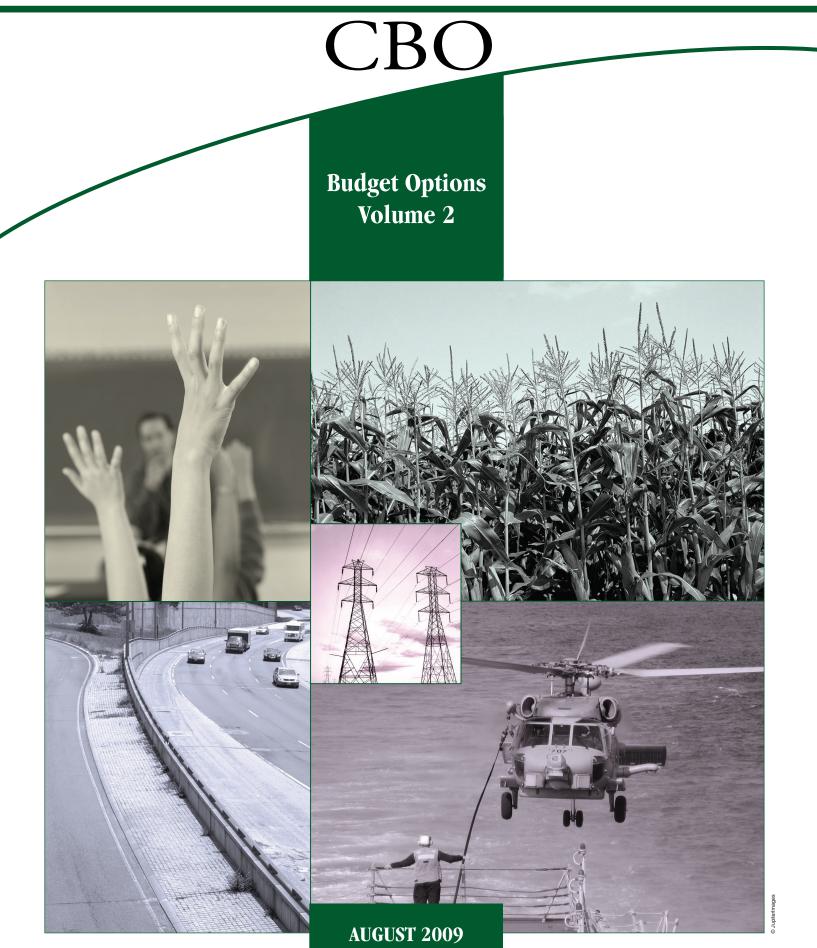
#### CONGRESS OF THE UNITED STATES CONGRESSIONAL BUDGET OFFICE





# Budget Options Volume 2

August 2009

The Congress of the United States 
Congressional Budget Office

## Notes

Unless otherwise indicated, all years referred to in this report are federal fiscal years, which run from October 1 to September 30.

The numbers in the text and tables are in nominal dollars (and thus do not reflect adjustments for inflation). Those numbers may not add up to totals because of rounding.

The estimates for budget options shown in this report may differ from any subsequent cost estimates for legislative proposals that resemble the options presented here.

On the cover: classroom and cornfield, JupiterImages; power lines, U.S. Department of Energy photo; SH-60B Seahawk helicopter, U.S. Navy photo by Ensign Colleen Praxmarer; highway entrance and exit, photo by Maureen Costantino.



## Preface

his volume—one of several reports the Congressional Budget Office (CBO) provides regularly to the House and Senate Committees on the Budget—presents 188 options for altering federal spending and revenues. Volume 1, issued in December 2008, addressed options related to federal spending on health care programs or to the nation's health insurance system. This second volume presents options that involve other aspects of the federal budget. It aims to help policymakers in their annual tasks of making budgetary choices and setting priorities.

The options discussed in this report stem from a variety of sources, such as legislative proposals, the President's budget, Congressional and CBO staff, other government agencies, and private groups. They are intended to reflect a range of possibilities rather than to provide a ranking or a comprehensive list. The inclusion or exclusion of a particular policy change does not represent an endorsement or rejection by CBO. In keeping with CBO's mandate to provide objective and nonpartisan analysis, the report makes no recommendations.

*Budget Options* begins with an introductory chapter that provides an overview of the volume and explains how the options work. Chapter 2 presents options that affect spending, organized by the functional categories of the budget (national defense; international affairs; general science, space, and technology; and so forth). The options for each budget function are introduced with a page of background information about spending in that function. Chapter 3 contains options that affect revenues from various kinds of taxes and fees. The appendix lists the many CBO staff members who contributed to the report. This volume is available on CBO's Web site (www.cbo.gov).

Douglas W. Elmendap

Douglas W. Elmendorf Director

August 2009



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he Congressional Budget Office (CBO) generally issues a biennial compendium of budget options to help inform federal lawmakers about the implications of various policy choices. For the current budget cycle, CBO is presenting the budget options in two volumes. The first volume, issued in December 2008, focused on health care and its financing.<sup>1</sup> This volume presents options that address other areas of federal spending and revenues. The latest *Budget Options* volumes are intended to help policymakers assess the effects on spending or revenues of the types of choices they could face in the 111th Congress.

In that context, this report presents 188 illustrative options that cover an array of programs and policy areas—from defense to energy to entitlement programs to provisions of the tax code. The options include some changes that would decrease spending and others that would increase it; some changes that would reduce revenues and some that would raise them. In keeping with CBO's mandate to provide objective, impartial analysis, the report makes no recommendations.

The options in this volume come from legislative proposals, the President's budget, Congressional and CBO staff, other government entities, and private groups, among others. They are intended to reflect a range of possibilities, not a ranking of priorities. The selection does not represent an endorsement or rejection by CBO of any particular option, and the report does not recommend specific changes or provide a comprehensive list of policy alternatives.

The budgetary effects shown for each option span the 10 years from 2010 to 2019 (the period covered by CBO's March 2009 baseline budget projections). Some options would have significant effects beyond that horizon.

Comprehensive discussions of long-term budgetary pressures—especially those that affect Medicare, Medicaid, and Social Security—appear in other CBO reports.<sup>2</sup> And although rapidly rising health care costs are the most significant factor contributing to the long-term fiscal imbalance the nation faces—and there are particularly difficult challenges in health-related programs—other areas of the budget could afford opportunities to narrow future budget deficits.

## The Options in This Volume

Chapter 2 of this report details spending options classified according to the functional categories of the federal budget: national defense (050); international affairs (150); general science, space, and technology (250); and so on. An introductory page for each function provides summary information and data on total spending since 2004. Chapter 3 discusses options that affect revenues from many different kinds of federal taxes and fees. (Some revenue options that are related to the subject matter of the various budget functions are noted on the introductory pages to the functions in Chapter 2.)

Each option includes a table showing its estimated effect on spending or revenues in each year from 2010 to 2014 and summary projections for 5 and 10 years. The accompanying discussion provides background, describes the policy change envisioned in the option, and summarizes arguments for and against the change. As appropriate, citations are given to related options and relevant CBO publications.

For options that concern mandatory spending, CBO estimated budgetary effects relative to spending as it is

<sup>1.</sup> See Congressional Budget Office, *Budget Options, Volume 1: Health Care* (December 2008).

<sup>2.</sup> See, in particular, *The Long-Term Budget Outlook* (June 2009), *Updated Long-Term Projections for Social Security* (August 2008), and *The Long-Term Outlook for Health Care Spending* (November 2007).

estimated to occur under current law.<sup>3</sup> For options that affect nondefense discretionary spending, the changes were generally calculated relative to 2009 appropriations, as adjusted for inflation in subsequent years. Those amounts do not include the resources provided for economic stimulus in the American Recovery and Reinvestment Act of 2009 (Public Law 111-5). The budgetary effects of the options that involve discretionary spending for defense were measured relative to the Department of Defense's most recent budget plan (the 2009 Future Years Defense Program), as modified by lawmakers in enacting appropriations for 2009. In all cases, the effects on spending were estimated by CBO. Budgetary effects for most of the revenue options were estimated by the staff of the Joint Committee on Taxation (JCT) of the Congress.<sup>4</sup>

Some options that involve the collection of fees raise the question of whether the fees should be classified as revenue producing (governmental receipts) or as offsets to spending (offsetting receipts or offsetting collections). In classifying new fees for this volume, CBO has attempted to follow the guidance of the 1967 President's Commission on Budget Concepts.<sup>5</sup> That guidance indicates that receipts from a fee that is imposed under the federal governmental activities should generally be recorded in the budget as revenues. (The Congress has legislated the budgetary classification of some fees, requiring that they be recorded as offsets to spending when they would otherwise have been recorded as revenues.)

Because the spending options are intended to facilitate the review of individual programs, they do not include large-scale budget initiatives, such as across-the-board cuts in federal spending or the elimination of entire departments or agencies. Yet some of the options could be combined to provide insight into broader change: For example, some options suggest changing the way the tax system and many federal benefit programs are indexed for inflation (see Spending Options 600-3 and 650-4 and Revenue Option 6). Those options consider the consequences of using an alternative to the current consumer price index because the new index generally is considered to provide a better measure of inflation.

### **Caveats About This Report**

Some options that would affect state, local, or tribal governments or the private sector might involve federal mandates. The Unfunded Mandates Reform Act of 1995 requires CBO to estimate the costs of any mandates that would be imposed by new legislation that the Congress is considering. The discussions of the options in this volume, however, do not address the costs of potential mandates.

In addition, the estimated budgetary effects of the options do not reflect changes in federal interest costs (such as lower or higher interest payments on federal debt). Interest costs or savings typically are estimated as part of a comprehensive budget plan (for example, the Congressional budget resolution), but such calculations are not made for individual pieces of legislation or options of the type discussed in this volume.

Users of the volume should be aware that, in many cases, it would be inappropriate to combine the estimates from various options. Some options overlap, others are mutually exclusive, and still others have interactions with one another.

Finally, the estimates shown here could differ from any subsequent CBO cost estimates (or later revenue estimates by JCT) for legislative proposals that resemble the options in this volume. One reason is that the policy proposals on which those later estimates would be based might not precisely match the options here. Another reason is that the baseline budget projections against which such proposals would ultimately be measured might have been updated and thus would differ from the projections used for this report.

<sup>3.</sup> CBO's most recent baseline projections were published in A Preliminary Analysis of the President's Budget and an Update of CBO's Budget and Economic Outlook (March 2009).

<sup>4.</sup> For cost estimates of legislation that would amend the Internal Revenue Code, CBO is required by law to use estimates provided by JCT. The revenue estimates from JCT in this volume were based on CBO's March 2009 baseline projections.

<sup>5.</sup> According to the commission, "Receipts from activities which are essentially governmental in character, involving regulation or compulsion, should be reported as receipts. But receipts associated with activities which are operated as business-type enterprises, or which are market-oriented in character, should be included as offsets to the expenditures to which they relate." (See President's Commission on Budget Concepts, Report of the President's Commission on Budget Concepts, October 1967, p. 65.) Thus, in general, if a fee supports a business-like activity, it should be classified as an offset to spending. If it is based on the government's sovereign power to tax, it should be classified as a revenue. Receipts from fees classified as offsets to spending may be further categorized as either mandatory or discretionary, usually depending on the specific legislation that provides for the collections.



050

# **National Defense**

he military activities of the Department of Defense (DoD) and the atomic energy activities of the Department of Energy (DOE) constitute almost all of the spending in function 050, which, after declining at the end of the Cold War, began to rise again in the late 1990s. Between 2004 and 2008, discretionary outlays rose from \$454 billion to \$612 billion (an increase of 35 percent). That increase is attributable to additional funds that were provided for DoD's base budget, for operations in Iraq and Afghanistan, and for other activities related to the war on terrorism. Function 050 is currently funded at \$695 billion, including \$146 billion for war-related costs.

Most components of defense spending have increased in recent years. Spending for operations and maintenance—

to meet many of the military's day-to-day costs—rose by 41 percent (\$70 billion) from 2004 to 2008. Spending for the procurement of weapon systems, military hardware, and munitions rose by 54 percent (\$41 billion). The growth in spending on pay and benefits for military personnel, and on research and development (R&D), was somewhat less pronounced: 20 percent (\$23 billion) for military pay and benefits and 24 percent (\$14 billion) for R&D. The costs of base closure activities rose by \$4 billion from 2004 to 2008, which contributed to an 83 percent (\$5 billion) increase in spending on military construction. Spending on atomic energy activities of DOE declined by 2 percent, from \$16.2 billion in 2004 to \$15.9 billion in 2008.

1	1 0/			-	•	/		
	2004	2005	2006	2007	2008	Estimate 2009	Average Rate of Grov 2004–2008	Annual vth (Percent) 2008–2009
Discretionary Budget Authority Military operations in Iraq and Afghanistan and other activities related to the	00.0	77.4	11/ 0	145.2	100.0	146.2	10.7	10.1
global war on terrorism Other defense activities	88.2 397.4	77.4 422.4	116.2 440.3	165.3 457.1	180.9 505.0	146.3 548.2 <sup>a</sup>	19.7 6.2	-19.1 8.6
Total	485.6	499.8	556.5	622.4	685.9	694.5	9.0	1.3
Outlays								
Discretionary	454.0	493.6	519.9	547.9	612.4	666.8	7.8	8.9
Mandatory	1.8	1.7	1.9	3.4	3.7	4.9	19.9	33.6
Total	455.8	495.3	521.8	551.3	616.1	671.7	7.8	9.0

#### Federal Spending, Fiscal Years 2004 to 2009 (Billions of nominal dollars)

a. Includes \$12.7 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

# Fully Staff the Active Army Consistent with Planned Increases in Combat and Support Forces

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	2,700	2,800	3,400	3,500	3,400	15,800	33,800
Outlays	800	2,400	3,700	4,000	3,900	14,800	33,200

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

Since the mid-1990s, the Army has needed to keep its forces deployed in Bosnia, Kosovo, Kuwait, Afghanistan, and Iraq. To perform overseas combat or peacekeeping missions, the Army draws on its combat brigades and supporting units. The accelerated demand led the service to expand the number of combat brigades in its active component from 33 in 2003 to 42 in 2007, and the 2009 Future Years Defense Program calls for the Army to expand to 48 combat brigades by 2011. (In April 2009, the Secretary of Defense announced plans to scale that back, from 48 brigades to 45.) Since beginning the expansion, the Army has increased the number of units in the active component that support its combat brigades.

The Army has added personnel to its active force to fill new units, increasing from 480,000 soldiers in 2003 to 547,400 in February 2009. Although the 67,400 service members added since 2003 will contribute toward staffing the new units, that number will be insufficient to establish and support those units fully. In its 2009 budget submission, the Army showed plans to fill its deployable combat and support units in part by reducing the number of soldiers assigned to institutional duties (such as recruiting and weapons development) and in part by reducing the number of soldiers who are unassigned to units because they are in training or between assignments. By assigning civilians instead of soldiers to perform some institutional duties and by reducing the number of soldiers not assigned to units, the Army hoped to identify an additional 23,000 soldiers to assign to deployable units.

This option would retain the Army's previous goal of 48 combat brigades, but it would staff them by adding

23,000 soldiers over the next five years, bringing the total end strength to about 570,000. The option would assure the Army of staffing sufficient to fill deployable units and support them as in the past. Recruiting and retaining enough personnel to increase the Army by 23,000 soldiers would require about \$15.8 billion in additional budget authority between 2010 and 2014. About 10 percent of that increase would come from higher payments to the military retirement and health care trust funds. Those payments are intragovernmental transfers that would not represent current costs; they are shown in the budget as costs to the Department of the Army and would constitute long-term costs to the federal government as a whole.

One argument in favor of this proposal is that the Army's past attempts to reduce the size of its institutional forces relative to its deployable forces have not always been successful. Furthermore, as the Army expands, it is unlikely to reduce the number of soldiers in basic and initial training because the number of recruits each year—and the number of basic trainees—also will need to increase.

An argument against this option is that the amount of time and money needed to expand the Army's active force would exceed what a temporary demand for deployable units might justify. Although the need to maintain large forces in Iraq and Afghanistan has placed considerable stress on the active Army, that burden might be reduced before this option was fully implemented. Increasing the size of the active Army also would carry large fiscal obligations that could extend for many years.

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RELATED OPTIONS: 050-2 and 050-17
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RELATED CBO PUBLICATION: *Estimated Cost of the Administration's Proposal to Increase the Army's and the Marine Corps's Personnel Levels*, Letter to the Honorable Carl Levin, April 16, 2007

	the Army	mma	IVC						
						Total			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Spending									
Budget authority	-9,200	-8,100	-7,900	-6,800	-8,700	-40,700	-92,500		
Outlays	-2,400	-7,200	-9,300	-9,400	-9,500	-37,800	-88,700		

#### 050-2—Discretionary

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

Since the mid-1990s, the Army has needed to keep its forces deployed in Bosnia, Kosovo, Kuwait, Afghanistan, and Iraq. To meet the need, between 2003 and 2007, the Army increased the number of combat brigades in its active component from 33 to 42, but it did so without a permanent increase in the number of personnel it is authorized to maintain. Instead, the expansion was achieved in part by reorganizing existing units and in part by temporarily adding 30,000 soldiers.

Reverse the "Grow the Army" Initiative

In January 2007, the Army announced "Grow the Army," an initiative that would add 65,000 active personnel (increasing from 482,400 to 547,400) and 9,200 reservists (increasing from 555,000 to 564,200) by 2011. The same plan would add six infantry brigade combat teams to the active Army and several supporting units to the active and reserve components of the Army. Although the active Army reached 547,400 soldiers in February 2009, it continues to add and reorganize units as part of the initiative.

This option would reverse the Grow the Army initiative and have the service return to 482,400 active and 555,000 reserve soldiers. Savings would approach \$90 billion over the next 10 years. In April 2009, the Secretary of Defense proposed capping the number of Army brigades at 45, a reduction of 3 brigades from the originally planned 48. This estimate includes approximately \$2 billion in procurement savings for those 3 brigades.

A reduction in the Army's personnel and units would save on one-time expenses and recurring costs alike. One-time expenses include procurement of equipment and construction of facilities. Recurring costs include pay and benefits for personnel, base support, and equipment-operating expenses.

About 10 percent of the savings for this option would come from smaller payments to the military retirement and health care trust funds. Those payments are intragovernmental transfers that would not represent current savings; they are shown in the budget as savings to the Department of the Army and would constitute long-term savings to the federal government as a whole.

An argument in favor of this option holds that the President has announced plans to greatly reduce involvement in Iraq over the next two years, and the nation might choose to avoid future commitments of a similar size and mission. If that were the case, the additional units would be unnecessary for future military operations, and the Army could be safely reduced to the size it was before the beginning of operations in Iraq.

One argument against this option notes that the stresses placed on U.S. ground forces by the simultaneous occupation of Iraq and Afghanistan do not allow units to rotate out of theaters of operations, return home, repair worn and damaged equipment, and train personnel before they must be redeployed overseas. The tempo of operations is attributable to a demand for units in Iraq and Afghanistan that outstrips the current supply of U.S. ground forces—an imbalance that would be alleviated by increasing the size of the Army. If the U.S. presence in Iraq was to be sustained over a long period at current strength, or if the U.S. military was called upon to execute another operation of similar size and mission, additional ground forces would be essential.

