yes	
ndiana	—е	<del>_</del>	Yes	No	
	_	_		***	
owa	40	_	Yes	No	
Kansas	12 visits/year		Yes	Yes	
Centucky		_	Yes	Yes	
ouisiana	12 visits/year	-	Yes	Yes	
Maine	—е		Yes	Yes	
laryland	1 visit/day		Yes	Yes⁴	
lassachusetts	1 visit/day	_	No	No	
Michigan	_		Yes	Yes⁴	
linnesota	_	<del></del> -	Yes	Yes	
lississippi	12 visits/year	_	Yes	Yes⁴	
Missouri	_ '		Yes	Yes	
Montana	_	-	Yes	No	
Nebraska	_		Yes	Yes⁴	
levada	—е		No	Yes⁴	
lew Hampshire	18 visits/year	_	Yes	Yes	
lew Jersey	— visits/year		Yes	No	
lew Mexico	_		Yes	Yes	
	_	_	Yes	Yes	
lew York	04: -: ! - !				
lorth Carolina	24 visits/year'	_	No	Yes	
lorth Dakota		_	Yes	Yes	
Ohio	IO visits/month		Yes	Yes	
Oklahoma	4 visits/month		Yes	No	
Oregon	2 visits/day		Yes	No	
ennsylvania	_		No	Yes	
Rhode Island			Yes	No	
South Carolina	18 visits/year		No	Yes	
South Dakota	_		Yes	Yes	
ennessee	24 visits/year		Yes	Yes⁴	
exas	_		Yes	Yes	
Jtah	I visit/day	School	Yes	Yes⁴	
ermont	-0	_	Yes	No	
/irginia	_	_	Yes	Yes⁴	
Vashington	I visit/day	_	Yes	Yes⁴	
Vest Virginia	1 visit/day		Yes	No	
Visconsin		School, day care	Yes	Yes	
	_		Yes	Yes	
Wyoming			res	res	

SOURCE: P. McManus, H. Fox, P. Newacheck, et al., unpublished datafrom a1989surveyofState Medicaid programs, supported by a grant (#MCH-063500) from the Bureau of Maternal and Child Health and Resources Development and the Bureau of Health Care Delivery and Assistance, Health Resources and Services Administration, Public Health Service, U.S. Department of Health and Human Services, Rockville, MD, 1989.

KEY: —= None; Yes = covered; No = not covered.

aEPSDT visits are not subject to limits.

bOBRA-89 mandated State Medicaid coverage of certified pediatric and family nurse practitioners starting July 1, 1990.

CFor all physician and hospital outpatient services.

Only some licensed Practitioners covered under physician supervision.

eprior authorization is required after a certainnumber of visits have been made. For all physician, hospital outpatient, and clinic services.

including nurse practitioners, that practice at the clinic, as long as the State does not restrict billing in a school setting. Five States (Arkansas, District of Columbia, Florida, Utah, and Wisconsin) prohibit Medicaid reimbursement for physician services provided in school settings (see table 16-13).

It is not clear to what extent school-linked health centers have established the billing systems necessary to collect Medicaid reimbursement. Numerous administrative obstacles have been cited by some school-linked health centers trying to bill Medicaid for their services, including: difficulty in establishing eligibility of students and obtaining their Medicaid numbers; problems in obtaining provider certification; delays in the reimbursement process and low reimbursement rates; and problems maintaining patient confidentiality (161).

Hospital Outpatient Service--State Medicaid programs are required to cover preventive, diagnostic, therapeutic, rehabilitative, or palliative services provided in a hospital outpatient setting by or under the direction of a physician or dentist. In 1989, seven States imposed some limit on the annual number of hospital outpatient visits, ranging from 3 to 30 visits per year (see table 16-14). Florida set a \$1,000 ceiling on outpatients and Oklahoma and the District of Columbia restricted daily outpatient visits to one and two per day, respectively. More than half (i.e., 27) of the States require prior authorization for some hospital outpatient services and 13 States impose ceilings on mental health or ancillary services, such as physical, occupational, and speech therapies.

Mental Health Care<sup>74</sup>--States have considerable flexibility in establishing the nature and extent of mental health services available to Medicaid recipients (66). As in private health insurance coverage, mental health care provided under Medicaid is often constrained by separate and more stringent limits on cost and utilization. The incentives in private mental health benefits to hospitalize patients rather than use nonhospital settings for care also appear to exist in Medicaid. Some argue that Medicaid payment policies appear to discourage less costly treatment

alternatives because Medicaid reimbursement rates come closer to covering costs for inpatient care than for outpatient services (63).

Inpatient Mental Health Care—Mental health stays in general hospitals are covered by Medicaid programs in all the States (69). Coverage of inpatient stays in freestanding psychiatric facilities is available for children and adolescents under age 21 in 38 States (almost three out of four) (80), 55 but only 10 of these 38 States permit residential treatment centers and other special psychiatric facilities that are not specifically certified as psychiatric facilities by the Joint Commission on Accreditation of Healthcare Organizations to be reimbursed under Medicaid. Inpatient mental health treatment, regardless of the setting, is typically subject to separate, stricter limits on length of stay compared with care for "physical" health problems. Federal law requires precertification that inpatient services are necessary and can be reasonably expected to improve the patient's condition so that ultimately such services will no longer be necessary (69).

Partial Hospitalization—Partial hospitalization is an often important way of allowing adolescents with mental health problems to spend longer amounts of time (usually 4 hours per day) in a treatment setting (19). Eighteen States cover partial hospitalization, most with no day limits. Some States do not permit partial hospitalization in freestanding psychiatric facilities (19).

Outpatient Mental Health Care—How Medicaid covers outpatient mental health care depends on whether services are provided in a hospital outpatient setting, clinic, or physician or other health provider's office. In 40 States, mental health visits are covered in a general hospital outpatient setting and are usually subject to visit or dollar limits and prior authorization requirements. Twenty-one States cover outpatient mental health services in psychiatric hospitals. Few States restrict the type of therapy used (i.e., individual therapy).

As noted earlier, all but three States cover clinic services. Community mental health centers can

<sup>&</sup>lt;sup>74</sup>A more detailed review of State Medicaid coverage of mental health and substance abuse will be available in an upcoming report prepared by FOX, McManus, Wicks, et al., for the Alcobol, Drug Abuse, and Mental Health Admihistration in the U.S. Department of Health and Human Services (22). The sections on mental health and substance abuse presented here are based largely on a summary of this report.

<sup>75</sup>The 38 States are Alabama, Alaska, Arkansas, California, Colorado, Connecticut, District of Columbia, Hawaii, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Maine, Maryland, Massachusetts, Michigan, Minnesota, Missouri, Montana, Nebraska, New Jersey, New York, North Carolina, North Dakota, Ohio, Oklahoma, Oregon, Pennsylvania, Rhode Island, South Carolina, Tennessee, Utah, Vermont Washington West Virginia, and Wisconsin.

