How Does Growth in Health Care Costs Affect the American Family?

When the price of a gallon of gas or a pound of hamburger rises, consumers can anticipate how the increase will affect what they have left to spend on other goods. It is far less obvious to consumers how increases in health care costs hit their pocketbooks. In the ten-year period between 1999 and 2009, U.S. health care spending nearly doubled, climbing from $1.3 trillion to $2.5 trillion. In 2009, while the rest of the U.S. economy plunged into recession and millions lost their jobs, health care costs grew by 4 percent. As a result, the percentage of our nation’s gross domestic product (GDP) devoted to health care reached 17.6 percent, up from 13.8 percent only ten years earlier. Although these numbers are striking, they do not easily translate into figures that are meaningful to individual Americans.

To paint an accurate picture of how health care cost growth is affecting the finances of a typical American family, RAND Health researchers combined data from multiple sources to depict the effects of rising health care costs on a median-income married couple with two children covered by employer-sponsored insurance. The analysis compared the family’s health care cost burden in 1999 with that incurred in 2009. The take-away message: Although family income grew throughout the decade, the financial benefits that the family might have realized were largely consumed by health care cost growth, leaving them with only $95 more per month than in 1999. Had health care costs tracked the rise in the Consumer Price Index, rather than outpacing it, an average American family would have had an additional $450 per month—more than $5,000 per year—to spend on other priorities.

Key findings:

- Health care expenditures, including insurance premiums, out-of-pocket expenditures, and taxes devoted to health care, nearly doubled between 1999 and 2009.
- This increase has substantially eroded what an average family has left to spend on everything else, leaving them with only $95 more per month than in 1999.
- Had health care costs tracked the rise in the Consumer Price Index, rather than outpacing it, an average American family would have had an additional $450 per month—more than $5,000 per year—to spend on other priorities.

How Do Health Care Costs Affect Available Income?
Health care costs affect family finances in four ways:

- the family’s share of the health insurance premium (not taxed)
- out-of-pocket spending—e.g., for co-pays, deductibles, and prescriptions
- the employer’s share of the health insurance premium (not taxed)

This research highlight summarizes RAND Health research reported in the following publication:
• the portion of the family’s federal and state taxes devoted to government health programs—e.g., Medicaid, Medicare, veterans’ health care, and public health.

These first two categories of these costs—family premiums and out-of-pocket spending—are readily visible to families. But the other two are largely hidden from view. Although employers pay a large share of employees’ health insurance premiums, most economists agree that this money would otherwise be paid out as additional wages. And few taxpayers realize how large a share of their state and federal taxes goes to cover the costs of Medicare, Medicaid, and other government health programs.

**Components of Health Care Spending for the Typical Family: 1999 and 2009**

The table provides a snapshot of how a typical family’s health care expenditures changed between 1999 and 2009. Over this ten-year period, the monthly cost of a typical family health insurance premium contribution, after adjusting for taxes, more than doubled, rising from $85 to $195. During the same period, the tax-adjusted employer contribution to health insurance more than doubled as well, rising from $240 to $550 per month. Because these extra payments represented forgone wages, the family’s total premium cost grew from $325 to $745 per month. Out-of-pocket health care spending also rose sharply, largely because of steeper co-pays and deductibles, as well as higher prices for drugs and medical supplies.

How much did a typical family spend on government health programs? In 1999, 20 percent of federal spending was allocated to Medicare, Medicaid, and other public health programs. Using this figure as a rough estimate of the share of the family’s taxes spent on federal and state-funded health services, RAND researchers estimated that the family’s monthly tax bill for government health care was $345 in 1999 and $440 in 2009. The latter number would have been far higher if the government had collected enough taxes to cover health care spending. Instead, it added the difference to the federal budget deficit.

When these payments are added together, the family’s monthly price tag for health care in 2009, even with tax breaks, was $1,420. This is nearly twice what the typical family paid in 1999.

**How Did Health Care Spending Affect Buying Power?**

Between 1999 and 2009, the typical family’s monthly before-tax income grew by about $1,910. But not much of this money stayed in the family’s coffers. Instead, increases in the price of consumer goods and non–health care taxes absorbed 52 percent. Most of the rest was consumed by higher health care costs. This left the average family with only $95 more per month than in 1999.

