

# The Current and Projected Taxpayer Shares of US Health Costs

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**Objectives.** We estimated taxpayers' current and projected share of US health expenditures, including government payments for public employees' health benefits as well as tax subsidies to private health spending.

**Methods.** We tabulated official Centers for Medicare and Medicaid Services figures on direct government spending for health programs and public employees' health benefits for 2013, and projected figures through 2024. We calculated the value of tax subsidies for private spending from official federal budget documents and figures for state and local tax collections.

**Results.** Tax-funded health expenditures totaled \$1.877 trillion in 2013 and are projected to increase to \$3.642 trillion in 2024. Government's share of overall health spending was 64.3% of national health expenditures in 2013 and will rise to 67.1% in 2024. Government health expenditures in the United States account for a larger share of gross domestic product (11.2% in 2013) than do total health expenditures in any other nation.

**Conclusions.** Contrary to public perceptions and official Centers for Medicare and Medicaid Services estimates, government funds most health care in the United States. Appreciation of government's predominant role in health funding might encourage more appropriate and equitable targeting of health expenditures. (*Am J Public Health*. 2016;106:449–452. doi:10.2105/AJPH.2015.302997)

 See also Galea and Vaughan, p. 394.

The United States has the world's highest per capita health care costs—about double those of other wealthy nations.<sup>1</sup> According to both official figures and public perception, most health care funding in the United States comes from private payers. For instance, the Centers for Medicare and Medicaid Services (CMS) estimates that federal, state, and local governments accounted for 43% of health expenditures in 2013.<sup>2</sup>

These official figures reflect an accounting framework based on who wrote the final check as money flowed from households or employers to health care providers, and exclude many indirect government health expenditures. Thus, when government pays for veterans' care, CMS classifies it as a public expenditure because government writes the checks that fund the Veterans Health Administration. But CMS classifies government-paid health benefits for senators or Federal Bureau of Investigation agents as

“private” expenditures because a private insurer pays the claims. Moreover, the tax subsidies that fund a significant share of private health expenditures (e.g., private-employer spending) are not counted by CMS as government health spending, although the Office of Management and Budget (OMB) tabulates these subsidies as “tax expenditures” in official budget documents.<sup>3</sup>

In a previous study, we estimated that the public share of US health spending—after inclusion of these tax subsidies and government payments for public employees' health benefits—amounted to 59.8% of the total in 1999, nearly double the 1965 figure.<sup>4</sup> The current study provides detailed estimates of

direct and indirect government health spending in 2013, as well as projected figures through 2024.

## METHODS

We estimated total taxpayer expenditures for health care by summing 3 types of expenditures: (1) direct government payments for Medicare, Medicaid, and other public programs such as the Veterans Health Administration, the National Institutes of Health, and public health departments; (2) government agencies' expenditures for public employees' health insurance coverage; and (3) federal, state, and local tax subsidies to health care.

To estimate direct government payments for health care, as well as government agencies' expenditures for public employees' health benefits, we used figures from the national health expenditure projections prepared by CMS's Office of the Actuary.<sup>5,6</sup>

To calculate the value of health care–related tax subsidies, we first obtained the OMB's official estimates of the value of the federal income tax and payroll tax subsidies to health care and health insurance each year.<sup>3</sup>

Like the federal government, state (and local) governments do not include the value of employer-paid health benefits when calculating income and income tax liability. Hence, we estimated state and local income tax subsidies in 2013 by multiplying the value of the federal income tax subsidy by the ratio of (local + state) income tax receipts to federal income tax receipts. We calculated this ratio with data from the Census Bureau's quarterly surveys of state and local tax receipts<sup>7</sup> and

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Internal Revenue Service data on federal income tax receipts.<sup>8</sup> For future years, we assumed that the ratio would remain at the 2013 level.

The OMB’s estimates of health-related tax subsidies include tax subsidies to government employees, and we had already included the entire government contribution to its employees’ health benefits as a tax-financed expenditure. Hence, to avoid double-counting, we adjusted the tax subsidy estimates downward to exclude government employees based on government employers’ share of total employer-paid premiums as detailed in the CMS actuaries’ projections.<sup>4</sup>

These methods emulate those we used to estimate public spending in 1999,<sup>4</sup> with 1 modification. In the past, we used multiple data sources and complex methods to estimate payroll tax subsidies because no official figures for these subsidies were available. In 2008, OMB began providing such figures, which serve as the basis for our current estimates. Compared with our older method, use of the more accurate OMB figure increases our estimate of government’s share by about 0.7%.