Table 16-14-Coverage of and Restrictions on Hospital Outpatient Services in State Medicaid Programs, 1989°

State	Limits on basic coverage	services (e.g., mental health, ancillary therapies)	authorization required <sup>b</sup>
Alabama	3 visits/year		-
Alaska		X	X
Arkansas	12 visits/year <sup>c</sup>		
California	_ ′	X	x
Colorado		X	X
Connecticut	****		X
Delaware			~
District of Columbia	2 visits/day		
Florida	\$1,000/year		
Georgia	φ1,000/yeai		X
Hawaii		·······	X
		$\frac{\overline{x}}{x}$	<u>^</u>
Idaho		Λ	
Illinois	<del></del>		<del>_</del>
Indiana		<del></del>	X
lowa		_	<u>X</u>
Kansas		X	_
Kentucky		<del>-</del>	_
Louisiana			
Maine			
Maryland			
Massachusetts	-	<del></del>	X
Michigan			$\boldsymbol{x}$
Minnesota		_	X
Mississippi	6 visits/year	<del></del>	X
Missouri	<u> </u>		X
Montana			_
Nebraska			Х
Nevada		-	X
New Hampshire	12 visits/year	x	
New Jersey	12 Violoty out	<u>~</u>	x
New Mexico		X	x
New York	<del></del>	<u> </u>	X
North Carolina	24 vioito/voord	X	X
	24 visits/year	Λ	Λ
North Dakota		$\frac{\overline{x}}{x}$	2
Oklohoma 0	L vicit/dov	Λ	X
Oklahoma0	I visit/day		X
Oregon		V	
Pennsylvania	-	X	X
Rhode Island			<u>x</u>
South Carolina			_
South Dakota			_
Tennessee	30 visits/year		
Texas	-	Χ	Xe Xe
Utah		<del>-</del>	٨٣
Vermont		X	<del></del>
Virginia			
Washington	Whiteham .	-	X
West Virginia		Χ	Х
Wisconsin			
Wyoming			
· •		13	

SOURCE: P.McManus, H. Fox, P. Newacheck, et al., unpublished data from a 1989 survey of State Medicaid programs, supported by agrant (# MCH-063500) from the Bureau of Maternal and Child Health and Resources Development and the Bureau of Health Care Delivery and Assistance, Health Resources and Services Administration, Public Health Service, U.S. Department of Health and Human Services, Rockville, MD, 1989.

aHospital outpatient limits do not apply to services provided under EPSDT.
bPrior authorization requires advance "p,o v,l for some services based on a finding of medical necessity.
cAll outpatient hospital and physician services.

dAll outpatient hospital, clinic, and physician services.

<sup>&</sup>lt;sup>e</sup>Prior authorization required to exceed a limit.

qualify as Medicaid clinics and may provide adolescents the same wide range of mental health services that might be available in a hospital outpatient setting, but in a somewhat less institutionalized atmosphere (19). Benefits in this setting may include assessment/diagnosis; individual, group or family therapy; psychological testing; medication monitoring; and crisis intervention. In 1989, 38 States covered outpatient care provided in a community mental health center; 24 States allowed care in a private mental health center. Services are typically subject to prior authorization or ceilings on visits or dollars spent.

Eligible Providers—Although all States cover physician care, in one out of four States, visits to psychiatrists are subject to separate and more restrictive office visit limits that range from 12 to 48 visits per year. Many State Medicaid programs confine their outpatient mental heath benefits to services provided by or under the supervision of psychiatrists. Almost half of all States do not cover nonphysician mental health providers, such as psychologists and clinical social workers, even if their services are provided under a psychiatrist supervision. State Medicaid programs that cover independent psychologists usually restrict reimbursement to an outpatient office or clinic setting. Independent clinical social workers are reimbursed by Medicaid only in Massachusetts and Montana.

One survey of State mental health coverage found that 38 State Medicaid programs allowed at least two mental health visits per week at either a hospital outpatient or clinic setting (19). Of these 38 States, most covered weekly visits to psychiatrists, most offered partial hospitalization, and some provided psychologists' services; none reimbursed all three.

Substance Abuse Treatment-As in mental health care, States often set strict limits on Medicaid benefits for substance abuse treatment.

Inpatient Substance Abuse Treatment—All but four States cover alcoholism and drug treatment services in a general hospital inpatient setting. Thirty-four States that cover mental health stays in psychiatric facilities also allow treatment for substance abuse. As for mental health care, however, only 10 of these States allow substance abuse



Photo credit: Sasha Bruce Youth Network, Inc., Washington, DC

Almost half of all State Medicaid programs do not cover nonphysician mental health providers, such as psychologists and clinical social workers, even if their services are provided under a psychiatrist's supervision.

treatment in residential treatment centers and other special psychiatric facilities that are not certified by the Joint Commission on Accreditation of Healthcare Organizations. As many as two-thirds of all States providing substance abuse inpatient care restrict coverage to detoxification only. Five States cover partial hospitalization for treatment of substance abuse usually with restrictions on length of stay.

Outpatient Substance Abuse Treatment—Thirty States cover visits to an outpatient hospital department for substance abuse, usually subject to limits on utilization and cost. Twelve States cover outpatient treatment in drug or alcohol abuse clinics. Care may also be covered in community mental health centers.

#### Physician Reimbursement and Participation Under Medicaid

Even if a poor adolescent holds a Medicaid card that represents a rather rich package of potential health benefits, finding a private physician willing to see Medicaid patients can be a significant problem, especially among some medical specialties and in certain geographic areas (73). Low payment rates,

<sup>&</sup>lt;sup>76</sup>Nonphysician mental health providers face similar restrictions in the Medicare program. With one exception (a requirement Of the Omnibus Budget Reconciliation Act of 1987 (Public Law 100-203) that stipulates direct payment of psychologists providing services in community mental health centers), Medicare does not allow direct payment of psychologists or any other nonphysician mental health provider (18).

Table 16-15-Factors Cited by Pediatricians as "Very Important" to Decision To Participate in Medicaid

	Percent of as			
Factors	1978 N = 814	1983 N = 791	1989 N = 940	Percent change 1978-89
Low payments	59.7	66.5	70.9"	1 8.8%
Unpredictable payments	41.3	52.4	53.4"	29.3
Complex regulations	38.6	46.3	47.5'	23.1
Payment delays	34.1	34.8	43.4"	27.3
Covered services	26.1	31.0	39.8'	52,5
Program regulations	29.4	32.8	38.8"	32.0
Paperwork	33.7	35.8	38.7 <sup>b</sup>	14.8
Broken appointments	29.0	31.1	30.2	4.1
Type of patient	NA	14.8	12.9	-12.8
Few Medicaid eligibles		5.0	4.3	-14.0

NA = not available.

SOURCE: B. Yudkowsky, J. Cartland, and S. Flint, "Pediatrician Participation in Medicaid," Pediatrics 85(4):567-577, 1990. Reprinted with permission.

administrative burdens, and other factors often discourage physicians from participating in Medicaid.

While research has shown that national physician surveys probably overstate the rate of physician participation in Medicaid, data from these surveys do help identify the specialties and geographic areas where participation is relatively low (73). Overall participation is particularly low among two specialties that are particularly important to adolescents, obstetrics/gynecology (OB/GYN) and psychiatry. Although current data are not available, in 1984 only 60 percent of psychiatrists and 72 percent of OB/GYNs accepted any Medicaid patients at all (73). Given that in recent years many OB/GYNs have withdrawn from obstetrics practice because of malpractice concerns, their Medicaid participation may have declined as well, especially for high-risk patients (52).

A recent survey conducted by the American Academy of Pediatrics found that the proportion of pediatricians saying that they were willing "to see at least some Medicaid patients' declined from 85 percent in 1978 to 77 percent in 1989 (87). Fortyfour percent of the surveyed pediatricians reported that they either had refused or limited their availability to care for children with Medicaid coverage in 1989.

Administrative difficulties involved in filing claims for Medicaid reimbursement has consistently been shown to result in lower Medicaid physician participation (52). In the American Academy of Pediatrics survey, pediatricians were asked to identify which factors were "very important" reasons for choosing not to participate or to limit their participation in Medicaid. More than 70 percent cited "low reimbursement" and roughly half also noted "unpredictable payments' and "complex regulations' as a deterrent to their willingness to treat Medicaid children (see table 16-15). Other studies have shown that physicians may find that Medicaid patients require more time and support than others and that they are less likely to follow medical advice (69).