RELATED OPTIONS: 050-1 and 050-17

RELATED CBO PUBLICATION: *Estimated Cost of the Administration's Proposal to Increase the Army's and the Marine Corps's Personnel Levels,* Letter to the Honorable Carl Levin, April 16, 2007

Sancer the Future Combat Systems Frogram											
						Total					
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Spending											
Budget authority	-2,300	-2,500	-1,700	-2,300	-3,700	-12,500	-25,000				
Outlays	-1,000	-1,800	-1,900	-1,700	-2,100	-8,500	-22,400				

#### 050 050-3—Discretionary

### **Cancel the Future Combat Systems Program**

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

The Army regards the Future Combat Systems (FCS) program as the cornerstone of its effort to transform itself into a force that can deploy combat units to respond quickly to crises anywhere in the world. With its current tanks and other armored vehicles, the Army typically would take three to four weeks to deploy a brigade to a remote location in Africa, Asia, or Eastern Europe. As envisioned, the next generation of combat vehicles that the FCS program would develop would be as lethal and as survivable as current weapons are but weigh as much as 60 percent less and require less fuel and other logistics support. The Army would develop eight new combat vehicle models as well as new unmanned aerial and ground vehicles, sensors, and munitions-all linked by advanced communications networks into an integrated combat system. The FCS program would equip slightly less than one-third of the active Army's combat brigades with the complete suite of vehicles and sensors. The Army's fiscal year 2009 budget plan shows that costs for the program from 2010 through 2030 could approach \$140 billion. The 2010 budget plan would cancel the original eight combat vehicles but does not provide sufficient detail to determine which other vehicles or systems (such as sensors or munitions) might be procured.

This option would cancel the FCS program and invest more in existing heavier combat vehicles that also have a proven record of utility. It would preserve a residual research and development effort for promising technologies that could be added later to existing systems. The option would expand the Army's programs for upgrading Abrams tanks, Bradley fighting vehicles, and M109 selfpropelled howitzers—many purchased in the early 1980s—to keep those vehicles in service for another 20 years. It also would call for the purchase of Stryker vehicles to replace the Army's M113 armored personnel carriers, originally designed in the 1950s. Canceling the FCS program, while preserving a residual effort in research and development, would reduce the need for budget authority for research and development and for procurement by a total of about \$24 billion over the next five years; upgrading current systems and purchasing Stryker vehicles would require about \$11 billion in budget authority over the same period. On net, the need for budget authority would decline by nearly \$13 billion between 2010 and 2014 and by \$25 billion over 10 years.

The feasibility of the FCS program has been questioned by defense experts and by the Government Accountability Office. Many analysts have concluded that current technology does not permit the construction of lightweight combat vehicles that match or surpass current vehicles in reliability and invulnerability to enemy weapons. Furthermore, the Army's experience in Iraq suggests that its strategy for making lightly armored vehicles that are equally as survivable as the heavily armored Abrams tank may not be feasible. To achieve comparable survivability, U.S. combat vehicles would have to avoid being targeted by exploiting superior knowledge of enemy activities. The threat in Iraq has come primarily in urban settings from individually launched weapons, and the ability to identify attackers' locations may be beyond any technology now envisioned.

The primary argument against this option is that canceling the FCS program might preclude transforming the Army in any meaningful way. It would mean a significant portion of the Army would continue to use systems originally developed in the 1980s or earlier. Some of those weapons, notably the Abrams tank, are fuel inefficient

#### CHAPTER TWO

and maintenance intensive. Improving the data processing and connectivity of those older systems would require the sometimes difficult process of integrating newer

#### **RELATED OPTION: 050-4**

RELATED CBO PUBLICATIONS: An Analysis of the Army's Transformation Programs and Possible Alternatives, June 2009; and Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009

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#### NATIONAL DEFENSE 9

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components into older frames. Finally, retaining older

edge and military dominance.

systems might eventually cost the Army its technological

Restructure the Future Combat Systems Program in Favor of Spin-Outs												
						Total						
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Spending												
Budget authority	-2,000	-2,200	-1,200	-1,600	-1,600	-8,600	-3,200					
Outlays	-800	-1,600	-1,600	-1,300	-1,300	-6,600	-5,300					

#### 050-4 Discretionary 050

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Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

The Army's Future Combat Systems (FCS) program would develop eight new combat vehicle models and new unmanned aerial and ground vehicles, sensors, and munitions-all linked by advanced communications networks into an integrated combat system. The vehicles slated to replace some tanks and Bradley vehicles would be as lethal and survivable as current weapons but weigh far less and require less fuel and other logistics support. The FCS program would equip less than a third of the active Army's combat brigades with the complete suite of vehicles and sensors at a cost of almost \$140 billion from 2010 through 2030, according to the Army's fiscal year 2009 budget plan. The Army plans to introduce some systems (primarily sensors, unmanned aerial and ground vehicles, and munitions) into combat brigades not scheduled to be equipped with the full FCS suite of systems. This program, called the FCS spin-out, would equip all of the combat brigades at a cost of \$40 billion from 2010 through 2025, significantly less than the full FCS program. Although the Army modified the spin-out in 2008 to equip only its infantry combat brigades, the cost of the program was essentially unchanged.

This option, which is similar to a proposal made by the Secretary of Defense in April 2009, would cancel development and procurement of the manned and large unmanned vehicles for the FCS and accelerate the FCS spin-out. It would continue development and procurement of the unattended ground sensors, small unmanned ground vehicle, non-line-of-sight launch system, and both classes of unmanned aerial vehicle. It would equip

each brigade with the same number of systems as envisioned by the Army's original FCS spin-out program but, starting in 2012, purchase 12 brigade sets annually (twice the rate envisioned in the 2009 budget submission). The option would expand programs for upgrading Abrams tanks, M109 self-propelled howitzers, and Bradley fighting vehicles (many almost 30 years old), keeping them in service for 20 more years. It would purchase Stryker vehicles to replace the 1950s-era M113 armored personnel carriers.

Canceling FCS would reduce the need for budget authority for research and development and for procurement by \$25 billion over the next five years. Developing and purchasing systems for the additional FCS spin-out would require about \$5 billion in budget authority; upgrading additional tanks and Bradley fighting vehicles and purchasing Stryker vehicles would require an additional \$11 billion in budget authority over the same period. On net, resource requirements would decline by about \$9 billion through 2014 and by about \$3 billion over 10 years.

Defense experts and the Government Accountability Office question the program's feasibility, particularly the concept for lightweight vehicles that would match current vehicles' invulnerability to enemy weapons. This option would focus on developing and fielding the systems that are the most developed and that pose the fewest technical challenges. Indeed, early prototypes of the small unmanned aerial and ground vehicles have been used in current operations in Iraq and Afghanistan.

#### CHAPTER TWO

The primary disadvantage is that this option would require the Army to retain its full inventory of current combat vehicles, including Abrams tanks and Bradley vehicles, indefinitely. By 2030, some of those vehicles would have been in the Army's inventory for almost 50 years. Also, adopting this option would ensure that none of the combat brigades would include the full complement of the FCS that the Army argues is necessary to realize the full benefit of the FCS technologies.

#### **RELATED OPTION: 050-3**

RELATED CBO PUBLICATIONS: An Analysis of the Army's Transformation Programs and Possible Alternatives, June 2009; and Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009

NATIONAL DEFENSE

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Procure Additional DDG-51 Destroyers to Replace the Canceled DDG-1000s												
						Total						
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Spending												
Budget authority	-700	1,750	-460	2,130	2,320	5,040	17,890					
Outlays	-80	50	210	370	930	1,480	13,600					

#### 050-5—Discretionary 050

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

The 2009 Future Years Defense Program accompanied the Department of Defense's February 2008 budget submission and proposed the Navy's purchase of five Zumwalt class DDG-1000 destroyers, in addition to the two for which funding had been appropriated. Later in 2008, the Navy announced that it would terminate the DDG-1000 program after the first two ships were delivered; it subsequently indicated that it would request a third before ending the program. In place of the additional Zumwalt class destroyers, in 2010, the Navy would resume production of the Arleigh Burke class DDG-51 destroyers. The last DDG-51 was authorized in 2005: Seven of the ships are under construction and 55 others are in service.

This option would end production of the DDG-1000 at three ships, cancel the remaining four, and instead procure several DDG-51 destroyers. As in the plan presented to the Congress in 2008, the service would purchase eight DDG-51 destroyers: one in 2010, two in 2011, one in 2012, two in 2013, and one each in 2014 and 2015. The Navy also stated it wants to purchase 12 more DDG-51s before starting production of a new surface combatant, the CG(X), to replace the Ticonderoga class CG-47 cruiser. The schedule for the final four DDG-51s would depend on how soon the CG(X) is ready for production. The Congressional Budget Office assumed that production of all 12 DDG-51s would end in 2018 and that production of the CG(X) would start soon thereafter. This option would spend about \$24 billion between 2010 and 2019 to buy and operate the 12 DDG-51 destroyers. It would avoid outlays of about \$10 billion over the same period by forgoing the purchase of four DDG-1000

destroyers. The result would increase outlays by about \$14 billion through 2019.

The DDG-51, a multimission destroyer that displaces about 9,400 tons, can provide area air defense for other Navy ships and defend against submarine attacks. The DDG-1000 is a much larger multimission destroyer, displacing about 14,500 tons, that operates in coastal regions to support troops ashore by means of its main armament and two advanced gun systems that can shoot projectiles at targets 80 nautical miles away.

Supporters of this option say that the Navy needs DDG-51 destroyers more than it needs DDG-1000s. As the Navy assesses potential threats, it indicates its need to provide air and missile defenses for its ships-and for those of U.S. allies-and to conduct open-ocean antisubmarine warfare. The Navy states that the DDG-51is superior to the DDG-1000 in those areas. Supporters of this option also argue that the requirement for the fire support the DDG-1000 would have provided has changed, and the Navy can meet that need with aircraft or with missiles launched from other Navy ships.

Opponents of this option argue that, for more than a decade, the Navy has said it needs the DDG-1000. The ship will be difficult to detect, and it will have a range of systems designed to counter threats in the world's coastal regions, a capability that many analysts and defense officials regard as crucial to maintaining the viability and effectiveness of U.S. forces. Changing the procurement plan also could be disruptive to shipbuilders that have been planning to build the DDG-1000.

#### RELATED OPTIONS: 050-6 and 050-7

RELATED CBO PUBLICATIONS: Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009; Statements of Eric J. Labs, Congressional Budget Office, before the Subcommittee on Seapower and Expeditionary Forces, House Committee on Armed Services, The Navy's Surface Combatant Programs, July 31, 2008, and Current and Projected Navy Shipbuilding Programs, March 14, 2008

Cancel the Maritim	Cancel the Maritime Prepositioning Force (Future) Ships												
						Total							
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019						
Change in Spending													
Budget authority	-2,410	-2,140	-2,750	-1,910	-3,230	-12,440	-17,360						
Outlays	-1,230	-1,810	-2,280	-2,160	2,700	-10,180	-17,270						

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#### 050-6—Discretionary

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

Over the next seven years, the Navy plans to spend about \$16 billion on a squadron of ships it calls the Maritime Prepositioning Force (Future), or MPF(F). Combined with several ships in the current fleet, the MPF(F) would allow the Navy to deploy a Marine expeditionary brigade to a hostile shore—and keep it supplied for almost three weeks—without seizing or establishing a land base. The Navy proposes to begin buying the MPF(F) in 2010 and to have the force operational by 2020. The squadron would be an important component of Navy and Department of Defense plans for "sea basing"—an idea that is still evolving—to increase the Navy's ability to respond to crises quickly, with a larger forcible-entry capability, and with more freedom of action than is possible now.

Under this option, the MPF(F) squadron would be canceled, and nothing would be bought in place of those ships. The option would save \$17.3 billion in outlays between 2010 and 2019. Some defense experts say the small benefit offered by the MPF(F)—the ability to transport and sustain one Marine brigade—would not justify its cost. In addition, at least six of the new ships, which would be built to less stringent commercial standards, would be more vulnerable to attack than are the Navy's amphibious warfare ships. The Navy would operate the MPF(F) along with amphibious ships in coastal areas where threats from enemy mines, antiship missiles, small boats, and submarines are more acute than they are on the open seas. Critics also argue that the technological challenges of deploying and sustaining a Marine brigade entirely from the sea would be insurmountable. Instead, the money would be better spent on traditional amphibious warships or on other equipment that could facilitate deployment of larger numbers of troops in hostile environments, albeit not as quickly as might be possible with the MPF(F) squadron.

The disadvantages of this option include disruption of the Navy's new shipbuilding plan. Senior Navy officials have identified stability in the shipbuilding program as a primary goal. In addition, this option would reduce, if not preclude, the Navy's ability to deploy substantial numbers of Marines ashore and to support them entirely from logistics ships at sea. Senior Navy leaders see that capability (and its concomitant freedom of action) as a paramount design objective for its new ships.

Canceling the MPF(F) squadron, however, would not necessarily translate to fewer ships being available for maritime prepositioning. The Navy maintains three squadrons of ships overseas, each carrying the equipment needed by a Marine expeditionary brigade. To deploy those brigades, the Marines would be flown from the United States to converge with a ship at an established port where equipment would be unloaded. Under this option, the Navy would retain all three squadrons and the regular amphibious warfare ships in its fleet.

#### RELATED OPTIONS: 050-5 and 050-7

RELATED CBO PUBLICATIONS: Statement of J. Michael Gilmore, Congressional Budget Office, before the House Committee on the Budget, *The 2009 Future Years Defense Program: Implications and Alternatives*, February 4, 2009; *Resource Implications of the Navy's Fiscal Year 2009 Shipbuilding Plan*, Letter to the Honorable Gene Taylor, June 9, 2008; Statement of Eric J. Labs, Congressional Budget Office, before the Subcommittee on Seapower and Expeditionary Forces, House Committee on Armed Services, *Current and Projected Navy Shipbuilding Programs*, March 14, 2008

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-670	-770	-390	0	0	-1,830	-2,100	
Outlays	-80	-250	-360	-370	-300	-1,360	-2,060	

#### 050 050-7—Discretionary

### Limit Procurement of Virginia Class Submarines to One Per Year and Convert SSBNs to SSGNs

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

Among its other ships, the Navy's fleet contains attack submarines (SSNs), nuclear-armed ballistic missile submarines (SSBNs), and guided-missile submarines (SSGNs). Attack submarines displace about 7,400 tons and perform antisubmarine warfare and a variety of other missions, of which the most important are intelligence, surveillance, and reconnaissance. Ballistic missile submarines are much larger, displacing 18,000 tons, and carry 24 nuclear-tipped ballistic missiles, primarily for strategic deterrence. Guided-missile submarines are SSBNs that have been converted for conventional missions, carrying more than 150 conventionally armed Tomahawk cruise missiles for strike missions as well as deploying and supporting Special Operations forces.

Beginning in 2011, the Navy plans to procure two Virginia class attack submarines each year. (For most of the past decade, the Navy has purchased one per year.) Implementing this option would delay that increase by two years (saving about \$4 billion) and convert two additional ballistic missile submarines to a guided-missile configuration (costing about \$2 billion). The option would save about \$2 billion in outlays between 2010 and 2019.

One argument in favor of this option is that it would increase the Navy's covert strike capability with Tomahawk missiles by one-third in the short term and substantially increase the Navy's capacity for deploying Special Operations forces. The Navy currently has about 900 vertical launch system (VLS) cells on its existing attack and guided-missile submarines. (The Navy also has about 8,000 other VLS cells on surface ships.) Converting two more SSBNs to SSGNs would add another 308 cells to that total. When submarines are submerged, they are difficult to locate. Thus, only the Navy's submarine forces can provide the means to launch Tomahawk missiles with little warning to the enemy—as could be necessary in the early stages of a conflict to destroy enemy airdefense sites or communications centers. In addition, although the Navy has many methods by which it can deploy Special Operations forces, SSGNs provide the largest and most versatile means to do so. This option would increase by half the number of those platforms.

One argument against this option is that it would entail spending for a weapons system that the Navy says it does not need at the expense of ships the Navy says it does need. The Navy's plan for a 313-ship fleet includes four SSGNs. Converting two more submarines to SSGNs would exceed that requirement. Conversely, reducing Virginia class procurement would exacerbate the Navy's looming shortfall in attack submarines. Beginning in 2024, under the Navy's shipbuilding plan, the inventory of attack submarines would fall below the required 48. By 2028, the inventory would decline to 41 before recovering again to 48 by 2034. Under this option, the inventory of SSNs would fall below 48 as early as 2020 and by 2028 would fall to as low as 39, not reaching 48 again until 2035. This option would also reduce the SSBN force to 12 submarines; the Navy's requirement is 14.

#### RELATED OPTIONS: 050-5 and 050-6

RELATED CBO PUBLICATIONS: Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009; Resource Implications of the Navy's Fiscal Year 2009 Shipbuilding Plan, Letter to the Honorable Gene Taylor, June 9, 2008; and Statement of Eric J. Labs, Congressional Budget Office, before the Subcommittee on Seapower and Expeditionary Forces, House Committee on Armed Services, Current and Projected Navy Shipbuilding Programs, March 14, 2008

050

Replace the Joint Strike Fighter Program with F-16s and F/A-18s												
						Total						
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Spending												
Budget authority	-5,600	-4,500	-7,100	-4,900	-4,400	-26,500	-42,300					
Outlays	-2,200	-3,900	-5,100	-5,300	-4,500	-21,000	-37,000					

#### 050-8—Discretionary

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Note: Estimates of costs or savings displayed in the table are based on the Selected Acquisition Report for the fiscal year 2009 Future Years Defense Program.

The F-35 Joint Strike Fighter program is the military's largest aircraft development program. A team of several manufacturers, led by the Lockheed Martin Aeronautics Company, was awarded a contract in 2002 to develop three versions of the stealthy aircraft: a conventional takeoff version for the Air Force; a carrier-based version for the Navy; and a short-takeoff/vertical-landing (STOVL) version for the Marine Corps. From 2010 through 2034, the Department of the Navy and the Air Force anticipate purchasing more than 2,400 F-35s, at a cost of about \$254 billion (including remaining development costs).

This option would cancel the F-35 program and instead purchase upgraded versions of fighter aircraft already in production: the Lockheed Martin F-16E/F for the Air Force and the Boeing F/A-18E/F for the Navy and Marine Corps. If those aircraft were purchased at the rates currently planned for the F-35, this option would decrease outlays by \$21 billion over the next five years. Over the longer term, the option would save \$37 billion through 2019, and \$78 billion if the entire planned fleet of F-35s was replaced with F-16s and F/A-18s.

An argument in favor of this option is that new F-16 and F/A-18 aircraft, with upgraded, modern radar, precision weapons, and digital communications, would be sufficiently advanced to meet the threats that the nation might face in the foreseeable future. The extreme sophistication of the F-35 (and the additional technical challenge of building three distinct types of aircraft with a common airframe and engine) could result in additional

cost growth and schedule delays. And although the cost of programs to upgrade the other aircraft also could escalate, their lesser technical challenges relative to the F-35 would make comparable cost growth unlikely. Because the Air Force and the Navy project that planned production rates for the Joint Strike Fighter would be insufficient to meet inventory goals as older aircraft needed to be retired, schedule delays for the F-35 could be particularly problematic. The Congressional Budget Office estimates that production rates for new F-16s and F-18s could be increased enough to eliminate inventory shortfalls without exceeding the annual expenditures that are planned for smaller numbers of F-35s.

A disadvantage of this option is that F-16 and F/A-18 aircraft lack the stealth design features that would help the F-35 evade enemy radar and hence operate more safely in the presence of enemy air defenses. The services would maintain some stealth capability, however, with the B-2 bomber and F-22 fighters already authorized and with the planned development of new, highly stealthy unmanned fighters and long-range bombers. Another disadvantage is that substituting F/A-18s for the F-35B, the Marine Corps's STOVL version of the F-35, would remove the capability to operate fixed-wing fighters from the amphibious assault ships in naval Expeditionary Strike Groups, a capability currently provided by the AV-8B Harrier. Those strike groups would be left to rely on armed helicopters (which lack the range, speed, payload, and survivability of the F-35) or on other forces, such as aircraft carrier strike groups, in the area.

#### **RELATED OPTION: 050-9**

RELATED CBO PUBLICATIONS: Alternatives for Modernizing U.S. Fighter Forces, May 2009; and Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009

Cancel the Navy and Marine Corps Joint Strike Fighters and Replace with F/A-18E/Fs											
						Total					
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Spending											
Budget authority	-2,700	-1,400	-3,200	-500	-900	-8,700	-9,000				
Outlays	-600	-1,500	-2,000	-1,800	-1,200	-7,100	-9,000				

#### 050 050-9—Discretionary

Note: Estimates of costs or savings displayed in the table are based on the Selected Acquisition Report for the fiscal year 2009 Future Years Defense Program.