Finally, to offer perspective on the US taxpayer-funded health expenditures, we compared them to figures for several other developed nations by using data from the Organization for Economic Cooperation and Development (OECD).<sup>1</sup>

We carried out data management and analyses with Microsoft Excel 2003 (Microsoft, Redmond, WA).

## RESULTS

Tax-funded expenditures for health care totaled \$1.877 trillion in 2013 (\$5960 per capita) (Table 1). Tax-funded expenditures’ share of overall health spending was 64.3% of total health expenditures in 2013. Projections suggest that government’s share will rise to 67.1% in 2024.

Medicare will remain the largest category of tax-funded expenditures, rising from 20.1% of overall expenditures in 2013 to 22.5% in 2024 (Table 2). Medicaid’s share rose more than 1% between 2013 and 2015, coincident with the rollout of the Affordable Care Act’s (ACA’s) Medicaid expansion, and is projected to stabilize at about 17% of national health spending.

**TABLE 1—Tax-Financed Health Expenditures (Billions of Dollars): United States, 2013–2024**

Expenditure	2013	2014	2015	2020	2024
<b>Total national health expenditures</b>	<b>2919</b>	<b>3080</b>	<b>3244</b>	<b>4274</b>	<b>5425</b>
<b>Direct government health expenditures<sup>a</sup></b>					
Medicare	585.7	616.8	646.0	905.7	1221.3
Medicaid or Children’s Health Insurance Program	462.9	517.0	559.6	728.6	914.6
Other health programs	345.9	353.5	366.0	485.1	611.3
<b>Government expenditures for public employees’ health benefits</b>					
Federal government	32	33	34	40	49
State or local governments	156	169	177	239	307
<b>Tax subsidies for private employer-paid health insurance and other privately paid care</b>					
Federal government	249.2	262.7	276.4	345.9	453.2
State or local governments	45.7	47.4	49.8	63.5	85.7
<b>Total tax-financed expenditures</b>	<b>1877.4</b>	<b>1999.4</b>	<b>2108.8</b>	<b>2807.8</b>	<b>3642.1</b>
<b>Tax-financed expenditures as a percentage of total national health expenditures, %</b>	<b>64.3</b>	<b>64.9</b>	<b>65.0</b>	<b>65.7</b>	<b>67.1</b>

Note. Figures for 2013 are based on actual expenditures; 2014–2024 are based on Centers for Medicare and Medicaid Services and Office of Management and Budget projections.

<sup>a</sup>Equivalent to traditional Centers for Medicare and Medicaid Services tabulation of government’s share of expenditures.

Tax subsidies to private health spending totaled \$294.9 billion in 2013, and are expected to remain about 10% of total health expenditures through 2024. Federal income and payroll tax subsidies account for more than 80% of these tax expenditures, with state and local income tax subsidies accounting for the rest. The vast majority of tax expenditures subsidize employer-sponsored coverage; subsidies to out-of-pocket expenditures account for only 4.1% of the total.

Government employers currently account for 28% of all employer payments for private health insurance, a figure that is projected to rise to 31% in 2024. Most of these expenditures (more than four fifths) are made by state and local governments.

Private employers’ spending for health insurance premiums as a share of national health expenditures reached a high of 18.5% in 2000 to 2001, falling to 16.7% in 2013, and are expected to decline to 14.5% in 2024. (These figures do not take account of tax subsidies, which would reduce these estimates by more than one third.)

As is well known, US health care costs are far higher than those in any other nation (Table 3). However, the high level of tax-funded spending in the United States receives less attention. Indeed, tax-funded health

expenditures in the United States account for a larger share of gross domestic product (11.2% in 2013) than do total health expenditures in any other nation.

## DISCUSSION

Americans pay the world’s highest health-related taxes. Yet many perceive that US health care financing system is predominantly private, in contrast to the universal tax-funded health care systems in nations such as Canada, France, or the United Kingdom. By 2024, government expenditures in the United States are expected to account for more than two thirds of national health spending. This is nearly the same proportion as in Canada, where official figures put government’s share at 70.7% (although this figure excludes modest tax subsidies for supplemental private coverage).

Even as overall US health expenditures soared over the past half century, taxpayers’ share grew substantially. After correction for differences in the methods used to estimate tax subsidies, the public share increased from about 31% in 1965 (before Medicare and Medicaid) to about 56% in 1980, 60% in 1999,<sup>4</sup> and 64.3% in 2013.