Federal Medicaid rules do not impose specific physician payment methods on State Medicaid programs; Federal rules require only that Medicaid's physician payment level not exceed that paid by the Medicare program for the elderly and that it remain high enough to ensure reasonable access (75). Medicare sets physician payment levels at the 75th percentile of the customary charges in a given locale. Most Medicaid programs use fixed fee schedules that are unrelated to provider charges (69). Medicare permits physicians to bill the patient for charges higher than the Medicare rate, but Medicaid does not allow this. Medicaid reimbursement rates not only vary widely by State but are often far lower than

aP < 0.01.

bP < 0.05.

<sup>77</sup>Because of providers 'obvious vested interest in improving payment rates, provider surveys inquiring about 'low reimbursement' should be viewed with some caution

what Medicare reimburses providers. In 1986, for example, maximum Medicaid payment levels for brief followup visits ranged from \$6.00 in New Hampshire to \$28.41 in Alaska (see table 16-16). As a proportion of local Medicare payment rates, Medicaid fees for followup visits varied from 33 percent in Michigan to 125 percent in Tennessee (69).

Until recently, there has been little effort by the Federal Government to monitor the effect of State Medicaid payment policies on access to care and the availability of qualified providers (75). OBRA-89 took several steps to address this concern. It incorporates into statute the Medicaid regulation requiring that Medicaid payments for all practitioners be "sufficient to enlist enough providers so that care and services are available under the plan at least to the extent that such care and services are available to the general population in the geographic area" (11). Yet it should be noted that HCFA staff have described this regulation as an unenforceable "feel good rule" because adequate access is not clearly defined and there is no objective standard for measuring conformity with the law (20). However, States must submit annual plans specifying Medicaid payment rates for obstetrical and pediatric services for the Secretary's review, and in 1992 average Medicaid payments for specific obstetric and pediatric procedures must be reported.

OBRA-89 also directed the Physician Payment Review Commission to examine the adequacy of physician payment, physician participation, and access to care by Medicaid beneficiaries and report to Congress by July 1, 1991. In its initial background report to Congress, the Physician Payment Review Commission concluded that despite recent research focusing on access to care by the uninsured, little attention has been devoted to those individuals already eligible for Medicaid (75). The Physician Payment Review Commission also found that although available studies rely on old data, almost all conclude that higher Medicaid fees result in greater physician participation in the program, even though they used different sources of data (e.g., surveys v. claims records), definitions of participation, and estimation procedures, and appear to apply to all medical specialties (75).

# Estimated Effects of Employer Mandates and Medicaid Expansions on the Number of Adolescents Without Health Insurance<sup>78</sup>

"Employer mandates' and Medicaid expansions have been among the numerous legislative proposals suggested to reduce the number of people who lack health insurance in this country. Employer mandates require employers to offer group health insurance policies and pay a significant amount of the premiums for all employees who work more than a specified number of hours per week. Proposals to expand Medicaid require that categorical eligibility requirements be relaxed and/or that income eligibility limits be increased, thereby requiring or encouraging all States to make Medicaid available to all those eligible below certain income levels.

Numerous factors determine the effects of an employer mandate. Who is included in an employer mandate is especially important. How many hours per week must a person work to be considered an employee? Does coverage begin on the first day of employment or after a waiting period? Are the self-employed included? Are employee dependents covered? Will small firms be exempt? What level of benefits must be provided? How much must the employer contribute to the premium?

Similarly, the effect of an expansion in Medicaid depends on a number of policy decisions. For example, what is the minimum eligibility income level? Are the changes in eligibility mandatory or optional for the States? Are two-parent families with workers eligible or must one parent be absent or unemployed?

#### Estimated Effects of Employer Mandates

The following assumptions were used by OTA in estimating the effect of an employer mandate on the number of uninsured adolescents:

. The self-employed are exempt. All other "permanent' employees who work more than the required number of hours per week are covered (i.e., with no exemptions for firm size or industrial classification).

<sup>&</sup>lt;sup>78</sup>The estimates presented here were developed by R. Kronick for OTA, under contract to Carnegie Corporation of New York and the Carnegie Council on Adolescent Development, and are based on U.S. Census Bureau's March 1989 Current Population Survey data (45).

Table 16-16-Comparison of Medicaid and Medicare Reimbursement Rates for a Brief Followup Visit to a Physician Specialist, 1986

	Brief followup office visit (CPT code 90040)				
State	Medicaid maximum payment	Medicare maximum allowable charge	Medicaid as percent of Medicare		
Alabama	\$11.70	\$ <del>2</del> 0:70	- 56.5%		
Alaska	28.41	24.70	115.0		
Arkansas	12.00	14.40	83.3		
California	11.04	30.00	36.8		
Colorado	11.75	15.50	75.8		
Connecticut	8.80	24.80	35.5		
	12.66	21.00	60.3		
Delaware		25.00	90.9		
District of Columbia	20.00	24.80	40.3		
Florida	10.00	15.00	104.0		
Georgia	15.60	16.50	80.3		
Hawaii	13.25				
Idaho	10.50	14,60	71.9		
Illinois	11.50	25.00	46.0		
Indiana	17.30	16.50	104.8		
lowa	NA	<u> 30.00</u>			
Kansas	15.00	16.70	81.8		
Kentucky	13.00	16.50	78.8		
Louisiana	10.69	16.30	65.6		
Maine	8.00	NA	NA		
Maryland	10.50	22.00	47.7		
Massachusetts	8.00	NA	NA		
Michigan	7.75	23.50	33.0		
Minnesota	15.75	NA	NA		
Mississippi	11.55	NA	NA		
Missouri	10.00	20.70	48.3		
Montana	11.30	14.70	76.9		
Nebraska	16.30	16.30	100.0		
	15.82	24.70	64.0		
Nevada	6.00	12.40	48.4		
New Hampshire		-			
New Jersey	9.00	20.60	43.7		
New Mexico	11.50	17.20	66.9		
New York	7.00	20.60	34.0		
North Carolina	13.10	16.50	79.4		
North Dakota	8.20	12.40	66.1		
Ohio	12.00	20.60	58.3		
Oklahoma	11.00	20.70	53.1		
Oregon	11.07	18.50	59.8		
Pennsylvania	13.00	25.00	52.0		
Rhode Island	14.00	20.63	67.9		
South Carolina	9.50	14.62	65.0		
South Dakota	12.00	12.40	96.8		
Tennessee	18.00	14.40	125.0		
Texas	NA	24.75	NA		
Utah	9.92	12.40	80.0		
Vermont	8.00	12.40	64.5		
Virginia	6.30	NA	NA		
Washington	13.92	17.70	78.6		
West Virginia	10.00	16.50	80.6		
Wisconsin	16.23	18.10	89.7		
Wyoming	16.23	14.40	113.2		
WVVOIMING	10.30	17.70	113.4		

NA = not available

NOTES: a) Medicaid fees reflect statewide average maximums as reported toHCFA. It is not known which, if any, States have different maximums in different parts of the State. Medicare fees reflect highest allowable charge anywhere in State.

b) Connecticut fee reflects maximum payment for general practitioner value for specialists is unavailable. District of Columbia fee includes Maryland suburbs.information on Nevada fees available only for part of State.

SOURCE: U.S. Congress,Library ofCongress,Congressional Research Service, Medicaid Source Book. 'Background Data and Analysis (Washington, DC: U.S. Government Printing Office, 1988), pp. 450-451.