The Department of the Navy currently plans to purchase 680 F-35 Joint Strike Fighters in two variants: the F-35B short-takeoff/vertical-landing (STOVL) aircraft for the Marine Corps and the F-35C carrier-based aircraft for the Navy. (The Air Force's F-35A will be a conventional land-based fighter.) For 2010 to 2025, the department's spending plans for the F-35 include more than \$3 billion remaining for development and about \$80 billion for procurement.

Under this option, the Department of the Navy would cancel the F-35B and F-35C and instead purchase additional F/A-18E/F fighters currently in production. If the aircraft were purchased at the rates now planned for the department's F-35s, this option would decrease outlays by \$7.1 billion over the next five years and save \$9 billion through 2019. Net savings for the F-35 program, from 2010 to 2034, would total only \$2 billion. The cost for the Air Force's F-35A would increase (more than 1,000 would be purchased after 2019) because of reduced quantities and rates of production for all F-35s.

Proponents of this option assert that the F/A-18E/F aircraft's relatively new design is capable of meeting likely threats in the foreseeable future and that the costs and production capacities for the F/A-18E/F are well understood. Problems with development could arise for the F-35 that would cause costs to escalate beyond today's estimates and cause delays in the initial use of the aircraft. Further delays for the F-35 could pose significant difficulties because the Navy is already projecting that planned production rates will be insufficient to match the retirement of F/A-18A/B/C/D fighters that are approaching the end of their structural service life. A middle course—augmenting F-35B/C production with enough F/A-18E/F purchases to maintain inventory—would have the disadvantage of requiring higher than planned near-term funding to support production of both aircraft.

Opponents of this option point out that even though the F/A-18E/F was designed to incorporate stealth features that the smaller F/A-18C/D aircraft does not have, it is still far less stealthy than the F-35. Consequently, canceling the F-35 could limit naval aviation operations early in a conflict before enemy air defenses have been suppressed. This shortcoming could be mitigated if the Navy's efforts to develop stealthy unmanned combat aircraft are successful. (The Navy has preliminary plans to deploy such aircraft starting in about 2025.) Another disadvantage would be that substituting F/A-18s for the STOVL F-35B would mean that the Marine Corps could no longer operate fixed-wing fighters from the amphibious assault ships in naval Expeditionary Strike Groups or from austere locations ashore, capabilities that are currently offered by the AV-8B Harrier. In the absence of support by carrier- or land-based aircraft, the strike groups would rely on armed helicopters that lack the range, speed, payload, and survivability of the F-35.

**RELATED OPTION: 050-8** 

RELATED CBO PUBLICATIONS: Alternatives for Modernizing U.S. Fighter Forces, May 2009; and Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009

Postpone Purchases of New Airborne Refueling Tankers													
						Total							
2010	2011	2012	2013	2014	2019	2010-2014	2010-2019						
-900	-2,300	-2,500	-2,500	-2,000	600	-10,200	-10,800						
-600	-1,400	-1,800	-2,000	-1,800	400	-7,600	-9,900						
	-900	-900 -2,300	-900 -2,300 -2,500	-900 -2,300 -2,500 -2,500	-900 -2,300 -2,500 -2,500 -2,000	-900 -2,300 -2,500 -2,500 -2,000 600	2010         2011         2012         2013         2014         2019         2010-2014           -900         -2,300         -2,500         -2,500         -2,000         600         -10,200						

#### 050-10—Discretionary

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

To extend the range of its fighters, bombers, and airlift aircraft, the Air Force operates 59 KC-10 and about 450 KC-135 airborne refueling tankers. Over the past several years the Air Force has formulated a program to replace the KC-135s-which are more than 40 years old and becoming increasingly expensive to maintain-with 179 new tankers based on a more modern commercial aircraft. The first five "KC-X" tankers were to have been purchased in 2010, with production increasing to 15 aircraft per year in 2014 and thereafter. The program is currently on hold because of procedural problems with the February 2008 source selection. In constructing this option, the Congressional Budget Office assumed that the KC-X program would proceed as described in the previous Administration's 2009 budget request but with a one-year slip as a result of the delay in awarding a contract.

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This option would postpone the initial purchases of KC-X tankers for an additional five years, or until 2016. In place of the approximately 60 aircraft that would have been purchased over that period, a like number of KC-135Es slated to be removed from service would instead be retained and upgraded to the more reliable and better performing KC-135R configuration. This option would decrease outlays by \$7.6 billion over five years, and it would save \$9.9 billion through 2019.

An argument in favor of this option is that, despite their advanced age, the KC-135s still have significant structural life remaining (they are analogous to old but low-mileage automobiles). Converting the remaining KC-135Es to KC-135Rs would be a cost-effective way both to improve capabilities and to reduce operating costs. (Installing new engines as part of the KC-135R conversion decreases maintenance costs and fuel consumption, improves reliability, and increases the amount of fuel the tankers can deliver.) An argument against this option is that even if KC-X purchases began today, KC-135s will remain in the Air Force inventory for decades, ultimately with lifespans far longer than those of any previous jet aircraft. Consequently, it would be prudent to begin working new aircraft into the fleet to help mitigate the risk of unexpected age-related problems that could suddenly ground the entire KC-135 fleet, much as an unexpected structural problem forced the temporary grounding of many F-15 fighters in 2007.

Another argument in favor of this option is that the two most likely candidates to replace the KC-135s-the Boeing 767 and the Airbus A-330-are themselves old designs that are likely to be phased out soon in favor of the 787 and the A-350XWB, respectively. A tanker based on one of those newer aircraft is likely to be more efficient than a tanker based on an older design, and procurement costs would probably be lower because of the higher production rates needed to fill commercial and government orders. Conversely, if the Air Force is the only remaining buyer of an older design, it would lose the cost and flexibility advantages of buying from an active commercial line. An argument against this option is that because the capabilities or drawbacks of the 787 and A-350XWB are not yet known, it would be less risky to begin replacing KC-135s with a proven commodity. If the 787 and A-350 proved successful they could compete for tanker orders beyond the 179 planned KC-X aircraft.

RELATED CBO PUBLICATION: *Estimated Cost of Two Alternatives to the Air Force's Proposal to Lease 100 Boeing 767 Aircraft*, Letter to the Honorable John McCain, November 13, 2003

			L	0				
						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-270	-560	330	-500	-600	-1,600	-10,780	
Outlays	-130	-380	-330	-290	-430	-1,560	-8,640	

#### 050 050-11—Discretionary

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

Terminate Future Satellites of the Space Tracking and Surveillance System

The Space Tracking and Surveillance System (STSS), in development by the Missile Defense Agency (MDA), is planned as a constellation of low-Earth-orbit satellites to track enemy ballistic missiles throughout their flight and distinguish enemy warheads from decoys. The program, considered a part of future capability development by MDA, comprises two phases: two demonstration satellites and a follow-on operational constellation. The two demonstration satellites are scheduled for launch in 2009; MDA expects to use them for research and to provide some operational capability through 2014. In the fiscal year 2008 budget, the initial STSS operational constellation was envisioned as consisting of at least five satellites. As outlined in that budget, the first launch was envisioned as occurring as early as 2012, with the possibility of three or more satellites to be added later. Current plans call for a reassessment of the concept for the operational constellation that is focused on affordability and a shorter development cycle and incorporating knowledge gained from the demonstration satellites. No operational launches are planned before 2014.

In recent years, MDA has developed and fielded deployable surface-based radar for missile defense, including the Sea-Based X-Band (SBX) and the AN/TPY-2 (formerly the Forward-Based X-Band Transportable, or FBX-T) radar systems. By the end of 2009, MDA plans to have upgraded the Cobra Dane (Alaska), Beale (California), Fylingdales (England), and Thule (Greenland) Early Warning Radars to enhance the nation's ability to track ballistic missiles. The Air Force also expects to improve its missile-warning capability with the Space-Based Infrared System-High (SBIRS-High) constellation. The first launch of an SBIRS-High GEO (geosynchronous) satellite is planned for 2010. The sensors on those satellites will be able to track ballistic missiles early in their flight. This option would terminate development of the STSS operational constellation and replace it with ground- and sea-based radars. House Report 107-298 refers to an internal Department of Defense study that "indicates that ground based radars not only provide a viable alternative to a space based system, but also provide this capability at significantly lower cost and risk."

To estimate the savings from canceling the STSS operational constellation, the Congressional Budget Office has assumed that the continuing reassessment of the concept would result in development of a new satellite design, with first launch in about 2018. Consistent with the goals of the reassessment, CBO assumed the new concept would result in a constellation with fewer satellites than originally envisioned; in previous estimates, CBO had assumed that, under the old concept, the initial STSS constellation would consist of five satellites (consistent with the department's plans at the time) that subsequently would be expanded to nine. However, with first launch in 2018, procurement of only the first few satellites would occur prior to 2018, so that the savings over the period considered for this budget option would not be sensitive to the ultimate size of the full constellation. CBO estimates that canceling the STSS operational constellation would save about \$2.9 billion over the next five years and about \$10.6 billion over a decade. The 10-year savings would come from not starting research and development for the new satellite design (about \$8.1 billion) and from not buying, launching, or operating the new satellites (about \$2.5 billion). However, MDA would still be able to use the demonstration satellites for technology testing and for gathering data from a planned series of tests.

In place of STSS, this option would provide for one additional SBX and four additional AN/TPY-2 radars. Because STSS is a space-based system, it offers global

coverage (albeit with potential gaps). Although SBX and AN/TPY-2 have more limited range, they can be deployed to any region of concern because they are transportable. Nonetheless, the number of radars assumed by this option cannot replace the global coverage that could be provided by a full STSS constellation if one was launched. This option would provide more limited, regional coverage of ballistic missile threats than would STSS.

To estimate the cost of the SBX and AN/TPY-2, CBO examined procurement expenses for the initial versions of those radars. CBO estimated that a single SBX would cost \$1 billion and four AN/TPY-2 radars would cost \$1 billion; CBO assumed the radars would be purchased in 2012 and 2013. Combining the two parts of this option, CBO estimated that the net savings over the next five years would be \$1.6 billion and that net savings over the next 10 years would total \$8.6 billion.

An advantage of this option is the significant savings that would result from not developing and acquiring the full constellation of STSS satellites. That constellation might 050

not be needed because programs that MDA and the Air Force plan to operate simultaneously with STSS also would provide some ability to track and discriminate ballistic missile warheads. This option would augment that capability with additional ground-based radar, which may be more effective than the sensors in the STSS satellites for that purpose. Further, the ground-based radar could be available for fielding sooner.

An argument against this option is that the STSS flight demonstration system could validate the use of spacebased infrared sensors for tracking and discrimination of warheads launched on enemy ballistic missiles. Although technical issues associated with the STSS sensors remain to be solved, use of ground-based systems for discrimination also poses technical challenges. Moreover, groundbased radar cannot match the global coverage offered by a full constellation of STSS satellites. The Air Force's SBIRS-High GEO program also has experienced cost growth and schedule delays, and its capability would be insufficient for tracking ballistic missiles throughout all phases of flight.

RELATED OPTIONS: 050-12 and 050-13

RELATED CBO PUBLICATIONS: Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009; and Alternatives for Boost-Phase Missile Defense, July 2004

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### Cancel Development of the Ground-Based Midcourse Defense System After Block 1

						To	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-2,280	-1,210	-740	-890	-760	-5,880	-8,660
Outlays	-1,130	-1,560	-1,000	-860	-770	-5,320	-8,050

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

The Ground-Based Midcourse Defense (GMD) system, as reorganized in the fiscal year 2009 budget, is separated into blocks based on the fielded capability of the overall Ballistic Missile Defense System (BMDS). The Block 1 GMD system, intended to defend the United States against limited threats from North Korea, consists of 30 interceptor missiles based at Fort Greely, Alaska, and Vandenberg Air Force Base, California; detection and tracking radar facilities around the United States; battle management command-and-control software; and a communication system that would relay information to and from the interceptors in flight. Block 3 and Block 4 GMD developments would extend the system by adding interceptors and radar facilities and establishing a third ground-based interceptor site in Europe. The goal of those blocks is to defend the United States and Europe against threats from Iran. Blocks 2 and 5 of the Missile Defense Agency (MDA) budget include no funding for the GMD program, addressing instead the defense of deployed forces and U.S. allies.

This option would cancel the development of the Block 3 and Block 4 upgrades to the GMD system. One aspect of the option—forgoing increases in the number of groundbased interceptors in Alaska—is similar to a proposal made by the Secretary of Defense in April 2009. The proposed deployment of interceptors in Europe and 14 more interceptors at the Block 1 sites would be terminated under this option. The option would cancel the European Midcourse Radar and the European Forward-Based Radar (which are included in the Sensors program element of the MDA budget) and forgo construction, operation of the system, and other support activities for the proposed defenses in Europe. The option would retain the interceptors at the two U.S. sites and would use about \$300 million a year to develop improvements to the system. It also would continue plans to add radar sites at Fylingdales, England, and Thule, Greenland. The Congressional Budget Office estimates this option would save \$1.1 billion in outlays in 2010 and nearly \$8.1 billion between 2010 and 2019.

Some defense experts believe that without improvements in technology, and absent more extensive testing of its components individually and as a whole, the GMD system is not yet ready to field. By fielding Block 1 alone, this option would promote continued testing while providing limited defense for the United States against missiles launched from North Korea. Integration of the radar facilities in England and Greenland would permit tracking of missiles launched from Iran, thus enabling engagement by GMD interceptors from U.S. Block 1 sites. A delay in additional deployments would allow developers time to improve missile defense technologies for incorporation into a more capable operational system, should the United States decide to deploy one.

Opponents of this option assert that ballistic missile launches from enemy nations pose a current threat to the nation, so developing and deploying all currently planned GMD segments would provide critical protection for the United States and its allies. In particular, only by fielding all GMD segments could the nation defend its territory and extend its missile defenses to allies and deployed forces in Europe.

### RELATED OPTION: 050-13

RELATED CBO PUBLICATIONS: Options for Deploying Missile Defenses in Europe, February 2009; Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009; and Alternatives for Boost-Phase Missile Defense, July 2004

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Focus Missile Defense Agency Technology Development on Near-Term Systems								
						То	tal	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-1,310	-2,150	-3,080	-3,300	-4,250	-14,090	-48,460	
Outlays	-640	-1,580	-2,470	-3,020	-3,540	-11,250	-40,090	

### 050-13—Discretionary

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

In 1972, the Anti-Ballistic Missile Treaty limited the types and locations of missile defenses available to the Soviet Union and the United States. After the United States withdrew from the treaty in 2002, however, the Department of Defense began to pursue research on a variety of missile defense technologies. The fiscal year 2009 budget of the Missile Defense Agency (MDA), which directs missile defense development for the department, split that effort into two parts: The first part is a series of five blocks that are based on fielded capabilities to address particular threats. The second part is a set of Capability Development programs for developing systems intended to expand the future defensive capability beyond that provided by the currently defined blocks.

This option has features similar to those proposed by the Secretary of Defense in April 2009. The option would cancel the following program elements for capability development: Airborne Laser (ABL), Space Tracking and Surveillance System (STSS), Space Test Bed, Far-Term Sea-Based Terminal Defense, Sensor Development, Missile Defense Space Experimentation Center, and Special Programs. (In other options, the Congressional Budget Office has estimated the change in spending that would attend canceling the ABL and STSS individually; those savings are incorporated into this option.) All of the projects are intended to develop new systems that would be fielded in the future. The estimated savings of \$640 million in 2010 and of about \$11 billion over five years would come from discontinuing development and, in

some cases, fielding of the systems after development is completed. This option would not cancel those program elements intended to expand deployment or improve the performance of existing systems, among them the Multiple Kill Vehicle and the Kinetic Energy Interceptor, both of which are intended to improve performance of the existing Ground-Based Midcourse Defense system.

There are several arguments in favor of this option. The resources required to establish the systems would significantly exceed previous missile defense funding. Because the canceled systems would primarily augment current capabilities, the resources could be put to better use in testing, improving, and expanding the missile systems already in operation. Development of new systems should concentrate on capabilities—such as defense against cruise missiles-that are not yet provided.

A major argument against this option is that the systems it would cancel provide new capability in MDA's ballistic missile defense system (BMDS), which combines several layers of defense using different technologies to protect against adversary missiles during various phases of an attacking missile's flight. Removing some systems from the BMDS would make the entire system more vulnerable to a coordinated attack by multiple missiles, and it could increase vulnerability to countermeasures, such as warhead decoys or maneuvering warheads, that an adversary could use to reduce the effectiveness of some portions of the BMDS.

**RELATED OPTION: 050-12** 

RELATED CBO PUBLICATIONS: Statement of J. Michael Gilmore, Congressional Budget Office, before the House Committee on the Budget, The 2009 Future Years Defense Program: Implications and Alternatives, February 4, 2009; Long-Term Implications of the Fiscal Year 2009 Future Years Defense Program, January 2009; and Alternatives for Boost-Phase Missile Defense, July 2004

### 050 050-14—Discretionary

### **Consolidate Military Personnel Costs into a Single Appropriation**

Much of the federal government's cost of compensating military personnel falls outside military personnel appropriations for the Department of Defense (DoD). Other DoD appropriations pay for many noncash benefits, such as use of commissaries, DoD schools, base housing for military families, and some medical care. The Department of Veterans Affairs (VA) funds such additional benefits as veterans' health care and disability payments and the education benefits provided under the GI Bill.

Under this option, DoD funding for the types of compensation named above would become part of military personnel appropriations. Some VA programs also might be funded in the defense budget. That realignment would have two related goals: It would provide more complete information about how much money is being allocated to support military personnel, and it would give DoD managers a greater incentive to use resources wisely. The amount this option might save is unknown (so no table of year-by-year savings is shown), but with DoD-funded support of military personnel totaling about \$170 billion in 2008, the savings from better management could be substantial. For example, a savings of just 1 percent would equal more than \$1.5 billion annually.

The current distribution of personnel costs among different appropriations makes it difficult for DoD, the Congress, and taxpayers to track the total cost of supporting military personnel. In the absence of a complete picture, it is difficult to assess the resources devoted to health care, housing, and education benefits or to compare military with civilian compensation.

DoD has consolidated costs into military personnel appropriations in the past. In 2003, it adopted accrual funding for the cost of health care for Medicare-eligible retirees. Those payments, which represent the future cost of providing benefits to future retirees, are made from the military personnel accounts of each service. (The current costs of providing health care to Medicare-eligible retirees were removed from DoD's operation and maintenance appropriation and are paid instead out of a new fund.) This option would expand that approach by incorporating additional personnel support costs into the military personnel appropriation.

Advocates of this option argue that further consolidation would encourage DoD managers to use military personnel more effectively and to substitute less costly federal civilian employees, contractors, or labor-saving technology for military personnel where possible. This option also would help DoD and the Congress by highlighting the extensive array of noncash benefits in the military compensation package.

Critics of this option argue that implementation could be difficult. For example, new financial management systems and a new appropriations structure would be required. Additional difficulties would arise in accounting for costs currently funded through VA.

An alternative to this option would be to jointly consider the three largest elements of cash compensation-basic pay and the allowances for food and housing. All of those elements are funded through each service's military personnel appropriations account. If the annual increases in those three elements were determined together, policymakers could match the sum of all three componentsrather than just the basic-pay raise-to the projected change in the civilian Employment Cost Index (ECI). For example, because the basic allowance for housing increased by 7.3 percent and the basic allowance for subsistence increased by 5.2 percent in 2008, the basic-pay raise that year could have been lower than the 3.5 percent passed by the Congress but still have provided military pay raises that were comparable to civilian raises. However, that approach would yield budgetary savings only when housing and subsistence costs were expected to grow faster than the ECI (thus allowing for a lower basicpay raise to meet the civilian benchmark). When housing and subsistence allowances were expected to grow relatively slowly, the basic-pay raise would need to exceed the change in the ECI to maintain overall comparability.