However, even this is an inaccurately rosy picture. Unlike 1999, when the federal budget was in surplus, part of the federal spending on health care in 2009 was financed by borrowing, rather than by tax collections. If taxes had kept pace with growth in federal health care spending during this period, the typical family would have paid out an additional $390 per month in taxes—and ended up with a deficit of $295 per month (see the first pair of bars in the figure).

**The Effects of Different Rates of Health Care Cost Growth on a Typical Family’s Monthly Net Income in 2009 Compared with 1999**

<table>
<thead>
<tr>
<th>Category of Spending</th>
<th>1999</th>
<th>2009</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee premium contribution</td>
<td>$85</td>
<td>$195</td>
</tr>
<tr>
<td>Employer premium contribution</td>
<td>$240</td>
<td>$550</td>
</tr>
<tr>
<td>Out-of-pocket spending</td>
<td>$135</td>
<td>$235</td>
</tr>
<tr>
<td>Taxes devoted to health care</td>
<td>$345</td>
<td>$440</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>$805</strong></td>
<td><strong>$1,420</strong></td>
</tr>
</tbody>
</table>

SOURCE: Author calculations from multiple sources.
NOTE: Dollar amounts reported are nominal amounts for that year.
Would Slower Health Care Cost Growth Boost Available Family Income?
To estimate the effect of health care cost growth on the family’s finances, the RAND researchers recalculated the family’s available income under two different scenarios. In the first scenario, they assumed that health care costs grew 1 percentage point faster than GDP, rather than the far higher rate at which they actually grew. (GDP plus 1 percent is the target rate of growth for Medicare spending under the Affordable Care Act, it is the actual rate at which health spending grew in Germany and Switzerland over the past decade, and it is the rate of health care cost growth that occurred in the United States between 1990 and 1999.) In the second scenario, the researchers assumed that health care costs tracked the overall rate of inflation, as reflected in the Consumer Price Index.

The figure highlights how both assumptions would affect the family’s income. Even after accounting for deficit spending, the amount of a family’s income that would be retained under either scenario would be substantially larger than the actual amount retained.

Is the Nation Getting Sufficient Value for Its Health Care Spending?
In 2009, health care spending accounted for nearly 18 percent of GDP. What did Americans get in return for devoting such a large portion of their surplus income to health care?

One thing they got was more frequent use of costly health care technology. Use of advanced diagnostic imaging, such as CT scans and MRIs, grew dramatically. But by most measures, this extra spending did not buy appreciably better health. In 2009, average life expectancy for a U.S. adult was roughly one year longer than it had been a decade earlier. But that gain was less than half that achieved by the other 34 countries in the Organisation for Economic Co-operation and Development during the same time period. More disturbing still, the United States has now fallen to 19th among 19 high-income countries in preventing deaths from common health conditions that doctors know how to treat.

Health Care Cost Growth—the Defining Challenge of Our Time
The complex ways in which Americans pay for health care obscure the impact of health care cost growth on the finances of American families. The RAND analysis demonstrates that over the past decade, health care cost growth has consumed a large share of the disposable income of the average American family. Heavy spending on government health care programs is also adding to the federal budget deficit. These sobering facts provide further evidence that lowering health care costs is one of the most important challenges of our time.
The RAND Corporation is a nonprofit institution that helps improve policy and decisionmaking through research and analysis.

This electronic document was made available from www.rand.org as a public service of the RAND Corporation.

Support RAND

- [Browse Reports & Bookstore](#)
- [Make a charitable contribution](#)

For More Information

- Visit RAND at [www.rand.org](http://www.rand.org)
- Explore [RAND Health](#)
- View [document details](#)

Research Brief

This product is part of the RAND Corporation research brief series. RAND research briefs present policy-oriented summaries of individual published, peer-reviewed documents or of a body of published work.

Limited Electronic Distribution Rights

This document and trademark(s) contained herein are protected by law as indicated in a notice appearing later in this work. This electronic representation of RAND intellectual property is provided for non-commercial use only. Unauthorized posting of RAND electronic documents to a non-RAND website is prohibited. RAND electronic documents are protected under copyright law. Permission is required from RAND to reproduce, or reuse in another form, any of our research documents for commercial use. For information on reprint and linking permissions, please see [RAND Permissions](#).