Table 16-17-Extending Health Insurance to Uninsured Adolescents: Potential Effect o
Three Employer Mandates on Uninsured Adolescents

Uninsured adolescents' living arrangement parent's work status	Total number of uninsured adolescents in 1988°	Number of uninsured adolescents covered by a mandate covering employees who work at least 30 hours/wk	Additional number covered by changing mandate to cover employees who work at least 25 hours/wk	Additional number covered by changing mandate to 18 hours/wk	Number of uninsured adolescents not covered by a mandate covering employees who work at least 18 hour/wk
Living without parents Parent is self-employed Parent is not working Parent working fewer than	455,000	126,000 7,000 5,000	11,000 2,000 0	32,000 15,000 3,000	693,000 432,000 405,000
26 weeks per year Parent working 26 weeks per	236,000	4,000	0	3,000	229,000
year or more		2,404,000 2,546,000 (55.2%)	78,000 90,000 (2.0%)	112,000 165,000 (3.6%)	51,000 1,810,000 (39.3%)

a<sub>In</sub> 1988 about 4.6 million adolescents ages 10 to 18-15 percent overall-were without health insurance.

SOURCE: R. Kronick, Adjunct Professor, University of California, San Diego. CA, calculations based on US. Department of Commerce, Bureau of the Census, March 1989 Current Population Survey public use files, 1990.

- Employees working 26 weeks or more in the preceding year are considered "permanent" workers and are covered under the mandate.
- The effects of the employer mandate are estimated using three different assumptions about the number of hours of work per week at which employees are covered: 18 hours, 25 hours, and 30 hours.
- Adolescents who do not live with their parents are not covered as dependents under the mandate; however, all other unmarried adolescents age 18 or younger are covered by the mandate if their parents were covered as well.

If the employer mandate requires employers to offer health insurance to all employees who work at least 30 hours a week, OTA estimates that approximately 2.55 million uninsured adolescents, or 55 percent of all adolescents currently without health coverage, would become insured (see table 16-17). Reducing the hourly work threshold from 30 hours a week to 25 or 18 hours a week does increase the number of uninsured adolescents who would be covered by health insurance, but its effect is relatively minimal (at least within the range of 18 to 30 hours a week). If the hourly work threshold is reduced to 25 hours per week, for example, an additional 90,000 adolescents (2 percent of all those uninsured) would be covered by health insurance. If the work threshold is 18 hours a week, an additional 165,000 adolescents (or 4 percent of all uninsured adolescents) would be covered.

#### Estimated Effects of Medicaid Expansions

**Proposals** to expand Medicaid may either mandate that States broaden Medicaid eligibility or allow States that option. If the current categorical eligibility requirement of a "deprivation factor' is maintained, the potential for an expansion in Medicaid to cover significant portions of uninsured adolescents is severely limited.

If all adolescents living with one parent whose income is below the Federal poverty level were covered by Medicaid, approximately 621,000 of the 4.6 million adolescents without health insurance would be covered (see table 16-18). Even if States were required to extend eligibility standards to all such adolescents, however, it is doubtful that all would enroll. In fact, many of the 8 percent of *uninsured* adolescents who were in single-parent households in 1987, with incomes below 50 percent of poverty, were already eligible to receive Medicaid benefits.

If categorical eligibility requirements were dropped, and all adolescents with family incomes below a specified standard were made eligible for Medicaid, then significant portions of the adolescents without health insurance could be covered by a Medicaid expansion. If Medicaid covered adolescents in families with incomes below 100 percent of poverty, for example, more than 38 percent of currently uninsured adolescents would be covered (see table 16-18). An additional 20 percent of uninsured adolescents would be included if the income standard was raised to 149 percent of poverty.

Table 16-18-Extending Health Insurance to Uninsured Adolescents: Potential Effect of Medicaid Expansions on Uninsured Adolescents

Estimated number (percent) of uninsured adolescents covered by the Medicaid expansion, by adolescent's living arrangement

Living with Living with two one parent parents or living alone Total			
316,000	405,000	721,000	
(7%)	(9%)	(16%)	
305,000	700,000	1,005,000	
(7%)	(15%)	(22%)	
292.000	639.000	931.000	
(6%)	(14%)	(20%)	
168.000	426.000	594,000	
(4%)	,	(13%)	
284.000	` ,	1,361,000	
(6%)	(230/o)	(300/0)	
	<del></del>	<u></u> -	
1 ,365,000	3,246,000	4,611,000	
(300/.)	(70%)	(1000/0)	
	one parent paren	one parent parents or living al316,000	

<sup>&</sup>lt;sup>a</sup>In1988 about 4.6 million adolescents—15 percent overall—were without health insurance.

SOURCE: R. Kronick, Adjunct Professor, University of California, San Diego, CA, calculations based on U.S.

Department of Commerce, Bureau of the Census, March 1989 Current Population Survey public use files, 1990.

Table 16-19-Extending Health Insurance to Uninsured Adolescents: Potential Effects of Various Combinations of Employer Mandates and Expansions in Medicaid on Uninsured Adolescents

Percent of currently uninsured adolescents who would be insured under the indicated combination of an employer mandate and Medicaid expansion

	No	Employees included in the mandate <sup>c</sup>		
Medicaid income eligibility y level <sup>b</sup>	employer ( mandate 3			
No expansion	00/0	55%	57%	61 %
Below 50% of poverty	16	68	69	72
of poverty Below 150%	37	78	79	81
of poverty	57	86	87	88
of poverty	,70	90	91	92

 $a_{ln}$ 1988, about 4.6 million adolescents-15 percent overall-were without health insurance.

SOURCE: R. Kronick, Adjunct Professor, University of California, San Diego, CA, calculations based on U.S. Department of Commerce, Bureau of the Census, March 1989 Current Population Survey public use files, 1990.

# Combined Approach: Employer Mandate With a Medicaid Expansion

OTA estimates that if employers were required to provide health insurance to all workers who worked at least 18 hours a week and if Medicaid were made available to all adolescents in families with incomes below 200 percent of the poverty level, then only 8 percent of adolescents without health insurance would remain uninsured (see table 16-19). An employer mandate that included employees who worked at least 30 hours per week combined with a Medicaid expansion that included all adolescents below 100 percent of poverty would leave 22 percent of currently uninsured adolescents without health insurance.

Most of the adolescents left out by the combination of an employer mandate and Medicaid expansion are children of the self-employed. If the self-employed were included under a "combination" mandate, nearly all currently uninsured adolescents would be covered.

Of the proposals evaluated, clearly the single greatest impact on uninsured adolescents would come from an employer mandate.

bAssumes that all adolescents i, families with incomes below the specified amount would be covered by Medicaid

bAssumes that alladolescents in families with incomes below the specified amount would be covered by Medicaid.

The employer mandates assume that all workers excluding the self-employed (and their dependents), who work more than the indicated number of hours for at least 26 weeks during the preceding year, would be covered.

# Conclusions and Policy Implications Adolescents Without Health Insurance

**In** 1988, about 4.6 million U.S. adolescents-or one out of seven overall--lack a key ingredient to access to health care: health insurance coverage. That health insurance coverage and ability to pay may determine when, or if at all, someone seeks medical services is well established. It has also been shown that while people with incomes below the Federal poverty level have significantly fewer physician contacts than others in the same state of health, Medicaid coverage can counter these effects of poverty. Yet one out of three poor adolescents ages 10 to 18 is not covered by the Medicaid program. And few adolescents except those who are pregnant have benefited from recent Medicaid expansions. Family income is clearly the most important determinant of health insurance status. But many adolescents in nonpoor families, including a significant proportion with working parents, also lack health insurance. Adolescent children of parents who work for small firms or are self-employed are especially at risk; approximately one out of four is uninsured, and adolescents in this group account for more than half of all uninsured adolescents. Overall, the percentage of the nonelderly population without health insurance is particularly high in the South and West, although only in eight States do 90 percent of residents have health insurance.