### CHAPTER TWO

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A rationale for the alternative is that it would promote accuracy in the setting of benchmarks by giving policymakers three major determinants of cash compensation to evaluate together. Also, to the extent that rising food and housing prices cause wages to increase (and thereby boost the ECI), a policy that adjusted the basic-pay raise along with the food and housing allowances would avoid the possibility of double compensation for service members. If, however, higher allowances resulted in lower basic-pay raises, members' retirement and other benefits that are tied to basic pay scales would be lower as well.

RELATED OPTION: 050-15

RELATED CBO PUBLICATION: Evaluating Military Compensation, June 2007

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larget Pay to meet	Milliary R	equire	ments				
						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-40	-480	-950	-1,440	-1,570	-4,480	-14,700
Outlays	-30	-460	-930	-1,410	-1,550	-4,380	-14,540

### 050 050-15—Discretionary

The cash pay that military personnel receive includes basic pay, which depends on rank and time in service, as well as bonuses, allowances, and the tax advantage that arises because some allowances are not subject to federal income tax. Basic pay is the most important element of cash pay, averaging more than 55 percent of total cash compensation. Lawmakers typically use the employment cost index (ECI) for wages and salaries of private-sector workers in setting the annual military pay raise. In the 1990s, the raise generally was set either at the annual rate of increase of the ECI or 0.5 percentage points below it. However, the Fiscal Year 2001 National Defense Authorization Act set the annual raise for 2001-2006 at 0.5 percentage points above the ECI. Service members' pay raises for fiscal years 2008 and 2009 were also set above ECI. To improve retention of some service members, the across-the-board raises were supplemented by increases in the pay table for officers and enlisted personnel in some pay grades. Those legislated changes raised the average basic pay for all enlisted personnel 13 percent between 2000 and 2008 and raised the basic pay for senior enlisted personnel 16 percent in real (inflation-adjusted) terms. Real basic pay for officers has risen 9 percent over the same period.

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In addition to pay raises to increase retention, the services also have used the selective reenlistment bonus (SRB), a cash incentive typically offered to qualified enlisted personnel in occupational specialties with high training costs or with demonstrated shortfalls in retention. Each service branch regularly adjusts its SRBs to address current retention problems, adding or dropping eligible specialties and raising or lowering bonuses. In addition, the Army pays a deployed SRB to all eligible soldiers who reenlist while they are deployed in support of contingency operations. Depending on the service, eligible personnel receive the bonuses in a lump sum at reenlistment, or they receive half at reenlistment and the remainder in annual installments over the course of the additional obligation. This option would temporarily substitute reenlistment bonuses for part of the basic pay increase. From 2010 to 2014, it would limit annual basic pay raises to 0.5 percentage points below the increase in the ECI and offer SRBs to service members in some occupations where shortages exist, keeping overall retention constant. It would increase the services' spending on bonus payments by about \$1.7 billion between 2010 and 2014 (an average annual increase of about \$340 million) and remove current restrictions on the maximum bonus. Between 2010 and 2014, service members receiving the additional bonuses would receive higher overall pay than would be the case under the current plan. This option would save \$30 million in 2010 and more than \$4 billion between 2011 and 2014. Because bonuses do not compound the same way general pay raises do, however, all service members would have lower overall compensation in 2014 and beyond, unless the bonus program was extended.

The rationale for this option is that increasing selected reenlistment bonuses is a more efficient way to address occupational mismatches than is giving general pay increases, because bonuses allow the Department of Defense to target compensation to specific occupational categories. On average, from 2000 to 2007, about 30 percent of enlisted occupations regularly had shortages, while about 40 percent usually were overstaffed. General pay increases would alleviate shortages in some occupations but would worsen surpluses in others. Unlike pay increases, bonuses would be more easily adjusted from year to year to match recruiting and retention goals. Bonuses also would not incur the heavy cost of "tagalongs," the elements of compensation, such as retirement benefits, that are tied to basic pay.

Another advantage of this option stems from the flexibility of bonuses, which could be focused on the years of service in which personnel make career decisions. And larger bonuses could provide more meaningful differences in pay among occupations, which could be a costeffective tool for improving military readiness. An argument against this option is that expansion of reenlistment bonuses would amplify pay differences among occupations and thus counter the tradition of the military services that personnel with similar amounts of responsibility should receive similar pay. The practice of increasing bonuses also would reduce service members' retirement and other benefits they would receive if the money was part of basic pay throughout a career. In addition, some would argue that large across-the-board pay increases should continue to be granted if extensive overseas contingency operations persist, especially if the U.S. economy improves.

### RELATED OPTION: 050-14

RELATED CBO PUBLICATIONS: Evaluating Military Compensation, June 2007; and Recruiting, Retention, and Future Levels of Military Personnel, October 2006

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### 050 050-16—Discretionary

### **Reduce Military Personnel in Overseas Headquarters Positions**

The last fundamental reorganization of military headquarters occurred under the Goldwater-Nichols Department of Defense Reorganization Act of 1986. That law gave the unified theater commands—such as the European and Pacific Commands—the lead in planning operations and executing policy, and it had them report directly to the President. When a crisis develops that requires additional military forces and support, a unified theater commander calls on the four military services, which recruit, train, equip, and support the forces; the commanders then employ the forces in their geographic areas of responsibility.

In practice, unified theater commanders constitute another management layer over existing overseas service component commands, such as the U.S. Army Europe and the Pacific Fleet. The commanders' requests are relayed through component commands to the services' U.S. headquarters. Because each service maintains its own headquarters in a given region, there are redundancies in many management functions. In some regions, the only personnel in a particular service branch are those at the component command headquarters. Those various overseas headquarters now are staffed by 6,000 personnel, or 10 percent of all headquarters staff. The services are changing the locations of some of their combat forces overseas, moving some units from one base to another and returning some units to the United States, but that effort does not affect the services' overseas component commands.

This option would reorganize the military's command structure by eliminating the overseas component headquarters, a change that could release 4,000 troops for critical missions. This option would not cut end strength. Instead it would free those military personnel

**RELATED OPTION: 050-17** 

for assignment to different duties. Some operating costs might be saved, but because those savings are difficult to estimate and likely to be small, no year-by-year table is shown.

Advantages of this option are that eliminating overseas component commands would tighten command and control and free troops for other duties. The option would streamline communications by eliminating a management layer between the services and the unified theater commanders. However, because some component command responsibilities probably could not be eliminated, this option would retain some personnel.

An argument against this option is that the overseas component commands provide essential support, including dedicated and responsive support for staging operations and integrating personnel and equipment deployed to a region. The unified theater commanders are thus freed to concentrate on their combat responsibilities. Overseas component commands also bolster theater support services (medical support, engineering, intelligence, fuel handling, and supply transport, for example), and they plan and execute joint and coalition military exercises and treaty obligations as directed by the North Atlantic Treaty Organization and under bilateral agreements.

Another argument against this option is that the envisioned restructuring would be the largest since the Goldwater-Nichols Act, and it could eliminate as many as 45 general-officer positions overseas. Some analysts within the Pentagon argue that despite the difficulty, the new threat environment and the need for additional combat troops demand consideration of just such a widespread reorganization. 050-17—Discretionary

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Replace Military Personnel in Some Support Positions with Civilian Employees of the Department of Defense	
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						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	230	490	750	1,030	1,050	3,550	9,290
Outlays	220	470	740	1,010	1,050	3,490	9,200

Several thousand jobs in the Department of Defense (DoD) that are currently filled by military personnel could be done by civilians. Some jobs are in categories one service branch considers "military essential" that the others do not, and some in all branches could be filled by civilians. The jobs are in military units that do not deploy overseas for combat, and they do not involve sensitive functions that might raise security concerns.

Over four years, this option would replace 20,000 of the more than 500,000 uniformed military personnel in support jobs with 14,000 DoD civilian employees and make those military positions available for combat functions. Some analysts say as many as 90,000 positions could be converted. Although costs would increase overall, some savings would occur as fewer civilians were substituted for a given number of military personnel. Because the civilians would not be encumbered with military-specific duties, they would have more time to perform their jobs.

Nevertheless, the addition of civilians could increase outlays by about \$3.5 billion between 2010 and 2014 and by \$9 billion between 2010 and 2019, as indicated by DoD's experience with similar conversions. That cost could be lower if some converted positions were opened to contractors. In 2004, DoD approved a plan to convert 10,000 Army military positions to civilian positions between 2006 and 2011, replacing a group of military personnel with fewer civilians than the Congressional Budget Office assumed when estimating the costs of this option. Depending on the degree of streamlining achieved, the cost of implementation could be lower than shown here.

Although proposals to convert military to civilian positions have been made in the past, only a small percentage of DoD's personnel have been subject to review. In 2007, DoD made an inventory of civilian and military positions, categorizing them by function; determining whether they were inherently governmental; and, if so, deciding whether each had to be filled with a military service member. That inventory could be used to identify new positions for civilian employees of DoD.

The Air Force categorizes as military 61 percent of its positions in the functional category of morale, welfare, and recreation services. Removing that designation could open about 2,500 jobs to civilians. The Army fills 32 percent of its positions in legal services and support with military staff. In contrast, the Navy has 58 percent and the Air Force has 78 percent of those positions staffed with military personnel. Converting some of the Air Force and Navy jobs in that category could open almost 4,000 jobs to civilians.

Proponents of transferring military personnel out of nonmilitary tasks argue that even if military end strength was not reduced, personnel would still be freed to fulfill their primary mission of military combat. Moreover, efficiencies might be had if a fixed number of military personnel could be replaced by a smaller number of civilians.

Opponents of this option argue that defining, evaluating, and then redesignating positions would be a cumbersome process with costs and savings that are difficult to measure. They point out that comparisons among the services can be misleading because some functional areas are service specific. The Navy, for example, must rely on military personnel to fill shipboard support positions. Finally, substituting DoD civilian employees for military personnel without reducing end strength would increase DoD's total costs.

Consolidate and Encourage Efficiencies in Military Exchanges											
						То	tal				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Spending											
Budget authority	0	-66	-134	-203	-206	-609	-1,711				
Outlays	0	-42	-106	-173	-199	-520	-1,602				

### 050-18—Discretionary 050

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

The Department of Defense (DoD) operates three chains of military exchanges-the Army and Air Force Exchange Service, the Navy Exchange Command, and the Marine Corps exchange system. The exchanges provide an array of retail goods and consumer services at military bases for combined annual sales of about \$12 billion, the Congressional Budget Office estimates.

This option would consolidate the three systems into a single organization. In addition, it would encourage more efficient operation by requiring the combined system to pay all of its operating costs from sales revenues, rather than relying on DoD to provide some services free of charge. Studies sponsored by the Office of the Secretary of Defense show that consolidation could lead to significant efficiencies by eliminating the costs of maintaining several purchasing and personnel departments, warehouse and distribution systems, and management headquarters. After a three-year phase-in period, those changes would save about \$200 million annually.

Although consolidation would entail some one-time costs, CBO estimates that the required spending would be offset by inventory reductions and other efficiencies.

In 2009, DoD requested about \$250 million in appropriations to support the exchanges. DoD maintains some parts of buildings, transports goods overseas, and provides utilities at overseas stores. DoD also provides indirect types of base support, such as police and fire protection. Under this option, the combined system would

reimburse DoD for the costs of direct support and would thus have an incentive to economize on its use. Furthermore, the requirement for the system to pay all of its own operating costs would improve the exchanges' visibility in the defense budget.

When the exchanges' revenues exceed full operating costs, a portion of the surplus goes to fund military morale, welfare, and recreation programs. The surpluses would likely be smaller under this option, so it is assumed that lawmakers would appropriate about \$55 million per year in additional funds for those programs.

One obstacle to implementing this option would be the need to find an acceptable formula for allocating the funds for morale, welfare, and recreation activities among the individual services. There could be concern about fair distribution-either of the earnings or of any additional appropriations-or fear that lawmakers would gradually reduce additional funding for those activities.

Some critics of consolidation argue that the Navy Exchange Command and the Marine Corps's system, with their unique service identities, meet the needs of their patrons better than a larger, DoD-wide system could. But consolidation proponents point to the Army and Air Force Exchange Service, which has served both branches for many years. People who shop in exchanges say their main concern is the availability of low prices and a wide selection of goods-a concern that a consolidated system might be able to satisfy more effectively.

Outlays

-6,511

### 050-19—Discretionary

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-157	-318	-483	-652	-828	-2,438	-6,860

-426

-591

-764

### Consolidate the Department of Defense's Retail Activities and Provide a Grocery Allowance to Service Members

Note: Estimates of costs or savings displayed in the table are based on the fiscal year 2009 Future Years Defense Program and CBO's projection of the implications of that program.

-265

-113

The Department of Defense (DoD) operates four retail systems on military bases: a network of grocery stores (commissaries) for all of the service branches and three chains of general retail stores (exchanges) for the Army and Air Force, the Navy, and the Marine Corps. This option would consolidate those systems into a single retail system that would operate more efficiently, without any appropriated subsidy. Like the current separate systems, the consolidated system would give military personnel access to low-cost groceries and other goods at all DoD installations, including those in isolated or overseas locations.

The current commissary and exchange systems operate under very different funding mechanisms. The commissary system, which is run by the Defense Commissary Agency (DeCA), has yearly sales of about \$6 billion, but it also receives an annual appropriation of about \$1.3 billion. The three exchange systems have annual sales that total about \$12 billion. They receive no direct appropriations; instead, they rely on sales revenue to cover most of their costs.

The exchanges can operate without an appropriated subsidy because they charge customers a higher markup over wholesale prices than commissaries do. The exchange systems also are nonappropriated-fund (NAF) entities rather than federal agencies, so they have more flexibility in business practices for personnel and procurement. Because DeCA is a federal agency, its employees are civil service personnel and it follows standard federal procurement practices. This option assumes that consolidation would eliminate duplicative overhead headquarters functions and that DeCA's civil service employees would be converted to the NAF workforce. Under this option, the commissary and exchange systems would be consolidated over a five-year period. At the end, the budget authority required to operate the combined system would be lower by about \$1.7 billion per year. This option would return half of that amount to activeduty service members through a tax-free grocery allowance of about \$600 per year, payable to service members who are eligible to receive cash allowances for food. The grocery allowance would be phased in to coincide with the consolidation of commissary and exchange stores at each base. The remaining \$830 million would represent annual savings for DoD.

-2,158

To break even without appropriated funds, the consolidated system would have to charge about 5 percent more for groceries and other merchandise sold in the consolidated system. At current rates of commissary and exchange sales, a 5 percent price increase would cost customers an extra \$900 million annually.

Active-duty members and their families would benefit from consolidation. Those families would pay about \$300 more per year for groceries and other merchandise, on average, but that amount would be more than offset by the new grocery allowance. (A military family would have to spend about \$12,000 per year on groceries and other merchandise in the consolidated system before the 5 percent increase outweighed the benefits of the \$600 allowance.) Cash allowances would be particularly attractive to personnel who live off base and could shop more conveniently near home or online. All military familiesactive-duty, reserve, and retired-would benefit from longer store hours, one-stop shopping, access to privatelabel groceries (which are not currently sold in commissaries), and the greater certainty of a military shopping benefit that did not depend on the annual appropriation

**050** process. Another advantage is that the \$600 average grocery allowance could be targeted to specific pay grades or groups, with larger allowances given to enhance retention or to benefit junior enlisted members with large families, for example.

DoD's retail system would benefit as well. Commissaries and exchanges must now compete with online retailers and the large discount chains that have opened discount grocery and general merchandise stores just outside the gates of many military installations. Recent tightening of base security procedures and changes in the civilian retail industry have made it more difficult and costly for DoD's fragmented retail systems to provide those services. This option would allow a consolidated system staffed by NAF employees to better compete with civilian alternatives.

Nonetheless, one argument against this change is that low-cost shopping on bases has long been a benefit of military service. Under this option, about \$500 million of the price increase would be borne by the military retirees who now shop in commissaries and exchanges but who would not receive grocery allowances. The average family of a retired service member would pay about \$200 more per year for groceries.

RELATED OPTION: 050-18 RELATED CBO PUBLICATION: *Evaluating Military Compensation*, June 2007

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						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	0	-20	-21	-23	-25	-89	-279
Outlays	0	-13	-20	-22	-24	-79	-258

### 050-20—Discretionary

The Domestic Dependent Elementary and Secondary Schools (DDESS) system operates schools on several U.S. military bases to educate dependents of on-base personnel. The Department of Defense (DoD) operates a separate school system for military children overseas.

This option would close all schools run by the DDESS system, with the exception of the schools in Puerto Rico and Guam, and increase the use of local public or private schools instead. To reduce the effect on military families, however, DoD would offer affected families a tuition allowance of about \$8,600 per student. Under this option, DoD would save about \$135 million in 2011. The financial impact on the federal government as a whole would be less than that, however, because the Department of Education would have to spend more on Impact Aid, which it pays to local school districts that enroll children living on military bases. If 80 percent of affected students attended public schools, for example, local school districts would receive about \$115 million in Impact Aid and other federal funding. In that case, the savings in 2011 would be \$20 million, and the federal government would save about \$30 million per year between 2011 and 2019.

Supporters of this option argue that DoD's school system is no longer necessary. The geographic distribution of DDESS schools reflects a time when segregated public schools in the South did not adequately serve an integrated military. Most U.S. military bases currently have no DDESS school, and where such schools do exist, they generally enroll only children of active-duty members who live on-base. Those who live off-base, and children of civilian employees, become the responsibility of local school districts. In addition, in most cases, no DDESS secondary schools are available. High school students who live on-base enroll in local public schools or attend private schools at their parents' expense.

Substituting cash allowances for in-kind DoD schools need not create major disruptions. The approximately 23,000 students who might be affected already change schools frequently, in large part because they move often with military parents who are reassigned. In many locations, the public school district or a new private school could use DoD's facilities. (DoD already offers support to some local districts by allowing public schools to operate on-base or by providing additional limited funding on a per-student basis.)

Critics of this option may believe that DoD schools offer higher quality education than is available in local public or private schools. Also, some former DDESS students might face longer commutes. Finally, some of the savings to the federal government from this option would be offset by increased costs to local school districts. Currently, some of those districts are effectively subsidized because they do not pay any of the costs of educating DDESS students even as they receive at least some direct and indirect tax revenues from their parents. If the DDESS schools were closed, and if increased Impact Aid and other federal funds did not fully cover the cost of additional students in the public schools, state and local governments would have to absorb the difference.

Change Depots' Pricing Structure for Repairs											
						То	tal				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Spending											
Budget authority	-90	-180	-280	-280	-280	-1,110	-2,570				
Outlays	-70	-160	-250	-270	-280	-1,030	-2,470				

### 050 050-21—Discretionary

When vehicle transmissions, radar equipment, and other components of weapon systems need repairs, unit commanders can have the work done at their own facilities or send the equipment to the military's central maintenance depots. Under current policies, the depots' repair charges sometimes exceed actual repair costs. That in turn can raise total costs to the Department of Defense (DoD) because there is less incentive to use the depots, even if doing so would save money overall.

This option would allow depots to charge only for the incremental cost of repairs (that is, the costs attributable to the specific maintenance action). Currently, repair charges for components (called depot-level repairables, or DLRs) include incremental costs for labor, materials, and transportation and a share of the fixed costs of overhead. Under this option, the DLR charges would include only incremental costs. Fixed costs, including overhead, would be covered by an annual flat fee paid by customers. The new pricing policy could save about \$1 billion in outlays over five years because commanders would have stronger incentives to send the work to depots.

A two-part pricing structure, similar to that used by some utility companies, has been proposed by the RAND Corporation, the Center for Naval Analyses, and others. One RAND study concluded that two-part pricing would reduce depot charges by more than a third. The reduction could shift the workload to depots, and that in turn could reduce DoD's total repair expense. According to RAND, the Navy, and the Office of the Secretary of Defense, local maintenance can cost from 25 percent more to twice as much as repairs done at the depots.

DoD estimates local-facility repair costs at \$54 billion. If two-part pricing shifted just 2 percent of the workload to centralized depots, about \$1 billion in repair costs also would shift each year. DoD could save \$250 million in annual outlays, on average, between 2010 and 2019.