**TABLE 2—Tax-Financed Health Expenditures as a Percentage of Total Health Expenditures and of Gross Domestic Product: United States, 2013–2024**

Category of Expenditure	2013, %	2014, %	2015, %	2020, %	2024, %
Medicare	20.1	20.0	19.9	21.2	22.5
Medicaid	15.9	16.8	17.3	17.0	16.9
Other government health program <sup>a</sup>	11.8	11.5	11.3	11.4	11.3
Public employee benefits	6.4	6.6	6.5	6.5	6.6
Tax subsidies	10.1	10.1	10.1	9.6	9.9
Total tax-financed expenditures as a percentage of total national health expenditures	64.3	64.9	65.0	65.7	67.1
Total tax-financed health expenditures as a percentage of gross domestic product	11.2	11.5	11.7	12.2	13.2

Note. Figures for 2013 are based on actual expenditures; 2014–2024 are based on Centers for Medicare and Medicaid Services and Office of Management and Budget projections.

<sup>a</sup>Includes health spending by the Department of Defense, Department of Veterans Affairs, Indian Health Services, the National Institutes of Health, maternal and child health programs, school health, public health activities, and other smaller categories of federal, state, and local health spending.

This trend seems likely to continue. The expected uptick in government's share is attributable both to the effects of the ACA and to population aging, which will push Medicare enrollment up by 37% (19.0 million persons) between 2013 and 2024. Medicaid enrollment, which rose rapidly between 2013 and 2015 because of the ACA's Medicaid expansion, is expected to increase by a further 10.8% (7.6 million) between 2015 and 2024.

Overall, the share of the population covered by Medicare and Medicaid is expected to rise from 36.9% in 2013 to 44.6% in 2024. Meanwhile, the ACA is expected to provide \$99 billion in government subsidies for private coverage in 2024.<sup>9</sup>

Several caveats apply to our findings. As in any forecast, our projections could prove inaccurate because of economic fluctuations or unforeseen changes in health or tax policy.

Official health and tax expenditure figures provided the raw data for our estimates; however, in several instances we made adjustments to avoid double-counting, and to estimate the magnitude of state and local tax subsidies for health care. Our analysis adopts the perspective that health care–related tax subsidies are tantamount to tax expenditures—an assumption that is widely shared within the policy community and by the OMB. Our analysis may slightly understate public expenditures as we did not include tax subsidies for nonprofit hospitals, which were estimated at \$24.6 billion in 2011,<sup>10</sup> about 1% of health spending. Our international comparisons rely on data from the Organization for Economic Cooperation and Development. Despite that organization's attempts to harmonize expenditure categories and definitions across nations, some differences may cloud comparisons. Finally, our figures for the public share of expenditures in other Organization for Economic Cooperation and Development nations exclude tax subsidies for their relatively small private insurance sectors (Switzerland does not offer tax subsidies for employer-paid insurance).

Public funds help the vast majority of Americans pay for care, but these funds flow through many different spigots. The funding streams for the poor, the elderly, veterans, family planning, and public sector workers are visible and hotly debated. Meanwhile, the hundreds of billions in tax subsidies that disproportionately benefit wealthier Americans have drawn far less public attention.

Although taxpayers fund the vast majority of health spending, overall priorities for this funding are rarely discussed. Appreciation of the magnitude of government funding might encourage more explicit, appropriate, and equitable targeting of these expenditures as components of a total health budget. **AJPH**

#### CONTRIBUTORS

Both authors contributed equally to all aspects of this work.

#### HUMAN PARTICIPANT PROTECTION

This research did not involve human participants. No institutional review board approval was sought for this research.

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**TABLE 3—Total and Tax-Funded Health Expenditures: United States and Other Developed Nations, 2013**

Country	Total Spending Per Capita, PPP \$	Total Spending as Share of GDP, %	Tax-Funded Spending Per Capita, PPP \$	Tax-Funded Spending as Share of GDP, %
Canada	4351	10.2	3074	7.2
France	4124	10.9	3247	8.6
Germany	4819	11.0	3677	8.4
Italy	3077	8.8	2381	6.8
Japan	3713	10.2	3090	8.5
Netherlands	5131	11.1	4495	9.7
Sweden	4904	11.0	4126	9.2
Switzerland	6325	11.1	4178	7.3
United Kingdom	3235	8.5	2802	7.3
OECD average (excluding United States)	3226	8.8	2443	6.5
United States	9267	17.4	5960	11.2

Note. GDP = gross domestic product; OECD = Organization for Economic Cooperation and Development; PPP = purchasing power parity. US figures are from national health expenditure accounts; figures for other nations are from OECD data. Figures for tax-funded spending in nations other than the United States exclude tax subsidies to private spending; Switzerland does not offer tax subsidies for employer payments for coverage.

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