Ninety-four percent of adolescents ages 10 to 18 live with one or both parents, and the majority of them are covered by a parent's employer-sponsored health plan. But there is increasingly worrisome evidence that escalating health insurance costs are threatening coverage of adolescents and other dependents of the working insured. More workers than ever before are required to pay a higher share of insurance premiums to cover their dependents, and some receive no financial 'contribution from their employers for family benefits. The U.S. General Accounting Office recently found that, for lower income families, the high cost of family coverage can lead to decisions to forego dependent coverage altogether (67). In 1989, premiums for employersponsored health insurance for family coverage rose 18 percent and cost, on average, more than \$260 per month; parents paid an average share of \$55 to \$81 per month depending on the type of plan. Deductibles and coinsurance requirements for covered benefits typically add annual out-of-pocket costs of up to \$2,000 per family for "physical health problems; cost-sharing for mental health care and uncovered services can be an additional expense. Recent surveys of employers reflect their growing concern about the cost burden of covering their employees' dependents. Many employers report that they intend to increase their employees' share of premium costs, deductibles, and copayments, Some employers plan to cut benefits for dependents.

Most approaches to resolving the dilemma of the uninsured have focused on the overall nonelderly population, and no attention has been given to addressing the health coverage needs of adolescents in particular. Numerous commissions and studies have looked at a wide range of remedies to improve the plight of the uninsured including national health insurance proposals, employer mandates to provide health benefits to workers and their dependents, Medicaid expansion and reform, tax reform, and regulatory reform of employee health benefit plans and private health insurance (3,17,37,56,74). OTA does not endorse any particular approach but examined the effects on adolescents of combining two generic proposals: 1) an expansion in Medicaid to cover all adolescents whose families have incomes below the Federal poverty level and 2) a mandate to employers to provide health benefits to all workers (and their families) working at least 30 hours weekly. Such an approach would insure approximately 78 percent of uninsured adolescents ages 10 to 18.

At a minimum, the Federal Government should consider efforts to prevent any erosion in employer-sponsored health benefits for adolescent dependents, especially for critical health care needs such as treatment of acute and chronic illnesses, mental health care, substance abuse treatment, maternity care and related services (including family planning), vision and dental care, and rehabilitative services. Congress could act to maintain current private health insurance benefits for adolescent dependents by prohibiting employer-sponsored health plans from providing more limited benefits to health plan participants (i.e., subscriber or dependent) based on age or coverage status.

As private health insurance benefits have not been developed or assessed with respect to the special needs of the adolescent population, Congress could also support an effort to develop a model health insurance benefit for adolescents.

#### Adolescents With Private Health Insurance

Although adolescents with private health insurance have a wide range of benefits, their health plans may not meet some crucial adolescent health needs. Health benefits surveys show that 90 percent or more of employees with employer-based group health coverage have health benefits for hospital room and board, surgical services, physician visits, diagnostic X-ray and laboratory procedures, and outpatient prescription drugs. Mental health and substance abuse benefits are also available in most plans, but they are subject to separate and more stringent limitations than for "physical' problems. Preventive services, including basic immunizations and routine health assessments, are usually not covered for adolescents by private health plans, with the exception of health maintenance organizations. Most privately insured adolescents do not have basic dental, hearing, and vision benefits.

Approximately one-third of privately insured adolescents are not covered for maternity-related services because of a loophole in the Pregnancy Discrimination Act of 1978 (Public Law 95-555) that allows employers not to cover maternity care for adolescent daughters of employees in their health benefit plans. Congress should consider amending the act to close this loophole.

While it is not clear that physical and mental health care should be covered in precisely the same manner, there is evidence that current mental health benefits may lead to inappropriate hospitalization of adolescents and that the preferred approach to treatment, community- and family-based care, is often strictly limited or not covered at all. In addition, recent surveys of employers who provide health benefits indicate that coverage of mental health and substance abuse treatment for adolescent dependents may be in jeopardy. Inpatient treatment costs for mental health and substance abuse for adolescents are often substantially higher than for adults, and employers are finding that a rising share of their claims dollars are going towards the mental health and substance abuse care of their workers' children. As a result, many employers and health insurers are now reconsidering how and whether to cover mental health and substance abuse treatment for dependents. In fact, a recent survey of corporate benefits decisionmakers found that more than half predicted restricting or excluding coverage for dependent mental health or chemical dependency

illnesses. Congress could support an effort to develop a model health insurance benefit for mental health and substance abuse treatment for adolescents. It could also act to prevent any future erosion of benefits for adolescent dependents by requiring equivalent benefits for mental health and substance abuse for all recipients of employer-sponsored health benefits regardless of age or coverage status (i.e., subscriber or dependent).

Little is known about the extent to which private health insurance reimburses nonphysician providers who are often key players in adolescent health settings, such as school-based clinics. How nurse practitioners, psychologists, clinical social workers, and drug addiction counselors are paid for their services can be critical to the development of additional low-cost community adolescent health care resources. Although many States mandate private health insurance coverage of some nonphysician providers, especially psychologists, social workers, nurse practitioners, and clinical nurse midwives, it is not clear how many health insurance plans allow for direct payment for their services since a substantial proportion of employment-based health coverage is free from State insurance regulation. The quality of care provided by nurse practitioners and clinical nurse midwives within their areas of competence is equivalent to that provided by physicians, and these caregivers can be cost-effective substitutes for physicians in delivering many services (72). Under OBRA-89, State Medicaid programs are now required to cover certified pediatric and family nurse practitioners to the extent that they are legally authorized by State law to provide services even if they are not practicing under the supervision of, or associated with, a physician or other provider. Medicaid also mandates coverage of clinical nurse midwife services. Congress could act to mandate private insurance coverage of nurse practitioners and clinical nurse midwives to boost the availability of personnel to treat adolescents and the financial viability of school-linked and other adolescent health centers.

#### Adolescents in the Medicaid Program

The Medicaid program may be more aptly described as a confederation of 50 State programs. Although Federal guidelines determine broad eligibility and coverage criteria, each State designs and manages its own Medicaid program. Consequently, eligibility requirements, services offered, utilization

limits, and provider payment policies vary widely among the States, How well Medicaid covers poor adolescents depends to a large extent on these State-specific features.

Medicaid is a joint Federal-State entitlement program and its costs are shared by Federal and State Governments. The Federal share in each State's Medicaid program ranges from 50 to 80 percent, and in fiscal year 1990 total expenditures were projected to total approximately \$70.5 billion. Federal funds account for 56.9 percent of total Medicaid program expenditures, an estimated \$40.2 billion in fiscal year 1990. Although actual data on Medicaid expenditures for adolescents are not available, HCFA estimates that adolescents ages 10 to 18 made up 17.1 percent of Medicaid enrollment and 6.9 percent of overall Medicaid expenditures in fiscal year 1988.

One reason that so many poor adolescents are not covered by Medicaid is that eligibility has generally been linked to participation in the AFDC cash welfare program. AFDC eligibility hinges on not only whether family income and resources fall within the State's AFDC limits but also, with few exceptions, whether the family has a so-called "deprivation factor" (i.e., at least one parentis dead, disabled, continually absent from the home, or, as of October 1990, in two-parent families whose principal breadwinner is unemployed), In many cases, the States have failed to adjust the AFDC income standards for inflation and, consequently, the average income threshold as a percentage of the Federal poverty level has been eroded substantially, from 71 percent in 1975 to 47 percent in January 1990.