Shifting repair work also could improve quality because local facilities often are not as well equipped for some tasks as depots are. The depots' higher prices can give local facilities an incentive to scavenge parts, and eventually, scavenged DLRs could be sent out for repairs, resulting in labor charges from two facilities for one unit.

A disadvantage of this option is that it could be difficult to develop accurate two-part prices. Depot managers, eager to attract work by keeping prices as low as possible, might try to move variable costs into the flat fee or use direct appropriations to pay for variable expenses. They might be reluctant to separate variable repair costs from fixed costs if doing so could highlight excess capacity. Such influences on prices would cloud cost comparisons between depots and local repair facilities. Two-part pricing also would eliminate a primary benefit of current DLR pricing: total cost visibility. By including fixed and workload-dependent costs in charges, the current system is intended to boost cost-consciousness and encourage commanders to be prudent in their use of DLRs. The system has worked, but it also creates an unintended incentive for unit commanders to use local facilities.

RELATED OPTION: 050-22

RELATED CBO PUBLICATION: *Review of Proposed Congressional Budget Exhibits for the Navy's Mission-Funded Shipyards*, Letter to the Honorable Duncan Hunter, April 14, 2006

Ease Restrictions on Contracting for Depot Maintenance										
						То	tal			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	0	-90	-180	-270	-370	-910	-4,170			
Outlays	0	-70	-150	-240	-340	-800	-3,880			

### 050-22—Discretionary

### Currently, the Department of Defense (DoD) spends about \$30 billion annually for equipment maintenance and repairs provided at its central maintenance depots or at facilities operated by private-sector contractors. The "50/50 rule" specified in 10 U.S.C. section 2466 allows DoD to award contracts for up to half of its depot maintenance appropriations to private-sector bidders, although some public-private partnerships are excluded from the calculation. Generally, work that is assigned directly to government depots without competitive bidding from the private sector costs more. Historically, opening depot work to private-sector bidders has been estimated to save at least 20 percent of costs, including cases in which the government depot wins the work. Studies that have tracked postcompetition costs have shown that the savings from competition persist beyond the initial contract award.

The 50/50 rule constrains DoD's use of the private sector. If lawmakers were to relax the rule to a 60/40 split, DoD could open more depot work to competitive bidding and stay within the new rule as long as the private sector did not take more than about \$3 billion worth of work per year. With the new rule, an additional \$4 billion in repair work could be opened to competitive bidding each year, assuming the private sector won three-quarters of the contracts. Savings would not occur immediately and would be less in the near term because it would take the depots time to prepare for additional competition and to

adjust to changes in workload. Under a conservative assumption that competition would ultimately save about 20 percent of costs, average annual savings through 2019 would be about \$390 million. Alternatively, the 50/50 rule could be eliminated or redefined so the calculation applied to all maintenance (that would include unit-level and intermediate maintenance now performed mostly by DoD personnel). Savings would be larger under those changes because the depots could subject even more work to bidding.

Proponents of this option argue that the current limits are arbitrary and reduce DoD's flexibility in determining which source is best to provide maintenance. Easing the restrictions would allow DoD to seek the most efficient and most cost-effective source of support.

Opponents are concerned that DoD should maintain a skill base within its operational units to perform depot maintenance. They also consider it important that DoD retain the capacity to sharply increase depot maintenance when required, although private contractors often can meet sudden increases in demand. Some opponents also question the comparability of government and private accounting methods (mainly because of the government depots' limited capability for cost accounting) and so question the fairness of the competition. Finally, opponents of this option express concerns that it might lead to the loss of federal civilian jobs at the depots.

### RELATED OPTION: 050-21

RELATED CBO PUBLICATION: *Review of Proposed Congressional Budget Exhibits for the Navy's Mission-Funded Shipyards*, Letter to the Honorable Duncan Hunter, April 14, 2006

## **International Affairs**

Spending by various departments and agencies on international programs is covered in this function, which includes the Department of State's conduct of foreign relations, economic and humanitarian aid given to developing countries, military and other assistance to other nations, radio and television broadcasting and exchange programs, and financial assistance for the export of U.S. goods and services. The Congressional Budget Office estimates that discretionary outlays for function 150 will total about \$41 billion in 2009. Foreign military sales, repayments of loans, and income to the Exchange Stabilization Fund account for most of the negative amounts in mandatory spending for this function.

From 2004 to 2009, discretionary spending for international affairs will grow by \$10.1 billion, or about 30 percent, CBO estimates. Of that growth, about twofifths (\$4.0 billion) is for the conduct of foreign relations, about a third (\$3.5 billion) is for the expansion of global health programs, and nearly a third (\$3.1 billion) is for the provision of funds to other countries for economic support and assistance with narcotics control. Some growth is associated with the establishment of the Millennium Challenge Corporation in 2004.

						Estimate	-	e Annual vth (Percent)
	2004	2005	2006	2007	2008	2009	2004-2008	2008-2009
Discretionary Budget Authority	49.3	34.7	35.9	39.1	43.2	58.1 <sup>a</sup>	-3.3	34.4
Outlays								
Discretionary	33.7	39.2	36.1	34.8	37.5	43.8	2.8	16.6
Mandatory	-6.8	-4.6	-6.5	-6.3	-8.6	-3.5	-6.3	59.4
Total	26.9	34.6	29.6	28.5	28.9	40.3	1.8	39.3

a. Includes \$0.4 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

### IN ADDITION TO THE SPENDING OPTION FOR BUDGET FUNCTION 150, SEE THE FOLLOWING REVENUE OPTIONS:

Revenue Option 50 Tax the Worldwide Income of U.S. Corporations as It Is Earned

Revenue Option 51 Exempt Active Foreign Dividends from U.S. Taxation

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)							То	tal
	(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
	Change in Spending							
	Budget authority	-42	-49	-50	-55	-58	-254	-561
	Outlays	-10	-21	-29	-40	-48	-148	-421

### **150-1—Discretionary**

### **Eliminate the Overseas Private Investment Corporation**

The Overseas Private Investment Corporation (OPIC) offers private U.S. companies subsidized financing for foreign investments and insurance against political risks to those investments, including nationalization. The aim is to support economic development in some countries that are "strategically important" to the United States. Appropriations for administrative expenses and subsidies for OPIC in 2009 total \$80 million.

This option would eliminate new activity by OPIC, although it would continue to service its existing portfolio. This change would save \$10 million in outlays in 2010 and \$148 million through 2014. The main rationale for implementing this option is that the activities of OPIC may not provide net public benefits to the United States. Its subsidies deliver benefits to foreigners and selected U.S. businesses. Furthermore, its subsidies to nations of strategic importance to the United States tend to overlap with and duplicate those provided by the U.S. Agency for International Development and by private insurance firms. They also could hamper the development of local financial institutions and markets in those countries.

An argument against this option is that by subsidizing U.S. investment in developing and transitional economies, OPIC could induce a small increase in investment in those economies.

RELATED OPTIONS: 350-4, 350-5, 350-6, and 370-1

RELATED CBO PUBLICATIONS: The Decline in the U.S. Current-Account Balance Since 1991, Issue Brief, August 6, 2004; and The Domestic Costs of Sanctions on Foreign Commerce, March 1999; The Role of Foreign Aid in Development, May 1997

## General Science, Space, and Technology

unction 250 includes federal funding for the broad-based scientific research and development programs of the National Aeronautics and Space Administration (NASA) and the National Science Foundation (NSF) and for the general science programs of the Department of Energy (DOE) and the Department of Homeland Security (DHS). (Federal funding for research and development in other areas, including defense, health, and agriculture, is included in those respective budget functions.)

More than half of the funding in function 250, which totals \$34.9 billion in 2009, is devoted to NASA's space and science programs, including the International Space Station, the space shuttle, space-based observatories, and various robotic missions. Function 250 received about \$5.5 billion in the American Recovery and Reinvestment Act of 2009 (Public Law 111-5): about \$900 million for

NASA, \$3 billion for NSF, and \$1.6 billion for science programs of DOE. NSF, which accounts for 27 percent of 2009 funding in this function, is the government's principal sponsor of basic research at colleges and universities. DOE's general science programs, which are funded at about \$6.4 billion for 2009, support specialized facilities and basic research in such areas as high-energy and nuclear physics, advanced computing, and the biologic and environmental sciences. DHS's research and development programs are funded at nearly \$1 billion in 2009.

Most spending in function 250 is discretionary. Spending grew at an average annual rate of 8.5 percent from 2006 to 2008, after growing only slightly from 2004 to 2006. Much of the recent increase is attributable to large increases in NASA's spending. In 2009, outlays are projected to reach nearly \$31 billion, an increase of 11.4 percent from the year before.

						Estimate	-	Annual /th (Percent)
	2004	2005	2006	2007	2008	2009	2004-2008	2008-2009
Discretionary Budget Authority	23.4	24.2	24.9	26.1	27.5	34.9 <sup>a</sup>	4.2	26.7
Outlays								
Discretionary	23.0	23.6	23.5	25.5	27.7	30.8	4.8	11.3
Mandatory	0.1	0.1	0.1	0.1	0.1	0.1	5.1	7.3
Total	23.1	23.6	23.6	25.6	27.8	30.9	4.8	11.2

a. Includes \$5.5 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 250, SEE THE FOLLOWING REVENUE OPTION:

Revenue Option 41 Permanently Extend the Research and Experimentation Tax Credit

							То	tal
0	(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
	Change in Spending							
	Budget authority	-109	-111	-111	-112	-113	-556	-1,145
	Outlays	-13	-57	-86	-102	-108	-366	-931

### 250-1—Discretionary

# Eliminate National Science Foundation Spending on Elementary and Secondary Education

In 2009, the National Science Foundation (NSF) received \$109 million to promote improved science and mathematics education in elementary and secondary schools. The NSF programs primarily support advanced teacher training and continuing education, but they also are used for development of instructional and assessment materials.

This option would eliminate funding for those efforts. Implementing this option would save \$13 million in outlays in 2010 and \$366 million over five years. (This option would not affect the Math and Science Partnership. NSF is a collaborator in that partnership, which complements the efforts of the Department of Education in meeting national goals for mathematics and science education.)

Proponents of this option argue that NSF's efforts duplicate the work of larger programs in the Department of Education and in state and local governments. The No Child Left Behind Act, for example, mandates the hiring of more highly qualified teachers in all fields (not just in science and mathematics), and it provides resources for developing teachers' skills. That act also requires school systems to undertake specific, systematic assessments of students' progress in reading, science, and mathematics in several grades. Currently, the Department of Education is spending \$24 billion helping elementary and secondary schools in a variety of programs, including those for science and mathematics achievement. In the academic year that began in September 2005, state and local governments spent \$470 billion on public elementary and secondary education, and many governments devote resources to improving the quality of training all their teachers receive, including their teachers of mathematics and science.

Opponents of this option argue that NSF leverages its small contribution by focusing on basic educational research while allowing other agencies to develop and implement programs that apply NSF's results. Thus, for example, NSF programs focus on providing professional resources for the instructors of science teachers, whereas the programs of the Elementary and Secondary Education Act and the Math and Science Partnership implement quality improvement measures for the science teachers themselves. Opponents of this option also argue that, beyond the benefits that accrue to the individual student, society benefits from having a better educated populace. The NSF program, which focuses on improving the quality of the educational materials, could help increase those benefits.

Delay the Human Lunar Missions by Five Years										
Total										
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending								250		
Budget authority	0	-500	-1,000	-1,800	-2,500	-5,800	-24,700	_		
Outlays	0	-300	-780	-1,450	-2,173	-4,703	-23,588			

### 250-2—Discretionary

In 2004, the Bush Administration announced its Vision for Space Exploration (VSE), which provides guidance for the activities of the National Aeronautics and Space Administration (NASA). The VSE states that the space shuttle should be retired by 2010, that a new crew exploration vehicle (CEV) should replace the shuttle by 2014, and that CEV lunar missions should begin by 2020. The lunar missions will be a stepping-stone for human exploration of Mars and other, more distant parts of the solar system. To return humans to the moon, NASA has decided to develop two launch vehicles: the Ares 1 crew launch vehicle, which will lift the Orion CEV into orbit, and the larger and more powerful Ares 5 cargo launch vehicle, for launching the hardware and fuel the Orion will require. Both new launch vehicles would incorporate some components of the existing space shuttle. Development of the Orion, Ares 1, and Ares 5 is being funded and managed under NASA's Constellation Program.

Under this option, the Constellation Program would maintain its schedule for the March 2015 return to human spaceflight with Ares 1 and Orion, but the schedule for the first human lunar mission of the Constellation Program including the Ares 5 would be delayed by five years, to 2025. About \$600 million would be allotted annually for research and technology development and for maintaining the manufacturing and technology base. The savings in outlays would total about \$4.7 billion through 2014 and \$23.6 billion through 2019.

A benefit of this option would be the additional time NASA would have to consider different approaches to conducting human lunar missions. During the past several years, NASA has made design changes to the Orion, Ares 1, and Ares 5 in response to technical concerns and budgetary constraints. Some observers argue that the shuttle-derived approach NASA has chosen is neither the least costly nor the safest approach, and they cite the design changes as supporting evidence. Others argue that the VSE's schedule constraints do not allow enough time to address the limitations that NASA's choices for the Ares 5 might impose on its ability to achieve long-term goals for exploring Mars and other, more distant parts of the solar system. Delaying the first human lunar mission to 2025 would allow those issues to be studied in greater detail; it also would provide more time to implement whatever approach was chosen.

A drawback of this option is that it might hamper NASA's ability to sustain the engineering workforce (including the personnel who now conduct shuttle launch operations) the agency would need to support human lunar missions. Planned benefits from human lunar missions, such as the establishment of a lunar outpost, would be delayed by five years.

RELATED CBO PUBLICATIONS: *The Budgetary Implications of NASA's Current Plans for Space Exploration*, April 2009; *An Analysis of NASA's Plans for Continuing Human Spaceflight After Retiring the Space Shuttle*, Letter to the Honorable Dave Weldon, November 3, 2008; and *Alternatives for Future U.S. Space-Launch Capabilities*, October 2006

							То	tal
50	(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
	Change in Spending							
	Budget authority	-80	-80	-81	-81	-82	-405	-836
	Outlays	-24	-48	-80	-81	-81	-315	-738

### 250-3—Discretionary

Reduce Funding for Research and Development Programs in the Science and Technology Directorate of the Department of Homeland Security

In 2009, the Directorate for Science and Technology in the Department of Homeland Security (DHS) received \$790 million for work that includes basic and applied research; development and testing of standards, prototypes, and preproduction hardware; and procurement of products, systems, and equipment. DHS undertakes those activities to develop technology and products that preserve the security of the United States.

This option would reduce funding for those research and development activities by 10 percent, resulting in a reduction of \$24 million in outlays in 2010 and \$315 million over five years.

The House and Senate Appropriations Committees have criticized the directorate's performance, and in 2006 and 2007, \$145 million in funds appropriated previously for science and technology research and development was rescinded. In addition, some analysts assert that other federal programs undertake similar research. In 2009, the department's Domestic Nuclear Detection Office received \$323 million for research and development programs. That office was established in 2005 to focus DHS's efforts on nuclear and radiologic countermeasures, areas that previously fell under the domain of the Directorate for Science and Technology. In addition, some DHS research and development programs for chemical and biological weapons are similar to those of the Department of Defense, which spends several hundred million dollars annually on research programs in those areas. To a lesser extent, some DHS programs relating to explosives are similar to efforts in the Department of Justice's Bureau of Alcohol, Tobacco, Firearms, and Explosives.

Opponents of this option argue that DHS's research and development programs are essential to developing technology that could be useful in protecting the United States from terrorists' attacks. They contend that terrorists constantly devise new weapons and means to harm the United States and that it is imperative that DHS invest in programs to keep pace with emerging threats.

# 270 Energy

ederal efforts in energy research, production, conservation, and regulation are funded under budget function 270. The civilian programs of the Department of Energy (DOE) are included, as are energy-related research and development, the Strategic Petroleum Reserve (SPR), cleanup of federal sites used for civilian energy research and production, development of a nuclear waste repository in Nevada, and energy conservation grants to states. Although the costs of regulating energy production and distribution are included, they are offset almost entirely by fees charged to the regulated entities.

Function 270 covers agencies that generate and sell electricity, such as the Tennessee Valley Authority (an independent agency) and the four power marketing administrations managed by DOE. Also included are DOE's loan programs that support advanced-technology automobiles and innovative energy production facilities and programs managed by the Rural Utilities Service (RUS) of the Department of Agriculture that benefit rural electric and telephone cooperatives (DOE's atomic weapons activities are in budget function 050, national defense.) Net outlays include offsetting receipts from fees paid by nuclear utilities for future storage of nuclear waste; repayments of RUS loans; and proceeds from the sale of uranium, electricity, and SPR oil.

The American Recovery and Reinvestment Act of 2009 (ARRA, Public Law 111-5) increased funding for function 270 by \$38.5 billion. Of that, \$32.0 billion was discretionary funding for energy efficiency and renewable energy, modernizing the nation's electricity grid, developing technology for carbon capture and storage, expanding environmental cleanup, and covering the subsidy costs for federal loan guarantees for renewable-energy systems and electric transmission projects. ARRA also provided \$6.5 billion in mandatory funding for capital investments in electric power transmission systems.

The Congressional Budget Office estimates that net discretionary outlays this year for the function will total nearly \$5.4 billion—about 50 percent more than the average between 2004 and 2008. The amount includes a fraction of expected spending under ARRA, which CBO anticipates will occur over several years.

						Average Annual		
						Estimate	Rate of Grow	th (Percent)
	2004	2005	2006	2007	2008	2009	2004–2008	2008-2009
Discretionary Budget Authority	3.6	3.8	4.0	4.2	5.0	45.4 <sup>a</sup>	8.9	807.7
Outlays								
Discretionary	3.4	3.8	3.4	3.7	3.9	5.4	3.4	40.0
Mandatory	-3.6	-3.4	-2.7	-4.6	-3.2	-2.4	2.3	25.9
Total	-0.2	0.4	0.8	-0.9	0.6	3.0	n.a.	379.8

### Federal Spending, Fiscal Years 2004 to 2009 (Billions of nominal dollars)

Note: n.a. = not applicable (because of a negative value in the first year).

a. Includes \$32 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 270, SEE THE FOLLOWING REVENUE OPTIONS:

Revenue Option 33End the Expensing of Exploration and Development Costs for Extractive IndustriesRevenue Option 34Tax the Income Earned by Public Electric UtilitiesRevenue Option 59Make Permanent the Tax Credits for Generating Electricity from Renewable Resources

«CBO»

						То	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-887	-894	-901	-907	-917	-4,506	-9,325
Outlays	-222	-534	-760	-810	-861	-3,187	-7,898

### 270-1—Discretionary

### Eliminate the Department of Energy's Applied Research on Fossil Fuels

In 2009, the Department of Energy (DOE) received appropriations of about \$876 million in the Omnibus Appropriations Act, 2009 (Public Law 111-8), to fund research on applied technology for finding, producing, and using petroleum, coal, and natural gas. The American Recovery and Reinvestment Act of 2009 (P.L. 111-5) provided an additional \$3.4 billion.

This option would eliminate new funding for DOE's applied research programs for fossil fuels, saving \$222 million in outlays in 2010 and about \$3.2 billion over the next five years.

One argument in favor of this option is that DOE's programs were created when the prices of some fossil fuels were controlled and market incentives for the development of technology were muted. Now that energy markets are largely deregulated, federal spending for such research and development could warrant reevaluation. For example, the expectation that oil prices will return to an upward trend that was abruptly reversed by the current economic slowdown should provide an incentive for oil companies, and their equipment and service suppliers, to improve and then market the technology for locating and recovering fossil fuels.

Private entities would be likely to have a better understanding than federal officials do about which technologies offer the most commercial promise. DOE could then concentrate on basic energy research that offers broad public benefits such as investigating new sources of energy. Some argue that the federal government has a clearer role in funding basic research because the benefits are widespread rather than concentrated in individual companies. Furthermore, government auditors have repeatedly criticized DOE for failing to hold technology projects to their goals for cost, performance, and delivery.