OTA estimates that if AFDC categorical requirements were dropped and all adolescents with family income below 100 percent of poverty were eligible for Medicaid, then approximately 1.7 million poor adolescents (38 percent of those currently uninsured) would be affected. If the current categorical requirement of a 'deprivation factor' is maintained, the potential for an expansion in Medicaid to cover significant portions of poor., uninsured adolescents is severely limited. If all adolescents in single-parent households with incomes below 100 percent of poverty were covered by Medicaid, OTA estimates that approximately 621,000 adolescents would be covered. Congress could expand Medicaid by mandating State benefits to all adolescents through age 18 with family incomes up to 100 percent of poverty

or include, as it has for children up to age six, all adolescents up to 133 percent of poverty.

As part of OBRA-89, Congress significantly expanded adolescents' and other children's access to Medicaid-covered services by its reform of the EPSDT program. Under EPSDT, States are mandated by Federal law to periodically screen Medicaideligible adolescents for any illnesses, abnormalities, or treatable conditions and refer them for definitive treatment. The OBRA-89 amendments dramatically broadened Medicaid coverage of children and adolescents by essentially eliminating any State Medicaid limitations on diagnosis or treatment for any health condition identified during the course of an EPSDT screen as long as the services are within the limits of Federal Medicaid guidelines and are deemed medically necessary. The potential for providing comprehensive health services using EPSDT will not be fully realized, however, if adolescent Medicaid recipients do not get screened. Although the program has been shown to improve children's health and reduce health care costs, use of EPSDT services is extremely low, especially in rural areas. In fiscal year 1988, average program expenditures were only \$9 per Medicaid enrollee age 20 and younger, and were directed largely towards younger children. HCFA estimates that while, in fiscal year 1988, average per enrollee expenditures for EPSDT screening were \$15 per child under age 5, they were only \$4 for adolescents ages 10 to 14 and \$3 for adolescents ages 15 to 18. Congress could act to provide direct subsidies to EPSDT outreach programs that make effective efforts to involve adolescents in EPSDT.

Even if a poor adolescent holds a Medicaid card that represents a rather rich package of health benefits, finding a private physician willing to see Medicaid patients can be a significant problem especially among some medical specialties and in certain geographic areas. Low payment rates, excessive administrative burdens, as well as other factors often discourage physicians from participating in Medicaid. Overall participation is particularly low among two specialties that are particularly important to adolescents, OB/GYN and psychiatry. OBRA-89 directed the Physician Payment Review Commission to examine the adequacy of physician payment, physician participation, and access to care by Medicaid beneficiaries and report to Congress by July 1, 1991. In considering potential Medicaid physician payment reform resulting from the Physician Payment Review Commission effort, Congress could give high priority to providers involved in direct service to adolescents.

# Conflict Between Confidentiality and Insurance Reimbursement 79

Even if appropriate benefits are available, adolescents who are concerned about confidentiality may be reluctant to seek care from providers if their private health plan requires parents to submit a claim for reimbursement (as most do). An adolescent with Medicaid coverage who must present a parent's Medicaid card to gain access to care faces the same dilemma. It may be important to evaluate the feasibility of direct funding of some particularly sensitive adolescent health services, such as pregnancy testing and early prenatal care, mental health and substance abuse counseling.

#### Summary of Policy Implications

- Congress could act to maintain current private health insurance benefits for adolescent dependents by prohibiting employer-sponsored health plans from providing more limited benefits to health plan participants (i.e., subscriber or dependent) based on age or coverage status. It could also support an effort to develop a model health insurance benefit for adolescents.
- Congress could consider amending the Pregnancy Discrimination Act of 1978 (Public Law 95-555) to close the loophole that allows employers not to cover maternity care for adolescent daughters of employees in their health benefit plans.
- Congress could support an effort to develop a model health insurance benefit for mental health and substance abuse treatment for adolescents. It could also act to prevent any future erosion of benefits for adolescent dependents by requiring equivalent benefits for mental health and substance abuse for all recipients of employer-sponsored health benefits regardless of age or coverage status (i.e., subscriber or dependent).
- Congress could act to mandate private insurance coverage of nurse practitioners and clinical nurse midwives to boost the availability of personnel to treat adolescents and the financial

- viability of school-based clinics and other adolescent health centers.
- Congress could expand Medicaid by mandating State benefits to all adolescents through age 18 with family incomes up to 100 percent of the Federal poverty level or include, as it has for children up to age 6, all adolescents up to 133 percent of the poverty level.
- Congress could act to provide direct subsidies to EPSDT outreach programs that make effective efforts to involve adolescents in EPSDT.
- Congress could give high priority to providers involved in direct service to adolescents in considering any potential Medicaid physician payment reform that results from the Physician Payment Review Commission's OBRA-89mandated effort to examine the adequacy of physician payment, physician participation, and access to care by Medicaid beneficiaries.
- Congress could consider direct funding of some particularly sensitive adolescent health services, such as pregnancy testing, early prenatal care, and mental health and substance abuse counseling.

#### **Chapter 16 References**

- 1. Alan Guttmacher Institute, "The Financing of Maternity Care in the United States," New York, NY, December 1987.
- American Academy of Pediatrics, Committee on Psychosocial Aspects of Child and Family Health, 1985-1988, "Guidelines for Health Supervision II," Elk Grove Village, IL, 1988.
- 3. American College of Physicians, "Position Paper: Access to Health Care," *Annals of Internal Medicine* 112(9):641-661, 1990.
- American Psychiatric Association, The Coverage Catalog, 2d ed. (Washington, DC: American Psychiatric Press, Inc., 1989).
- Armocida, P., Director of Utilization Management, Blue Cross and Blue Shield Association, "Statement," *Insurance Coverage of Drug and Alcohol Abuse*, hearing before the Subcommittee on Commerce, Consumer Protection and Competitiveness, Committee on Energy and Commerce, House of Representatives, U.S. Congress, Sept. 8, 1988, Serial No. 100-178 (Washington DC: U.S. Government Printing Office, 1989).
- 6. Bryant, M., "What Can Be Done for Troubled Teens," Business & *Health* 8(1):10-16, 1990.
- Burns, B., Taube, J., and Taube, C., "Mental Health Services for Adolescents," contract paper prepared for the Office of Technology Assessment, U.S. Congress, Washington DC, December 1989.
- 8. Bush, J., Bureau of Labor Statistics, U.S. Department of Labor, Washington, DC, personal communication, Nov. 6, 1989.
- Business & Health, "The 1990 National Executive Poll on Health Care Costs and Benefits," Business & Health 8(4):25-38, April 1990.
- Commerce Clearinghouse, Inc., ".51 Medical Necessity," Medicare and Medicaid-Guide, vol. 3, p. 6237-2 (Chicago, IL: 1983).

<sup>&</sup>lt;sup>79</sup>For further discussion of confidentiality issues in adolescent health care, see ch. 17, "Consent and Confidentiality in Adolescent Health Care Decisionmaking," in this volume.

- Commerce Clearinghouse, Inc., "Omnibus Budget Reconciliation Act of 1989, Summary and Text of the Law Affecting Medicare-Medicaid Programs," CCH Special 2, Medicare and Medicaid Guide, no. 603, p. 163 (Chicago, IL: Dec. 15, 1989).
- Corporate Health Strategies, "Information Management Bulletin," Westport, CT, Fall 1989.
- DiCarlo, S., and Gabel, J., "Conventional Health Insurance: A Decade Later," Health Care Financing Review 10(3):77-89, 1989.
- Employee Benefit Research Institute, "Issues in Mental Health Care," Issue Brief, No. 99, Washington, DC, February 1990.
- Employee Benefit Research Institute, "Questions and Answers on Employee Benefit Issues," Issue Brief, No. 102, Washington, DC, May 1990.
- English, A., and Tereszkiewicz, L., San Francisco, CA, "School-Based Health Clinics: Legal Issues," prepared for the National Center for Youth Law (San Francisco, CA) and Center for Population Options (Houston, TX), November 1988.
   Enthoven, A., and Kronick, R., "A Consumer-choice Health Plan
- Enthoven, A., and Kronick, R., "A Consumer-choice Health Plan for the 1990s: Universal Health Insurance in a System Designed To Promote Quality and Economy," New England Journal of Medicine 320:29-37, 94-101, 1989.
- Fairbanks, A., "Expanding Insurance Coverage to Alternative Types of Psychotherapists: Demand and Substitution Effects of Direct Reimbursement to Social Workers," *Inquiry* 26:170-181, 1989.
- 19. Fox, H., "An Analysis of Medicaid Coverage Policies Affecting Access to Children's Mental Health Services," prepared for 'The Workshop on Financing of Mental Health Services for Children and Adolescents, 'sponsored by the National Institute of Mental Health and the Bureau of Maternal and Child Health and Resources Development Public Health Service, U.S. Department of Health and Human Services, Rockville, MD, Feb. 24 and 25, 1988.
- Fox, H., memorandum to State Directors of Maternal and Child Health Services and Programs for children With Special Health Care Needs and Other Interested Persons, Washington DC, Jan. 12, 1990.
- 21. Fox, H., and Greaney, A., "A Preliminary Assessment of Disabled Children's Access to Supplemental Security Income and Medicaid Benefits," supported by a grant (#MCH-063500) from the Bureau of Maternal and Child Health and Resources Development Health Resources and Services Administration Public Health Service, U.S. Department of Health and Human Services, Rockville, MD, 1988.
- 22. Fox, H., McManus, M., Wicks, L., et al., "Medicaid Financing for Mental Health and Substance Abuse Prevention and Treatment Services," prepared for the Alcohol, Drug Abuse, and Mental Health Adminitration, Public Health Service, U.S. Department of Health and Human Services, Rockville, MD, in press, 1990.
- 23. Fox, H., and Neiswander, L., "Private Health Insurance Financing for Early Intervention Services," prepared for the Bureau of Maternal and Child Health and Resources Development, Health Resources and Services Administration Public Health Service, U.S. Department of Health and Human Services, Rockville, MD, February 1988.
- Fox, H., and Newacheck, P., "Private Health Insurance of Chronically Ill Children," Pediatrics 85(1):50-57, 1990.
- Frank, R.G., and McGuire, T. G., "A Review of Studies on the Impact of Insurance on the Demand and Utilization of Specialty Mental Health Services," Health Services Research (Part II)21:2, June 1986.
- Gabel, J., "Mandates Spur Self-Insurance," National Underwriter 46:4, Nov. 13, 1989.
- Gabel, J., Jajich-Toth, C., de Lissovoy, G., et al., "The Changing World of Group Health Insurance," *Health Affairs* 7(3):48-65, 1088
- Gabel, J., and Jensen, G., "The Price of State Mandated Benefits," Inquiry 26(4):419-431, 1989.
- Goldstein, J., and Horgan, C., "Inpatient and Outpatient Psychiatric Services: Substitutes or Complements," Hospital and Commu-

- nity Psychiatry 39(6):632-635, 1988.
- Group Health Association of America, "National Directory of HMOs, 1990," Washington DC, June 1990.
- Health Insurance Association of America, "Research Bulletin: Employer-Sponsored Health Insurance in America: Preliminary Results From the 1988 Survey," Washington DC, January 1989.
- Health Insurance Association of America, "Research Bulletin: A Profile of Employer-Sponsored Group Health Insurance in the United States," Washington, DC, February 1989.
- Health Insurance Association of America, "State Legislative and Regulatory Charts," Washington, DC, February 1989.
- Health Insurance Association of America, "Research Bulletin: The Health Insurance Picture in 1988," Washington, DC, July 1989.
- Health Insurance Association of America, "Research Bulletin: The Cost of Maternity Care and Childbirth in the United States, 1989," Washington, DC, December 1989.
- Health Insurance Association of America, unpublished data from the 1989 Survey of Employer-Sponsored Group Health Insurance, Washington DC, 1990.
- Health Policy Corporation of Iowa, "Financial Access to Health Care in Iowa," Des Moines, IA, April 1988.
- 38. Horgan, C., and McGuire, T., "Financing Child and Adolescent Inpatient Mental Health Services Through Private Insurance," paper presented at "he Invitational Workshop on the Financing of Mental Health Services for Children and Adolescents, sponsored by the National Institute of Mental Health, Alcohol, Drug Abuse, and Mental Health Administration, Public Health Service, U.S. Department of Health and Human Services, Bethesda, MD, Feb. 24 and 25, 1988.
- Intergovernmental Health Policy Project, "Selected Mandated Benefit Proposals and Laws in 1989 State Legislative Sessions (as of October 1989)," Washington DC, October 1989.
- 40. Interstudy, "The Organization and Delivery of Mental Health, Alcohol, and Other Drug Abuse Services Within Health Maintenance Organimations: Chartbook, Volumes II and III," prepared for the Division of Biometry and Applied Sciences, National Institute of Mental Health, Alcohol, Drug Abuse, and Mental Health Administration, Public Health Service, U.S. Department of Health and Human Services, Rockville, MD, July 1988.
- Jensen, G., and Gabel, J., "The Erosion of Purchased Health Insurance," *Inquiry* 25(3):328-343, 1988.
- Jensen, G., and Gabel, J., "State Mandated Benefits and the Small Firm's Decision To Offer Insurance," working paper, University of Illinois at Chicago, March 1989.
- Kosterlitz, J., "Seeking the Cure," *National Journal* 12:708-714, *Mar.* 24, 1990.
- 44. Kronick, R., Adolescent Health Insurance Status: Analyses of Trends in Coverage and Preliminary Estimates of the Effects of an Employer Mandate and Medicaid Expansion-Background Paper, prepared under contract to the Carnegie Council on Adolescent Development and Carnegie Corporation of New York, for the Office of Technology Assessment, U.S. Congress, OTA-BP-H-56 (Washington DC: U.S. Government Printing Office, July 1989).
- 44a. Kronick, R., Adjunct Professor, University of California, San Diego, CA, calculations based on U.S. Department of Commerce, Bureau of the Census, March 1989 Current Population Survey public use files, 1990.
- Kronick, R., "Update: Adolescent Health Insurance Status," contract paper prepared for the Office of Technology Assessment, U.S. Congress, Washington, DC, March 1990.
- Levin, B., "Continued Changing Patterns in Coverage and Utilization of Mental Health, Alcohol, and Substance Abuse Within HMOS," GHAA Journal, pp. 17-27, Winter 1987/1988.
- 47. Lohr, K., "Use of Medical Care in the Rand Health Insurance Experiment: Diagnosis- and Service-Specific Analyses in a Randomized Controlled Trial," *Rand Health Insurance Experiment Series*, Santa Monica, CA, December 1986.