The Office of Management and Budget has concluded that some fossil fuel research, including research on oil and natural gas technology, duplicates private-sector research and that the additional oil reserves that have resulted from technology developed by the program have been minimal.

A rationale against this option is evident from a 2001 assessment by a panel of the National Research Council: "DOE's [research, development, and demonstration] programs in fossil energy and energy efficiency have yielded significant benefits, . . . important technological options for potential application in a different (but possible) economic, political, and/or environmental setting, and important additions to the stock of engineering and scientific knowledge." Although many early programs (which emphasized synthetic fuels and other large-scale demonstrations) produced belowaverage returns, the panel said that projects funded after 1986 (which were more diverse and less focused on high-risk demonstrations) were more productive. In a 2007 follow-up, the academy reported on the likely benefits from a sample of DOE fossil fuel research projects. It concluded that the anticipated economic benefits exceeded costs several times over, even accounting for technical and other risks.

Another argument against this option is that DOE's efforts may help curtail the environmental damage resulting from the production and consumption of fossil fuels: By supporting applied research that results in the use of those fuels with less harm to the environment, their overall cost to society may be decreased. DOE's research programs also could increase energy efficiency and thereby lessen U.S. dependence on foreign oil.

RELATED OPTIONS: 270-2 and 270-6

RELATED CBO PUBLICATION: Federal Support for Research and Development, June 2007

Change in Spending Budget authority

Outlays

Other Petroleum Research Program										
	То	tal								
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			

-50

-40

-50

-48

-50

-50

Eliminate Funding for the Ultra-Deepwater and Unconventional Natural Gas and

### 270-2—Mandatory

The Energy Policy Act of 2005 established the Ultra-Deepwater and Unconventional Natural Gas and Other Petroleum Research program in the Department of Energy (DOE). It directed DOE to begin in 2007 to develop technology for drilling to ocean depths greater than 15,000 feet and for other unconventional means of fuel production. Unlike most other energy research programs, which are funded through annual appropriations, the ultra-deepwater program is funded by federal revenues from oil and gas leases.

-50

-3

-50

-20

Under this option, the program would be eliminated, saving \$3 million in outlays in 2010 and \$161 million over the five-year period. Because the authority for this program expires in 2014, all of the savings would occur as a consequence of reductions in budget authority from 2010 through 2014.

There are various rationales for implementing this option: It would be more appropriate for the private sector than for taxpayers to pay for the research and development (R&D) that would be supported by the program. Supporting that position is the general principle that the private parties who benefit from applied research ought to pay for it because they are better able than the public sector to decide how much to spend and on which specific projects. The government, by contrast, is in a better position to pay for basic research, which produces fundamental knowledge that offers more widespread benefits. Since no single company captures the bulk of those benefits, only the federal government has the incentive to fund such research at appropriate levels. Moreover, the federal government's record in funding other R&D related to natural gas exploration and production is not encouraging: The Office of Management and Budget has noted that such federal efforts have made only a relatively small contribution to increasing the nation's natural gas reserves.

-250

-161

-250

-250

Another argument in favor of the option is the program's unusual funding mechanism: Funds are derived directly from federal oil and gas receipts rather than through annual appropriations. Such mandatory spending is not subject to the scrutiny of the appropriation process, and the merit of activities funded that way is not considered in the Congress's annual effort to allocate available discretionary funds.

A rationale against implementing this option is found in the legislation that created it. One goal of the program is to support small, independent producers, who do most of the actual drilling for oil and natural gas but cannot afford to develop the technology for ultra-deepwater drilling. Research also might contribute to the safety of operations at natural gas production sites and to achieving various environmental goals, including the reduction of emissions of greenhouse gases and the sequestration of atmospheric carbon. Federal support for research with possible environmental benefits is consistent with the idea that the cost of damage to the environment is not reflected in market prices for different primary sources of energy. Notwithstanding the current and projected prices for natural gas, producers may not have sufficient incentive to undertake the amount and type of R&D that would produce socially desirable results.

						Το	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-337	-339	-341	-343	-347	-1,707	-3,523
Outlays	-118	-213	-265	-307	-336	-1,239	-3,020

### 270-3—Discretionary

### Eliminate Funding for Nuclear Energy Research and Development

Three applied research programs—the Advanced Fuel Cycle Initiative (AFCI), the Generation IV Nuclear Energy Systems Initiative, and the Nuclear Hydrogen Initiative (NHI)-are seeking new ways to generate and harness nuclear energy, reduce radioactive waste from nuclear facilities, and prevent nuclear proliferation. The AFCI's goal is to develop a demonstration plant to extract plutonium and other highly radioactive elements from spent nuclear fuel for use as a proliferation-resistant recycled fuel for a next generation of nuclear reactors. Generation IV is a project to design new reactors that use the recycled fuel. Because the new reactors would operate at extremely high temperatures, they would produce less waste than current plants do and destroy some of the longest-lived radioactive waste. The NHI is planned as a demonstration project to use heat from Generation IV reactors to produce hydrogen from water at a cost that will be competitive with traditional sources of fossil fuel.

This option would eliminate funding for the AFCI, the Generation IV program, and the NHI, saving \$118 million in outlays in 2010 and \$1.2 billion through 2014.

One argument in favor of this option is that the federal government should support basic rather than applied research because basic science brings more benefit to society as a whole. The commercial builders and operators of nuclear power plants would benefit most from technology developed in applied research projects like the AFCI, the Generation IV program, and the NHI but would bear little of the financial burden or risks associated with that work. Moreover, supporters of this option argue that the private sector, which answers to shareholders and creditors, can better judge the commercial viability of such projects. The proliferation of nuclear power plants also poses safety and environmental concerns and the possibility of cleanup costs that could fall to the government. Finally, supporters of this option dispute the claim that plutonium and transuranic elements extracted in the AFCI processes would inhibit proliferation of nuclear weapons.

A major argument against this option is that the Atomic Energy Act of 1954 made the federal government responsible for managing nuclear waste. Long-term storage capacity for spent fuel is limited and difficult to obtain: The President's proposed budget for 2010 would cut funding for the long-planned repository at Yucca Mountain with no alternative yet determined. Opponents of the option argue that the AFCI separation process would cut the amount of waste requiring such disposal and that Generation IV reactors would reduce the amount of waste produced. The NHI, they observe, would make hydrogen a commercially viable alternative to fossil fuels. Moreover, the public would benefit from reduced emissions of greenhouse gases-which are not by-products of nuclear power generation. Opponents of this option also contend that those research programs would support the Global Nuclear Energy Partnership, which seeks to expand nuclear energy use overseas while limiting the potential diversion of nuclear materials for use in weapons. Finally, they argue, federal funding is justified because of the possibility that the marketplace undervalues both the benefits of plants that produce smaller amounts of safer nuclear waste and the environmental costs of other power sources, such as coal-fired plants, that emit greenhouse gases.

### RELATED OPTIONS: 270-4, 270-5, and 270-8

RELATED CBO PUBLICATIONS: *Nuclear Power's Role in Generating Electricity*, May 2008; Statement of Peter R. Orszag, Congressional Budget Office, before the Senate Committee on Energy and Natural Resources, *Costs of Reprocessing Versus Directly Disposing of Spent Nuclear Fuel*, November 14, 2007; and *Federal Support for Research and Development*, June 2007

 $\mathbf{270}$ 

						To	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-180	-181	-182	-184	-185	-912	-1,883
Outlays	-63	-114	-141	-164	-180	-662	-1,614

### **270-4**—**Discretionary**

### Eliminate Funding for the Department of Energy's Nuclear Power 2010 Program

The Department of Energy's Nuclear Power 2010 program was created to expand the electricity-generating capacity of nuclear power in the United States by reducing the private cost of plant design and regulatory approval. No nuclear plants have been planned and financed in the United States since the 1970s, despite the streamlining of the licensing process mandated by the Energy Policy Act of 1992 and despite the fact that nuclear power plants generate electricity without emitting greenhouse gases. The program offers incentives to the first few industry participants that attempt to license advanced nuclear power plants (those whose designs were certified by the Nuclear Regulatory Commission after December 31, 1993, none of which have been built in the United States). The object of the program is to demonstrate the revised licensing process and advanced reactor designs, which could lead to the construction of additional advanced nuclear plants that do not rely on government subsidies.

This option would eliminate federal funding for the Nuclear Power 2010 program. Doing so would reduce discretionary outlays by \$63 million in 2010 and by \$662 million over the period from 2010 to 2014.

Supporters of the option argue that it is inappropriate to provide public subsidies for projects whose risks and costs would otherwise be prohibitive to private enterprise. Sharing licensing costs could lead nuclear industry participants to propose projects that are excessively risky because participants would not bear the entire cost of a failed effort at licensing. Advocates of canceling the program add that significant risks to public safety exist because of the vulnerability of nuclear plants to terrorist attacks and because of the potential for a catastrophic nuclear accident. They maintain that nuclear power plants damage the environment through routine radioactive discharges, the creation of long-lived radioactive waste, and the emission of greenhouse gases during plant construction and uranium mining (although not during operation). Another argument in favor of this option is that restrictions or taxes on the emissions of greenhouse gases would more directly and efficiently reduce those emissions.

Opponents of this option argue that nuclear power plants alone are capable of generating large quantities of electricity at competitive costs without emitting greenhouse gases. Although advanced nuclear power plants could become commercially viable, initial subsidies are likely to be necessary because of the relatively high regulatory risk facing the first few contractors to test the streamlined licensing process; because of the large costs of construction for the first plant of each advanced reactor design; and because of the current failure of the U.S. electricity market to account for the environmental cost of emissions of greenhouse gases, although future policies may place a price on that cost. Advocates of the program also note that the U.S. nuclear power industry has a better safety record than do other major commercial methods of generating electricity.

RELATED OPTIONS: 270-3 and 270-8

RELATED CBO PUBLICATIONS: Nuclear Power's Role in Generating Electricity, May 2008; Federal Support for Research and Development, June 2007; and Evaluating the Role of Prices and R&D in Reducing Carbon Dioxide Emissions, September 2006

						То	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-192	-193	-194	-196	-197	-972	-2,005
Outlays	-58	-115	-138	-156	-173	-640	-1,643

**Eliminate Funding for the FreedomCAR and Fuel Partnership** 

### 270-5—Discretionary

This option would end federal funding of the FreedomCAR and Fuel Partnership, saving \$58 million in outlays in 2010 and \$640 million over five years. (The funding considered in this option also is included in Option 270-6; the savings from implementing both cannot be added.)

Advocates of this option argue that private-sector research in this field has been under way for years, that there are already sufficient economic incentives to undertake such research, and that public-sector financial support does not increase private-sector effort. Several automakers have begun production or have announced plans to produce hydrogen-powered vehicles. Supporters of this option also point out the poor results from the Partnership for a New Generation of Vehicles, which fell behind foreign competitors in creating a production-ready hybrid vehicle. Japanese car manufacturers first supplied and continue to lead in the U.S. market for hybrid vehicles. A related argument for the option is that the federal government should not fund research to enable a fleet of fuel-cell automobiles because there are other ways to reduce dependence on imported oil and to cut air pollution. Instead of supporting applied research, the argument says, the federal government could more effectively increase the efficiency of the nation's automotive fleet by raising gasoline taxes or by expanding and increasing fees on vehicles that get low gas mileage. Such action also might encourage research by giving automakers more incentive to identify and pursue technologies that improve fuel efficiency (and that potentially displace petroleum consumption altogether). Increasingly viable alternatives to fuel-cell technology include alternative fuels and electric engines. Finally, although hydrogenpowered vehicles emit no pollutants, generating hydrogen fuel by current and foreseeable production methods, such as extracting hydrogen from natural gas, poses significant environmental burdens.

Opponents of the option point to the favorable assessments offered by the Government Accountability Office and the National Research Council of federally supported research. Opponents also argue that without government sponsorship, the private sector would underfund hydrogen fuel research. The private sector generally does not consider societal benefit in calculating the benefits of research on energy-efficient technologies. And relative to other investment projects that compete for private-sector funds, widespread commercialization of hydrogen fuel is a still distant and risky prospect. Thus, federal funding would be needed to extend the effort in hydrogen fuel research to match its value to society.

RELATED OPTIONS: 270-3, 270-6, and Revenue Option 52 RELATED CBO PUBLICATION: *Federal Support for Research and Development*, June 2007 270

						То	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-1,215	-1,223	-1,231	-1,238	-1,250	-6,157	-12,700
Outlays	-365	-725	-876	-991	-1,095	-4,052	-10,396

Eliminate the Department of Energy's Applied Research on Energy-Efficiency and

### 270-6—Discretionary

**Renewable-Energy Technologies** 

Outlays-365-725-876The Department of Energy (DOE) received \$1.2 billion in<br/>regular appropriations in 2009 for programs that support<br/>the development of technology to increase energy conserva-<br/>tion and efficiency in the transportation, building, and<br/>industrial sectors of the economy and to make greater use of<br/>such renewable resources as solar, wind, and geothermal<br/>energy and biomass-based fuel. Much of the research focuses<br/>on ways to reduce the cost of new technology and on remov-<br/>ing the barriers to its acceptance in the marketplace. Another<br/>\$2.5 billion was provided in the American Recovery and<br/>Reinvestment Act of 2009 (Public Law 111-5) for applied-876

This option would eliminate new funding for DOE's applied research in energy conservation and renewableenergy technology, saving \$365 million in outlays in 2010 and about \$4.1 billion over five years. (Some of the funds discussed in this option are also included in Option 270-5; the savings from implementing both would be less than the sum of the individual options.)

research, development, demonstration, and deployment.

The principal argument in favor of this option is that applied research is better left to the businesses that commercialize and reap the benefits of the research. That argument acknowledges that the federal government has an appropriate role in supporting basic scientific research, which is more likely to benefit society as a whole. The private sector is considered to have little incentive to pursue basic research because no single company can capture all the benefits such basic research may generate. Federally sponsored research typically occurs in the absence of market incentives and without the information that guides the private sector to recognize an opportunity to develop and market commercially viable technology.

A second rationale for this option is that many research projects funded through DOE's applied energy-efficiency and renewable-energy programs are small enough and discrete enough—and have a sufficiently clear market—to warrant private investment. Because the United States enjoys the best-developed venture capital market in the world, suitable investment opportunities are likely to be exploited. In such cases, DOE's efforts may deter the private sector from pursuing similar initiatives. In other cases, the results of the research and development in those programs could prove too expensive or esoteric for the intended recipients to implement.

Government funding also can duplicate other federal incentives for applied research. Federal law sets minimum energyefficiency standards for appliances, and the tax code favors investments in conservation technology. There are incentives in the federal tax code for the development of liquid fuels from renewable resources, especially biomass. (Ethanol, for example, receives special treatment under the federal highway tax.) Federal regulations authorized by many different statutes favor alcohol fuels, which now usually are derived from corn.

The commercial markets for renewable energy—most notably wind power and photovoltaics—are growing rapidly. According to industry estimates, between 2006 and 2008 there was a doubling of the total U.S. capacity for windpowered production of electricity. Wind energy farms accounted for 42 percent of the new electricity-generating capacity installed in 2008, according to the same industry estimates. Similarly, the Energy Information Administration reports that domestic shipments of photovoltaic cells and modules increased close to 20-fold between 1998 and 2007. In such cases, federal support may no longer be needed.

An argument against this option is expressed in conclusions reached by a panel of the National Research Council, which in 2001 determined that "DOE's [research, development, and demonstration] programs in fossil energy and energy efficiency have yielded significant

### CHAPTER TWO

benefits (economic, environmental, and national security-related), important technological options for potential application in a different (but possible) economic, political, and/or environmental setting, and important additions to the stock of engineering and scientific knowledge in a number of fields." The panel concluded that research in programs for energy conservation had particularly benefited the construction industry—a widely dispersed industry with no substantial record of technological innovation.

In a 2007 follow-up report, the panel identified the likely future benefits from a small sample of current DOE conservation research and development projects. The panel concluded that, for two of the three projects analyzed, future economic benefits from current work would exceed the costs of that research several times over, even after technical and other risks were factored in. Another argument against eliminating those programs in applied research is that federal research and development could help offset failures in energy markets. For example, current energy prices may not reflect damage to the environment—including the potential for global warming caused by excessive reliance on fossil fuels. Energy conservation could decrease that damage (and thus reduce the cumulative costs to society of producing and using energy) and curb the nation's dependence on foreign oil.

Finally, some analysts have argued that many DOEsponsored renewable-energy programs have met their technical goals to lower costs and improve performance of specific technologies. However, for much of the 1980s and 1990s—most of the years during which DOE programs have been in existence—the price of conventionally produced energy was low, so there was little incentive to expand production of renewable sources of energy. Recent price hikes for fossil fuels could spur demand for energy from renewable sources.

RELATED OPTIONS: 270-1, 270-5, 270-7, and Revenue Option 53 RELATED CBO PUBLICATION: *Federal Support for Research and Development*, June 2007

«CBO»

270-7—Discretionary

# Eliminate the Department of Energy's Grants to States for Energy Conservation and Weatherization

							То	tal
	(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
	Change in Spending							
)	Budget authority	-505	-508	-512	-515	-519	-2,559	-5,278
<i>,</i>	Outlays	-152	-301	-364	-412	-455	-1,684	-4,320

The Office of State and Community Programs in the Department of Energy (DOE) provides grants that support state and municipal efforts in energy conservation and building weatherization. Some grants provide low-income households with insulation, storm windows, and weather stripping. Institutional grants help lessen energy use in educational and health care facilities and fund private-sector and municipal efforts to encourage local investment in building improvements. Other projects support state and municipal programs that establish standards for energy efficiency in new and remodeled buildings and promote the use of public transportation and carpooling, for example. In 2009, DOE received regular appropriations of about \$500 million to provide grants to states and municipalities for energy conservation and building weatherization efforts. The American Recovery and Reinvestment Act of 2009 (Public Law 111-5) provided an additional \$8.1 billion.

This option would eliminate new funding for DOE's grant programs that support state and local efforts in energy conservation and building weatherization. Ending those grant programs would save \$152 million in outlays in 2010 and \$1.7 billion over the next five years.

One rationale for eliminating the grants is that other federal programs (such as the Low Income Home Energy Assistance Program) are doing similar work. Moreover, direct federal funding may encourage state and local governments to forgo local funding for energy conservation and building weatherization and redirect their tax revenues to altogether different uses.

A rationale against the option is that ending DOE's grant programs could make it harder for states to continue to promote energy conservation and building weatherization. Many states rely heavily on federal grants to assist lowincome households and public institutions. In addition, the reductions in energy use that result from the programs could help reduce emissions of greenhouse gases and other air pollutants. The grants could be used to help low-income households and public institutions adjust to higher energy prices under pollution control policies, such as a policy to reduce emissions of greenhouse gases.

RELATED OPTIONS: 270-6 and 300-10

### Index the Nuclear Waste Fund Fee to Inflation Total 2010-2014 2010-2019 (Millions of dollars) 2010 2011 2012 2013 2014 Change in Outlays -13 -21 -28 -35 -46 -143 -618

### 270-8—Discretionary

The Nuclear Waste Policy Act of 1982 authorized the Department of Energy (DOE) to build a secure facility, far from population centers or commercially valuable property, for permanent disposal of high-level radioactive waste (mostly spent uranium) generated by civilian nuclear power plants and defense activities. The same act established the Nuclear Waste Fund, which would support the building of a permanent disposal facility through a fee levied on civilian nuclear power plants of 0.1 cent per kilowatt-hour of electricity generated. In 1987, the Congress identified the Yucca Mountain region of Nevada as the nation's only candidate site for such a facility.

With delays and cost escalations (initial cost estimates were too low, and plans developed to store more waste than was initially expected), if work proceeds on that repository, it is not expected to open before 2020, more than 10 years after the most recent date set for opening, and more than 20 years after its original target date for completion. The facility also is currently estimated to have a total cost of \$96 billion, twice the original estimate. As of January 2009, the Nuclear Waste Fund had spent \$7.1 billion on site preparations and design for the Yucca Mountain facility. About \$22.4 billion remained in the fund. The President's proposed budget for 2010 would eliminate most funding for the Yucca Mountain facility.