- 48 McManus, P., Fox, H., Newacheck, P., et al., unpublished data from a 1989 survey of State Medicaid programs, supported by a grant (# MCH-063500) from the Bureau of Maternal and Child Health and Resources Development, and the Bureau of Health Care Delivery and Assistance, Health Resources and Services Administration, Public Health Service, U.S. Department of Health and Human Services, Rockville, MD, 1989.
- Mezzich, J., and Coffman, G., "Economic Grand Rounds: Factors Influencing Length of Stay," Hospital and Community Psychiatry 36(12): 1262, 1985.
- Morrisey, M., and Jensen, G., "Employer-Sponsored Insurance Coverage for Alcoholism and Drug-Abuse Treatments," Journal of Studies on Alcohol 49(5):456-451, 1988.
- National Governors' Association, "Broadening Medicaid Coverage of Pregnant Women and Children: State Policy Responses," Washington DC, February 1987.
- National Governors' Association, "Increasing Provider Participation," Washington DC, 1988.
- National Governors' Association "MCH Update-State Coverage for Pregnant Women and Children," Washington, DC, January 1990.
- National Health Policy Forum, "EPSDT and Increased Health Care for Low-Income Children: Prospects and Problems for the States," Issue Brief No. 539, Washington, DC, February 1990.
- Newacheck, P., "Access to Ambulatory Care for Poor Persons," Health Services Research 23:3, 1988.
- New York State Council on Health Care Financing, Report of the Subcommittee on Health Uninsurance: Policy Options for the Uninsured in New York State (Albany, NY: 1988).
- Northwestern National Life Insurance Co., "Dependent Health Care: Seven Steps To Reduce Cost," Minneapolis, MN, 1989.
- Oregon Department of Human Resources, Office of Health Policy, "Explanation of New Mandated Insurance Benefit Requirements for Mental Illness and Chemical Dependency, Based on SB 31," Salem, OR, Apr. 21, 1988.
- 59. Oregon State Health Planning and Development Agency, "Second Report on Oregon's Experience With Remodeling Insurance Benefits for Mental Health and Chemical Dependency, Report to the 64th Oregon Legislative Assembly on Implementation of Chapter 601, Oregon Laws 1983, Salem, OR, Dec. 15, 1986.
- Rosenbach, M., "The Impact of Medicaid on Physician Use by Low-Income Children," Amen" can Journal of Public Health 79(9):1220-1226, 1989.
- Sloan, F., Blumstein, J., Perrin, J., et al., Uncompensated Hospital Care: Defining Rights and Assigning Responsibilities (Baltimore, MD: Johns Hopkins University Press, 1986).
- Tanner, N., "Health Maintenance in Adolescents," Adolescent Medicine, A. Hofmann and D. Greydanus (eds.) (Norwalk, CT, and San Mateo, CA: Appleton & Lange, 1989).
- Taube, C., Goldman, H., and Salkever, D., "Medicaid Coverage for Mental Illness: Balancing Access and Costs," *Health Affairs*, pp. 5-18, Spring 1990.
- Tsai, S., Reedy, S., Bernacki, E., et al., "Effect of Curtailed Insurance Benefits on Use of Mental Health Care, *Medical Care* 26(4):430-440,1988.
- 65. U.S. Congress, General Accounting Office, Prenatal Care: Medicaid Recipients and Uninsured Women Obtain Insufficient Care, Report to the Chairman, Subcommittee on Human Resources and Intergovernmental Relations, Committee on Government Operations, House of Representatives, U.S. Congress, HR.B87-137 (Washington, DC: U.S. Government Printing Office, 1987).
- 66 U.S. Congress, General Accounting Office, Medicaid: Views on Changes Needed in Mental Health Benefits, Report for the Honorable Daniel K. Inouye, U.S. Senate, HRD-88-96FS (Washington, DC: U.S. Government Printing Office, September 1988).
- 67 U.S. Congress, General Amounting Office, Health Insurance: Cost Increases Lead to Coverage Limitations and Cost Shifting, Report to the Chairmen, Committee on Energy and Commerce and Its Subcommittee on Health and the Environment, House of

- Representatives, U.S. Congress, **HRD-90-68** (Washington DC: U.S. Government Printing Office, 1990).
- 68, U.S. Congress, House of Representatives, Committee on the Budget, Report of the Committee on the Budget, House of Representatives To Accompany H.R. 3299, Report 101-247 (Washington, DC: U.S. Government Printing Office, 1989).
- 68a. U.S. Congress, House of Representatives, "Omnibus Budget Reconciliation Act of 1990, Conference Report to Accompany H.R. 5835, 'Report 101-964 (Washington, DC: U.S. Government Printing Office, 1990).
- U.S. Congress, Library of Congress, Congressional Research Service, Medicaid Source Book: Background Data and Analysis (Washington DC: U.S. Government Printing Office, 1988).
- U.S. Congress, Library of Congress, Congressional Research Service, Cost and Effects of Extending Health Insurance Coverage (Washington DC: U.S. Government Printing Office, 1989).
- U.S. Congress, Library of Congress, Congressional Research Service, Medicaid: FY 91 Budget and Child Health Initiatives (Washington DC: U.S. Government Printing Office, Feb. 12, 1990).
- U.S. Congress, Office of Technology Assessment, Nurse Practitioners, Physician Assistants, and Certified Nurse-Midwives: A Policy Analysis OTA-HCS-37 (Washington DC: U.S. Government Printing Office, December 1986).
- U.S. Congress, Office of Technology Assessment, Healthy Children: Investing in the Future, OTA-H-345 (Washington, DC: U.S. Government Printing Office, 1988).
- U.S. Congress, Pepper Commission (U.S. Bipartisan Commission on Cornprehensive Health Care), "A Call for Action," Final Report, Washington, DC, September 1990.
- U.S. Congress, Physician Payment Review Commission Annual Report to Congress, 1990 (Washington, DC: U.S. Government Printing Office, March 1990).
- U.S. Department of Commerce, Bureau of the Census, *Statistical Abstracts of the United States*, 1988, 108th ed. (Washington DC: U.S. Government Printing Office, 1987).
- U.S. Department of Commerce, Bureau of the Census, Current Population Survey public use files for March 1979-March 1989, Washington, DC, 1989-90.
- U.S. Department of Health and Human Services, Family Support Administration, Office of Family Assistance, 1987 AFDC Recipient Characteristics Study (Washington, DC: U.S. Government Printing Office, 1989).
- U.S. Department of Health and Human Services, Health Care Financing Administration% *State Medicaid Manual*, Part 5-Early and Periodic Screening, Diagnosis, and Treatment, Transmittal No. 3, HCFA Pub. 45-5, Washington, DC, April 1990.
- U.S. Department of Health and Human Services, Health Care Financing Administration, Division of Intergovernmental Affairs, Medicaid Services State by State, HCFA Pub. No. 02155-90 (Washington DC: U.S. Government Printing Office, October 1980)
- U.S. Department of Health and Human Services, Health Care Financing Administration, Office of the Actuary, unpublished HCFA-2082 data on Medicaid expenditures and enrollment in fiscal year 1988, Baltimore, MD, June 1990.
- 82. U.S. Department of Health and Human Services, Public Health Service, Agency for Health Care Policy and Research, Nursing Strategies To Encourage Medical Screening of Poor Children To Be Tested, Research Activities No. 127 (Rockville, MD: March 1989)
- U.S. Department of Labor, Bureau of Labor Statistics, Employee Benefits in State and Local Governments, 1987, Bulletin 2309 (Washington, DC: U.S. Government Printing Office, May 1988).
- 84. U.S. Department of Labor, Bureau of Labor Statistics, Employee Benefits in Medium and Large Firms, 1988, Bulletin 2336 (Washington, DC: U.S. Government Printing Office, August 1989)

- 85. U.S. Preventive Services **Task Force**, Guide to Clinical Preventive Services" (Baltimore, MD: Williams & **Wilkens**, **1989**).
- 86. Weithorn, L., "Mental Hospitalization of Troublesome Youth: An Analysis of Skyrocketing Admission Rates," Stanford Law
- Review 40:773-838, 1988.
- 87. Yudkowsky, B., Cartland, J., and Flint, S., "Pediatrician Participation in Medicaid: 1978 to 1989," *Pediatrics* 85(4):567-577, 1990.