This option would index to inflation the amount the Nuclear Waste Fund assesses nuclear generators, boosting offsetting receipts (which are credited against direct spending) by \$13 million in 2010 and by \$143 million over the next five years.

Proponents of this option note that the Nuclear Waste Fund's rates have not changed since 1983, even as estimates of the Yucca Mountain project's costs have continued to rise. The proposal to terminate funding for Yucca Mountain does not blunt that argument because any alternative solution to the problem of disposing of nuclear waste probably would cost at least as much as the Yucca Mountain project. Proponents of this option emphasize that the threat of terrorism creates a need to implement quickly a secure, long-term storage solution, and that ensuring the adequacy of the fees paid by nuclear generators would help achieve that. Increasing the fees to help expedite completion of a disposal facility also could reduce the cost to the federal government of reimbursing utilities for their costs of interim storage of nuclear waste. (Lawsuits filed by some utilities after the original 1998 completion deadline passed have already resulted in such reimbursements.) Finally, by 2020, the demand for nuclear waste storage is likely to exceed Yucca Mountain's legal limit of 70,000 metric tons. Although the physical capacity of the facility is likely to be significantly greater than that legal limit, there is a foreseeable need for additional storage, even if the Yucca Mountain project is completed. Funding needed for the construction of a second facility would exceed the amount of receipts collected under the current policy.

An argument against this option is that the current fee would probably be sufficient to cover the expected costs of the Yucca Mountain facility. DOE reached that conclusion in its most recent assessment of the adequacy of the Nuclear Waste Fund. Another argument is that electricity producers should not have to pay higher fees to cover the additional costs that result from delays, particularly those caused by the government. Some opponents contend that waste producers should stop paying the fee altogether because of uncertainties about the facility's completion.

Critics also point out that the Yucca Mountain project faces technical challenges in design and in ensuring the site's geologic integrity, for example, with respect to water seepage or earthquakes. The project also faces opposition because of encroaching development from Las Vegas. Opponents argue that it could be safer to store spent nuclear material in other places than it would be to ship the material to Nevada through densely populated areas, on public highways, and over bridges and through tunnels. They assert that it would be less expensive and more cost-effective to use money in the Nuclear Waste Fund to improve storage facilities at power plants than to proceed with the Yucca Mountain project. 270

### 270-9—Mandatory

### **Restructure the Power Marketing Administrations to Charge Market-Based Rates**

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	0	-200	-200	-200	-210	-810	-1,920

The Department of Energy's three smallest power marketing administrations (PMAs)-the Western Area Power Administration, the Southwestern Power Administration, and the Southeastern Power Administration-provide about 1 percent of the nation's electricity. The PMAs generate electricity mainly from hydropower facilities constructed and operated by the Army Corps of Engineers and the Bureau of Reclamation. Current law requires that the electricity be sold at cost-a pricing structure intended ultimately to reimburse taxpayers for the costs of operating those facilities, a share of the costs of construction, and interest on the portion of total costs that has not been repaid. The financing terms for repaying the construction costs are generally favorable. For example, the interest rates used for older projects were set by statute, typically below the government's cost of borrowing at that time. Those favorable financing terms and the low cost of generating electricity from hydropower mean that the PMAs can charge their customers much lower rates than other utilities do. Current law also requires the PMAs to offer their power first to rural electric cooperatives, municipal utilities, and other publicly owned utilities.

This option would require the three PMAs to sell electricity at market rates to any wholesale buyer. The higher rates would provide the federal government with about \$810 million in additional offsetting receipts (which are credited against direct spending) over the 2010–2014 period.

There are several arguments for discontinuing the subsidy for federal electricity sales. First, subsidies are not needed to counter the market power of private utilities because those utilities are kept in check by federal and state regulation of the electricity supply, by federal antitrust laws, and increasingly by competition from independent producers. Second, in many cases, the communities that receive federal power are similar to neighboring communities that do not. Third, federal sales of electricity meet only a small share of the total power needs of households in the regions served by the three PMAs; thus, raising federal rates would have only a modest effect on those regions' economies. Fourth, the PMAs face the prospect of significant future costs to perform longdeferred maintenance and upgrades-costs that could be budgeted for by increasing power rates now. Fifth, when water levels are too low to generate sufficient hydropower, PMAs must purchase electricity from other wholesalers to fulfill the terms of their contracts with customers, even though purchased power is generally more expensive than hydropower. Finally, selling electricity at below-market rates can encourage the inefficient use of energy.

A potential drawback of this option is that changing the pricing structure of the three PMAs could greatly increase electricity rates for some of the small and rural communities they serve. Although the PMAs account for only a small share of power in the regions they serve, some communities within those regions rely on PMA-provided electricity. Other arguments against this change are that the federal government should continue to provide low-cost power to counter the uncompetitive practices of investor-owned utilities and to bolster the economies of certain parts of the country.

RELATED OPTIONS: 270-10, 270-11, and Revenue Option 34 RELATED CBO PUBLICATION: *Should the Federal Government Sell Electricity?* November 1997

### 270-10—Mandatory

### Sell the Southeastern Power Administration and Related Power-Generating Assets

						Тс	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays <sup>a</sup>	0	0	-1,500	190	190	-1,120	-110
a. Excludes savings of about \$60 million per year after 2012 from ending appropriations to operate and maintain Southeastern Power							

Administration projects.

The Southeastern Power Administration (SEPA), which is administered by the Department of Energy, sells electricity from hydropower facilities constructed and operated by the Army Corps of Engineers. SEPA pays private transmission companies to deliver that power to nearly 500 wholesale customers, such as rural cooperatives, municipal utilities, other publicly owned utilities, and investor-owned utilities. SEPA charges rates that are designed to recover for taxpayers all of the costs of current operations, some of the costs of construction, and a nominal interest charge on the portion of total costs that has not yet been recovered.

This option would sell SEPA and the power-generating assets that SEPA uses, such as turbines and generators owned by the Army Corps of Engineers, but not the related dams, reservoirs, or waterfront properties. The sale would include rights of access to the water flows necessary for power generation, subject to the constraints of competing uses for the water. The sale would net the federal government \$1.1 billion in offsetting receipts (which are credited against direct spending) over the 2010-2014 period: about \$1.5 billion in proceeds from the sale (an amount that is derived from recent audited statements of assets and liabilities) minus about \$380 million in lost electricity revenues over that period. Losses in electricity revenues would continue over the 2015–2019 period, reducing the receipts that might have been realized between 2010 and 2019 to \$110 million. Proceeds could be higher or lower, depending on the terms of the sale. (In addition, the federal government would save about \$60 million a year in discretionary outlays from ending appropriations to SEPA and reducing appropriations to the Corps of Engineers for operations. Those discretionary savings are not included in the table above.)

Supporters of this option argue that selling federal powergenerating assets is consistent with the policy goal of making energy markets more efficient. They say that the original reasons for establishing SEPA-marketing lowcost power to promote competition and foster economic development-are no longer compelling because of the small amount of power sold and because of competitive and regulatory constraints on commercial power rates. Moreover, selling federal hydropower facilities would not mean transferring all responsibility for managing and protecting water resources to the private sector. The Corps of Engineers could remain directly responsible for managing water flows, including the upkeep of basic physical structures and surrounding properties, for all uses. Or, as has happened with other nonfederal dams, the terms of the federal licenses to operate the facilities (issued by the Federal Energy Regulatory Commission) could determine the management of water flows for competing purposes.

An argument against ending federal ownership of SEPA is that nonfederal entities may lack the proper incentives to perform all of the SEPA's functions. Many Corps of Engineers facilities serve multiple purposes—managing water resources for navigation, flood control, or recreation, for example—in addition to power generation. Selling SEPA could result in higher power rates for its customers, depending on the terms of the sale. Although electricity sold by SEPA meets less than one percent of total power needs in the 11 states in which the agency operates, a few rural communities depend heavily on that electricity.

RELATED OPTIONS: 270-9, 270-11, and Revenue Option 34 RELATED CBO PUBLICATION: *Should the Federal Government Sell Electricity?* November 1997

270-11—Mandatory

	Sell a Portion of the Tennessee Valley Authority's Electric Power Assets	
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						Тс	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	5	10	10	-16,000	-200	-16,175	-15,975

In 1933, the Tennessee Valley Authority (TVA) was established to control flooding, improve navigation, and develop the hydroelectric resources of the Tennessee River for the benefit of a seven-state region in the southeastern United States. Since then, TVA has developed an extensive network of transmission facilities and nuclear- and fossilfuel-powered generating plants and has become one of the nation's largest producers of electricity. TVA is a federal agency, but it operates with many of the advantages of public and private entities. For example, under current law, TVA controls its spending and rate setting without regulatory oversight. It also has ready access to capital because investors assume that its obligations would be paid off by the government in the event of default, even though current law states that its debt is not backed by the government. And although the agency has a statutory cap of \$30 billion on its bond debt, that cap no longer limits its liabilities because it has found ways to raise capital through various third-partyfinancing arrangements.

This option would return TVA to its original, more limited function of managing the region's hydropower resources. Other TVA power assets for which a commercial market exists—such as the agency's fossil fuel and nuclear power plants and its transmission lines—would be sold. (The hydropower assets would be retained because they serve several other purposes, such as flood control and recreation.) If, as is likely, proceeds were less than the amount of TVA's outstanding debt, taxpayers would probably bear some of the cost of servicing that debt (whatever portion was not defrayed by future receipts from hydropower activities).

This option assumes that the sale of TVA's power generation and transmission assets would be completed by the end of 2013, bringing in an estimated \$16 billion. Proceeds could be higher or lower depending on the terms of the sale. That estimate is based on recent market transactions for electricity-generating facilities, adjusted for the likelihood that potential buyers would continue to serve customers under substantially the same terms as TVA for several years. The \$16 billion estimated market value of TVA's assets is less than the agency's outstanding financial obligations—which currently total about \$26 billion—in part because TVA invested about \$6 billion in nuclear power plants that were never completed and because of uncertainty regarding the value of its coal-fired generation plants. Thus, some portion of TVA's debt would probably be retained by the government.

One rationale for this option is that the generation and transmission of electricity are fundamentally private-sector activities. This option also would reduce the risk to taxpayers posed by TVA's plans to spend several billion dollars to build new nuclear power plants. Selling the agency's commercial power assets also would eliminate the implicit subsidy that TVA receives because its status as a federal agency earns it high bond ratings. Finally, private-sector operation of TVA's electric power assets in a competitive environment could result in some increased efficiencies relative to those under federal operation.

An argument against the option is that the agency has been important, and could continue to be important, in the economic development of its seven-state region. The net benefit to taxpayers from the sale is not guaranteed—that would depend on the price actually paid for the facilities, on the costs that TVA would otherwise incur if it continued to invest in power and transmission facilities, and on trends in electricity prices and markets. In addition, TVA's ratepayers could face higher electricity prices in the absence of federal subsidies.

Reduce the Size of the Strategic Petroleum Reserve									
						Тс	otal		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Outlays	-755	-880	-955	-1,010	-1,040	-4,640	-4,640		

#### 270-12—Mandatory

The Strategic Petroleum Reserve (SPR) is a stock of crude oil that the government owns and stores at four underground sites along the Gulf of Mexico. The SPR, which can hold about 727 million barrels of oil, was established to help insulate the United States against a severe disruption in oil supplies. The Department of Energy (DOE) plans to fill the SPR to capacity by January 2010 and then expand that capacity to 1 billion barrels. DOE can draw oil from the reserve at a maximum sustained rate of 4.4 million barrels per day (or 37 percent of average daily U.S. oil imports and 21 percent of average daily U.S. petroleum consumption) for about 90 days; after that, the maximum draw rate is less.

This option would halt DOE's plans to expand the reserve, reduce its holdings by about 10 percent, and maintain a reserve of 650 million barrels. By selling the excess—about 75 million barrels—this option would generate \$755 million in 2010 and \$4.6 billion over five years. The estimated savings are illustrative and assume that, beginning in 2010, the amount of oil in the reserve would be reduced by just over 15 million barrels for each of five years. This estimate does not include savings from forgoing expansion.

Most arguments in favor of this option concern changes over time in the benefits and costs associated with the reserve. Large structural shifts in energy markets and in the U.S. economy since 1975 have moderated the likely costs of a disruption in oil supplies and, thus, the benefits that might accrue from releasing oil in a crisis. The increasing diversity of world oil supplies and the growing integration of the economies of oil-producing and oil-consuming nations have lessened the risk of a sustained, widespread disruption. Moreover, the cost of maintaining the facility has escalated as it has aged. Finally, analysis of past sales and withdrawals from the SPR suggests that a 10 percent cut probably would not compromise its ability to address the types of problems that have triggered past releases. DOE's experience selling oil during the Gulf War and more recently indicates that the process of deciding to release oil and of setting prices can add to the market's uncertainty. Moreover, the government's ability to smooth oil prices through SPR purchases and releases could be limited. Only twice has DOE sold oil from the SPR in emergencies, and each sale involved a fraction of the reserve's holdings. Citing the risk of economically threatening disruptions in supply, DOE sold about 17 million barrels during the 1991 Gulf War. After Hurricane Katrina in 2005, it sold 11 million barrels. Oil has been released for nonemergencies: Test sales in 1985 and 1990 sold 5 million barrels, and, to reduce the federal deficit in 1996 and 1997, lawmakers directed DOE to sell 28 million barrels. After the 2008 hurricanes, about 65 million barrels was released to the private sector and later replaced. Some releases resulted from temporary disruptions in transport caused, for example, by a hurricane, a closed ship channel, or a blocked pipeline; others involved trading a particular grade of crude oil for a higher grade or for heating oil to fill a 2-million-barrel reserve in the northeastern states.

Several arguments are made against reducing the quantity of oil in the SPR and for expanding its capacity. If the capacity stayed the same, growth in U.S. demand for oil, once it resumed, would make it harder to reach and maintain the equivalent of 90 days' worth of net oil imports in reserves of oil or petroleum products, including private stocks. (The United States and other nations have committed to the International Energy Agency to hold reserves in at least that amount.) Opponents of this option state that oil supplies from the Persian Gulf and other regions are unstable. U.S. reliance on imports-particularly from the Middle East-is expected to keep growing, and the probability of terrorist attacks on the oil system may be significant. Thus, the benefit of the SPR in guarding against supply disruptions could be growing. In 2005, the Office of Management and Budget rated the SPR effective, saying the program was well designed, had a clear mission, and made a unique contribution to safeguarding oil supplies.

RELATED CBO PUBLICATIONS: *The Economic Effects of Recent Increases in Energy Prices*, July 2006; and *Rethinking Emergency Energy Policy*, December 1994

# 300

## **Natural Resources and Environment**

udget function 300 encompasses programs administered by the Department of the Interior, the Department of Agriculture, and the Army Corps of Engineers for land and water management, resource conservation, recreation, wildlife management, and mineral development. This function also covers funding for the National Oceanic and Atmospheric Administration, which administers ocean and fisheries programs, and for the Environmental Protection Agency (EPA), which administers the Superfund, makes grants to states, and issues and enforces environmental regulations.

On average, appropriations for discretionary programs not including appropriations provided in the American Recovery and Reinvestment Act of 2009 (ARRA, Public Law 111-5)—rose by 4.4 percent per year between 2004 and 2009. With the enactment of ARRA, appropriations for this budget function increased by 50.2 percent

(\$18.5 billion) from 2008 to 2009. Most of that additional funding went to EPA (\$7.2 billion) and the Army Corps of Engineers (\$4.5 billion); the remainder was distributed among several programs. Discretionary funding for 2009 totals \$54.6 billion.

Mandatory spending in this function is mostly for farm conservation programs authorized by the Food, Conservation, and Energy Act of 2008 (P.L. 110-234), which provides \$4.1 billion in 2009 for cost-sharing assistance; annual rental payments; and long-term easements to help agricultural producers protect soil, water, and wildlife habitat. The mandatory spending in this function is offset largely by receipts from the sale of minerals, timber, and land. Other offsets come from recreation fees and other charges to users, which the Congressional Budget Office estimates amount to \$6 billion.

Federal Spending, Fiscal Years 2004 to 2009 (Billions of nominal dollars)									
						Estimate	Average Annual Rate of Growth (Percent)		
	2004	2005	2006	2007	2008	2009	2004–2008	2008-2009	
Discretionary Budget Authority	31.1	31.9	38.0	32.9	37.1	55.6 <sup>a</sup>	4.4	50.2	
Outlays									
Discretionary	30.6	30.3	34.0	30.9	32.8	36.5	1.7	11.4	
Mandatory	*	-2.3	-0.9	0.9	-0.9	0.6	n.a.	n.a.	
Total	30.6	28.0	33.0	31.7	31.9	37.1	1.0	16.3	

Note: \* = between zero and \$0.5 million; n.a. = not applicable (because of a zero or a negative value in the first year).

Includes \$16.8 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

#### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 300, SEE THE FOLLOWING REVENUE OPTIONS:

Revenue Option 53	Make Permanent the Partial Excise Tax Exemption for Biofuels
Revenue Option 55	Impose a Tax on Emissions of Sulfur Dioxide
Revenue Option 56	Impose a Tax on Emissions of Nitrogen Oxides
Revenue Option 57	Impose an "Upstream" Price on Emissions of Greenhouse Gases
Revenue Option 58	Reinstate the Superfund Taxes
Revenue Option 59	Make Permanent the Tax Credits for Generating Electricity from Renewable Resources

Increase Fees for Permits Issued by the Army Corps of Engineers								
Total								
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays	-23	-42	-45	-46	-47	-203	-461	

#### **300-1—Discretionary or Mandatory**

## Note: Fees collected under this option could be recorded in the budget as offsetting collections (discretionary) or as offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

The Army Corps of Engineers administers laws that pertain to the regulation of the nation's navigable waters. Section 10 of the Rivers and Harbors Appropriation Act of 1899 requires the Corps to issue permits for work that would affect the navigable capacity of any waters of the United States. Section 404 of the Clean Water Act of 1977 also requires the Corps to issue permits for dredging or placing fill material in navigable waters. In 2008, the Corps received about 55,000 permit applications. The Corps must evaluate each application and, on the basis of expert opinion and statutory guidelines, grant or deny a permit. Most applications are quickly approved through existing general or regional permits, which grant authority for many low-impact activities. Evaluation of applications not covered by existing permits may require the Corps to undertake reviews that are more detailed and therefore more costly. Currently, companies that apply for commercial permits pay \$100, and individuals who apply for private permits pay \$10. (Government applicants are not charged a fee.) Those fees, which have not changed since 1977, cover only about 1 percent of the costs of administering the program.

This option would raise the fee for commercial permits issued under sections 10 and 404 by an amount sufficient to recover the costs of awarding the permits. The fee for private permits would not change. The increase would reduce federal outlays by \$23 million in 2010 and by \$204 million over the 2010–2014 period. (The estimates assume a small decrease in the number of commercial applications because of the increase in the fee.)

Section 10 involves permits for structures such as wharves, breakwaters, and jetties in navigable waters of the United States, including ports, canals, rivers, and lakes. Section 404 governs dredging and filling in navigable waters and has been applied to waters that might not be considered navigable in the conventional sense; it potentially gives the Corps regulatory jurisdiction over a large number of wetlands. (Consistent with a 2006 Supreme Court decision, the extent of that jurisdiction ultimately will be determined by federal legislation or by federal agencies' interpretations of such terms and definitions as "relatively permanent" and "intermittent" flow and what constitutes a "significant nexus" to navigable waters, and whether those interpretations withstand the scrutiny of the courts.) Moreover, for the purposes of section 404, "dredging" and "placing fill material" encompass virtually any activity in which dirt is moved, which means that a wide variety of actions require permits.

The principal rationale for imposing cost-of-service fees on commercial applicants is that the party pursuing a permit, not the taxpaying public, should bear the cost of such permits. According to that argument, taxpayers should not be required to pay for something that advances a commercial interest, the benefits of which accrue to a comparative few.

An argument against higher fees is that permit seekers should not have to pay more for a process that ultimately might deny them the right to use their land as they wish. The goal of the section 404 program, for example, is to advance a public interest by protecting wetlands. Arguably, since the public benefits from wetlands protection (sometimes at the expense of property owners), it should bear the costs. Critics maintain that the regulatory process that property owners must deal with is already onerous, so raising permit fees would further infringe on property owners' rights.

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-90	-91	-91	-92	-93	-457	-946
Outlays	-27	-50	-61	-70	-77	-285	-702

#### 300-2—Discretionary

## **Eliminate Federal Funding for Beach Replenishment Projects**

300

The Army Corps of Engineers conducts various operations designed to counter beach erosion, typically by dredging offshore sand and pumping it onshore to rebuild eroded areas. The Corps funds a portion of such activities, and state and local governments pay the rest. The operations have two primary goals: mitigating damage (replenishment helps beaches act as barriers to waves and protects coastal property from severe weather) and enhancing recreation.

This option would end federal funding for beach replenishment. Doing so would reduce discretionary outlays by \$27 million in 2010 and by \$285 million through 2014.

Proponents of this option argue that the cost of beach replenishment should be borne by those who benefit from it: states, localities, and private landowners. Furthermore, the effectiveness of replenishment efforts is questionable. Beach erosion is a natural process, and replenishment serves only to delay the inevitable shifting of the shoreline. One alternative is to remove the retention structures that sometimes exacerbate erosion because they inhibit the natural flow of sand along a beach.

Opponents of this option argue that beach replenishment benefits specific states and localities, but it also serves the interests of nonresident beachgoers because it preserves recreational opportunities. Opponents also argue that some federal projects (such as those intended to keep coastal inlets open) contribute to beach erosion, so federal taxpayers should bear some of the cost of replenishment in those areas. Moreover, ending federal funding could be considered unfair if municipalities and private landowners have invested in beachfront property with the expectation of continued federal support.

					8		
						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-16	-20	-26	-31	-35	-128	-279
Outlays	-7	-29	-35	-35	-37	-143	-290

#### 300-3—Mandatory

The Federal Land Transaction Facilitation Act of 2000 (FLTFA) authorizes the Bureau of Land Management (BLM) to use proceeds from the sale of public lands to acquire other qualifying parcels of land and to cover expenses associated with those transactions. That act expires after 2010. According to the previous Administration, FLTFA was enacted to encourage the sale of lands that contribute little to BLM's mission and to support the purchase of parcels of land—including inholdings and parcels that are adjacent to federal lands and that feature "exceptional resources"—that are more in keeping with that mission. Before the enactment of FLTFA, the Federal Land Policy and Management Act directed that proceeds from BLM's land sales go directly to the Treasury.

This option would amend FLTFA to expand the set of lands that the Department of the Interior would be authorized to sell, alter the distribution of proceeds from such sales, and extend the act beyond 2010. Instead of requiring that all proceeds from land sales be used to acquire other parcels of land and to cover sales expenses, the option would direct that 70 percent of the proceeds, net of expenses, go to the Treasury. It would limit the Department of the Interior's share of the receipts to \$60 million per year (plus an additional amount to cover BLM's administrative costs) for land acquisition and restoration projects on BLM lands. The option also would allow lands to be sold according to updated resource management plans rather than limiting such sales only to parcels classified before July 25, 2000, when FLTFA was enacted. The option would reduce direct spending by \$7 million in 2010 and by \$143 million over five years.

Supporters of this option contend that expanding the set of lands that the Department of the Interior would be authorized to sell would give BLM greater flexibility, enhancing its ability to consolidate its landholdings into larger areas that are less scattered and that can be managed more efficiently. They also say that it would reduce the amount of federal spending that is not subject to regular oversight through the Congressional appropriation process. They argue that the change would reduce the federal budget deficit and ensure that U.S. taxpayers benefited directly from land sales.

Opponents of this option say that it is inconsistent with the policy of retaining lands in public ownership, as set forth in 1976 by the Federal Land Policy and Management Act. They say that FLTFA was intended to provide the Department of the Interior with a source of revenue to supplement the Land and Water Conservation Fund for acquiring high-priority private lands for inclusion in national parks, national forests, and BLM conservation areas. Opponents also maintain that the option would implicitly or explicitly place land managers under pressure to sell tracts of land to meet revenue expectations.

#### 300

Reduce Funding for Timber Sales That Lose Money									
						То	tal		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Spending									
Budget authority	-54	-54	-55	-56	-57	-276	-587		
Outlays	-51	-54	-55	-56	-57	-273	-580		

#### **300-4—Discretionary and Mandatory**

According to annual reports by the Forest Service's Forest Management Program, which manages federal timber sales from national forests, the Forest Service has spent more on the timber program in recent years than it has collected from the companies that harvest the timber. In 2008, for example, when it sold roughly 2.5 billion board feet of public timber, funding reported for the program outstripped collections by about \$45 million.

This option would eliminate discretionary funding for all future timber sales in the Southwestern, Pacific Southwest, and Alaska regions of the National Forest System, where expenditures in recent years were significantly higher than offsetting receipts. Ending those sales would reduce the Forest Service's net outlays by \$51 million in 2010 and by \$273 million over the period from 2010 to 2014. (Those estimates are net of associated changes in offsetting receipts and direct spending from eliminating sales in those regions.) Because the Forest Service does not maintain the data from which the annual income and expenditures associated with individual timber sales can

RELATED OPTIONS: 300-5, 300-6, and 300-7

be estimated, it is difficult to determine the budgetary savings that might arise from phasing out all timber sales in the National Forest System for which expenditures are likely to exceed offsetting receipts.

A rationale for ending the timber sales is that doing so would end the federal taxpayers' subsidizing of the profitmaking activities of private-sector timber companies. More generally, that argument also applies to federal spending that facilitates private profit in all Forest Service regions. Another argument in favor of the option is that ending the sales could halt excessive depletion of federal timber and preserve the recreational value of what are now roadless forests.

An argument against this option is that the sales might help bring stability to communities that depend on federal timber for jobs in logging and related fields. Also, the road construction that attends timber sales might foster access to forested land, enhancing the ability to fight forest fires and expanding recreational uses.

#### **300-5—Discretionary or Mandatory**

### Authorize Maintenance and Location Fees for Hardrock Mining on Federal Lands

						Тс	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-45	-42	-39	-35	-32	-193	-329

Note: Maintenance and location fees could be classified as discretionary offsetting collections or as mandatory offsetting receipts, depending on the specific language of the legislation authorizing them.

The General Mining Law of 1872 was intended to encourage settlement of the American West by permitting access to hardrock minerals—such as copper, gold, silver, and uranium—on public lands. Unlike extractors of other minerals or fossil fuels from public lands, hardrock miners do not pay royalties to the government on the value of minerals that they remove. Instead, under the mining law, holders of more than 10 mining claims on public lands pay an annual maintenance fee of \$125 per claim. Holders also pay a one-time \$30 location fee when recording a claim. The fees are adjusted every five years on the basis of changes in the consumer price index. The Omnibus Appropriations Act of 2009 repealed the authority to collect the fees unless provided for by a subsequent appropriations act.

This option would grant the Department of the Interior permanent authority to collect maintenance and location fees. It also would continue the moratorium on patenting—the method by which miners gain full title to public lands by paying the government a one-time fee of \$2.50 or \$5 per acre, depending on the source of the mined material. The patent moratorium does not stop mineral production on public lands but prevents further transfer of ownership of public lands to the private sector. That authority would increase federal collections by \$45 million in 2010 and by \$193 million over the period from 2010 to 2014.

Supporters of this option—including many environmental advocates—argue that even with maintenance and location fees, mineral production on federal lands is less costly than on private lands, where royalty payments are customary. That difference, they contend, encourages overdevelopment of public lands, which can result in extensive environmental damage. Ending the practice could promote use of those lands for recreation or for wilderness conservation. An argument against granting permanent authority to collect the fees is that, without free access to public resources, miners (especially smallscale miners) would engage in less exploration for hardrock minerals in the United States.

RELATED OPTIONS: 300-4, 300-6, 300-7, and Revenue Option 33 RELATED CBO PUBLICATION: *Reforming the Federal Royalty Program for Oil and Gas*, November 2000

«CBO»

#### 300

Use State Formulas to Set Grazing Fees for Federal Lands								
						Тс	otal	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays	-11	-20	-24	-26	-24	-105	-155	

**300-6—Discretionary or Mandatory** 

Note: Fees collected under this option could be recorded in the budget as offsetting collections (discretionary) or as offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

The federal government owns about 450 million acres of public lands that are managed by the Forest Service and the Bureau of Land Management, some 255 million acres of which are used by Western ranchers for the grazing of privately owned livestock. Ranchers are authorized to use that acreage for more than 20 million animal unit months (AUMs)—a standard measure that reflects the amount of forage needed by one cow and one calf for one month. Ranchers actually use about 15 million AUMs because of resource protection needs, economic, and other factors. As of March 1, 2009, cattle owners paid \$1.35 per AUM.

This option would set grazing fees for federal lands to match fees set by the states for their lands. If the federal government implemented this option over 10 years as existing grazing permits expired, the fee would rise almost 10-fold, on average. The new fee structure would boost net federal collections by \$11 million in 2010 and by a total of \$105 million through 2014. (The estimates shown here are net of additional payments to states and counties and other direct spending as provided under current law. The estimates do not reflect any additional appropriations for range improvements that could result from the added collections. However, they do incorporate an assumption about the extent to which an increase in fees might cause ranchers to reduce their use of federal lands for grazing. The estimates do not include possible increases in administrative costs.)

The current formula, which was established in the Public Rangelands Improvement Act of 1978, uses a 1966 base value of \$1.23 per AUM that is adjusted annually to account for changes in the market for beef cattle, feed,

fuel, and other production inputs. Over the years, the Congress has considered various proposals to increase the grazing fee.

The principal justification for an increase is that the current formula appears to result in fees that are well below market rates and below the costs of administering the grazing program. In 1990, the appraised value of public rangelands in six Western states varied from \$5 to \$10 per AUM, far above the federal fee charged that year. In addition, a 2005 study indicated that the Forest Service and the Bureau of Land Management would have had to charge \$12.26 and \$7.64, respectively, per AUM to cover the program's costs in 2004, although the federal fee that year was much lower. Critics point out that such low fees subsidize private ranching and contribute to overgrazing and deteriorating range conditions.

A rationale for using state-specific formulas is that they would better reflect local markets and conditions. Grazing fees and methods for calculating them vary widely from state to state and sometimes even within a state. States' interest in the revenue received from state and federal fees would lessen any incentive to manipulate state fees to reduce federal fees.

An argument against this option is that state rangelands may be more valuable than federal lands are for grazing. The formulas that states use to set fees might not reflect those differences in quality and conditions of use if the same formulas applied to federal lands. In addition, using different procedures to set federal grazing fees in each state would increase the administrative costs of the program.

#### 300-7—Mandatory

## Open the Coastal Plain of the Arctic National Wildlife Refuge to Leasing

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-0	-0	-1,500	-1	-501	-2,002	-3,083

The Arctic National Wildlife Refuge (ANWR) consists of 19 million acres in northeastern Alaska, 1.5 million acres of which is in a coastal plain that is the least disturbed coastal region in the Arctic. The Alaska National Interest Lands Conservation Act of 1980 established ANWR to conserve fish and wildlife habitats, fulfill international treaty obligations related to wildlife and habitat protection, promote opportunities for indigenous people to maintain traditional lifestyles, and protect water quality. The act prohibits industrial activity on ANWR's coastal plain unless specifically authorized by the Congress. According to the U.S. Geological Survey, ANWR's coastal plain appears to have the best potential for oil production of any unexplored onshore area in the United States.

This option would open ANWR's coastal plain to the production of oil and natural gas. The Congressional Budget Office, on the basis of patterns generally followed in leasing tracts on the Alaskan Outer Continental Shelf, assumed that leases would be offered every two years starting in 2012. Over the period from 2010 to 2014, this option would raise about \$4 billion for the federal government in proceeds from auctions of leases for oil and gas development. (Although the federal government would later receive income from royalties on production, the bulk of those payments would occur after 2019.) Some legislative proposals would have half of the funds going to the state of Alaska, leaving \$2 billion in net offsetting receipts (which are credited against direct spending) going to the federal government over the period.

RELATED OPTIONS: 300-4, 300-5, and 300-6

CBO's estimate of the proceeds is based on the U.S. Geological Survey's projections of the mean value of economically recoverable oil that could be produced from federal land in ANWR. The estimate also relies on information from other federal agencies, the state of Alaska, and industry experts about oil and gas companies' perceptions of factors that affect the expected profitability of ANWR leases—in particular, companies' probable assumptions about long-term oil prices, volumes of recoverable reserves, and required rates of return on such investments.

Proponents of this option highlight the national security advantages of reducing U.S. dependence on imported oil. They argue that most of ANWR would remain closed to development and that the section of the coastal plain that would be directly affected by the drilling and production of oil is less than 1 percent of the entire refuge area. Moreover, they maintain, technological changes have improved the ability of the oil and gas industries to safeguard the environment.

Opponents of this option argue that whatever the stilluncertain gain from oil production in ANWR, extracting a nonrenewable resource for a relatively short time will not provide long-term energy security. In addition, they say, ANWR's coastal plain is a crucial area for the biological productivity of the refuge, and industrial activity there would threaten wildlife and the environment, despite efforts to mitigate impacts. The activity also could affect such international treaty obligations as the International Agreement on the Conservation of Polar Bears.

#### 300-8—Mandatory

# Reassign Reimbursable Costs for the Pick-Sloan Missouri Basin Program to the Beneficiaries It Serves

						То	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	0	-25	-25	-25	-25	-100	-225

For more than a century, the federal government, through the Bureau of Reclamation, has helped finance and build infrastructure to support municipal and industrial water supplies, hydroelectric power generation, irrigation, flood control, and recreational activities. Under current law, agricultural, municipal, and industrial users of water and the users of hydropower generated by federal water projects must pay some of the government's construction costs. Some users—municipal and industrial water users and the users of hydropower—include interest payments with their reimbursements to the government. Irrigators do not pay interest. A determination by the Secretary of the Interior that irrigators' repayment obligations exceed their ability to pay can in fact shift the associated reimbursement responsibilities to the users of hydropower.

As originally authorized in 1944, a portion of the Pick-Sloan Missouri Basin Program's power facilities and reservoirs was intended to support regional irrigation facilities. Agricultural users were to reimburse the federal government for that portion, without interest, upon completion of the irrigation facilities. Although the program's power facilities and reservoirs have been largely completed, only some of the planned irrigation facilities have been constructed. The Bureau of Reclamation maintains that the benefits of constructing the remaining irrigation facilities do not justify the costs. As those facilities are unlikely to be built, the federal government cannot charge the intended users for their share of the federal government's original investment in the power facilities and reservoirs that have been completed.

This option would make power customers who use the existing facilities responsible for that portion of the reimbursement originally assigned to irrigators on the basis of plans for facilities that were not realized. Reassigning those reimbursement responsibilities would increase off-setting receipts (which are credited against direct spending) by \$100 million through 2014.

Proponents of this option argue that power customers receive subsidized service because they benefit from, but do not pay for, the extra capacity that was built into the facilities to support irrigation. Another argument for the change is that if the federal government's overall investment in other aspects of the completed hydropower facilities increased (because of renovation and replacements), the amount of the investment that is unrecoverable also might increase.

Opponents of this option argue that power customers are already responsible for repaying most of the project's irrigation-related investment because of ability-to-pay determinations. They also maintain that the irrigation facilities that have not been constructed are still Congressionally authorized projects that could be funded in the future.

RELATED CBO PUBLICATION: How Federal Policies Affect the Allocation of Water, August 2006

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-686	-1,036	-1,737	-1,747	-1,761	-6,698	-16,166
Outlays	-27	-192	-503	-914	-1,272	-2,910	-11,135

#### 300-9—Discretionary

## Eliminate Federal Grants for Wastewater and Drinking-Water Infrastructure

The Clean Water Act (CWA) and the Safe Drinking Water Act (SDWA) are administered by the Environmental Protection Agency (EPA) to protect the quality of the nation's waters and the safety of its supply of drinking water by requiring municipal wastewater and drinkingwater systems to meet performance standards. Both laws provide for grants to capitalize state revolving funds (SRFs), which offer assistance (in market-rate and subsidized loans, loan or bond guarantees, and bond purchases, for example) to communities as they build or replace water systems to meet federal standards. For 2009, EPA received appropriations of about \$1.7 billion for water infrastructure grants, including \$689 million for clean water SRFs, \$829 million for drinking-water SRFs, and \$184 million for grants to specific communities and areas. An additional \$6.0 billion was provided in the American Recovery and Reinvestment Act of 2009 (ARRA, Public Law 111-5).

This option would phase out EPA's revolving-fund grants for wastewater and drinking-water facilities over three years. The action would reduce federal outlays by \$27 million in 2010 and by \$2.9 billion through 2014. (The \$27 million would be less than 2 percent of the \$1.4 billion increase in 2010 resulting from ARRA. That small offset to ARRA's stimulative effect could be avoided by starting the phase-out in 2011 rather than 2010.)

In 1987, amendments to the Clean Water Act phased out a program of direct construction grants for wastewater treatment facilities and replaced it with SRFs. States match federal contributions to the SRFs at the rate of 20 cents on the dollar and operate them within broad limits, defining eligible projects (which may include installation, rehabilitation, or replacement of sewer pipes; control of urban and agricultural runoff; and other water quality efforts), choosing the terms of assistance, and setting priorities. In 2007, 76 percent of the loans— 21 percent of total funding—went to communities with populations under 10,000. Authorization for the SRF program under the Clean Water Act has expired, but the Congress continues to provide annual appropriations for grants, allocating them to the states according to the shares specified in the 1987 amendments.

Amendments to the SDWA in 1996 authorized EPA to make grants to capitalize SRFs for drinking-water systems. Although generally modeled on the wastewater program, the SDWA program allocates funding by a formula that is based on the results of EPA's quadrennial "Drinking Water Infrastructure Needs Survey." States are required to establish a priority-setting system that focuses on reducing the greatest health risks and achieving compliance with SDWA quality standards, while taking into account the financial needs of local water systems.

One justification for this option is that the grants could encourage inefficient decisions about water infrastructure because they allow states to lend money at below-market interest rates, in turn reducing incentives for local governments to find less-costly ways to control water pollution and provide safe drinking water. Another rationale is that responsibility for water systems properly lies with state and local governments and that federal contributions to wastewater SRFs originally were viewed as a temporary step on the way to full state and local financing. Moreover, those contributions might not increase total investment in water systems if they merely replace funding that state and local sources would have provided otherwise.

Opponents of such cuts—including the Administration, which has requested a 2010 appropriation of \$3.9 billion for the SRFs—argue that the need to replace aging infrastructure, improve the safety of the drinking water (by protecting it against such threats as cryptosporidium), and protect the nation's waters (from sewer overflows, for example) is so large that federal aid should be increased, not reduced. Without external assistance, they say, water

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systems in many small or economically disadvantaged communities could not maintain the quality of their service and comply with the CWA's and SDWA's new and forthcoming requirements. States, they contend, cannot supply all of the necessary funding. Opponents of the option also argue that eliminating the federal grants would force even large systems—which tend to have lower costs because of economies of scale—to charge rates that would pose significant hardships for low- and moderate-income households. Moreover, they note that the Office of Management and Budget in 2004 concluded that both programs were performing adequately and appeared to be making progress toward their long-term goals.

#### **RELATED OPTION: 450-4**

RELATED CBO PUBLICATIONS: *Trends in Public Spending on Transportation and Water Infrastructure, 1956 to 2004,* August 2007; *Future Spending on Water Infrastructure,* Letter to the Honorable Don Young and the Honorable James L. Oberstar, January 31, 2003; and *Future Investment in Drinking Water and Wastewater Infrastructure,* November 2002

Eliminate the Energy Star Program												
						Total						
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Spending												
Budget authority	-58	-59	-60	-62	-63	-302	-637					
Outlays	-50	-59	-60	-62	-63	-294	-627					

#### 300-10—Discretionary

Energy Star is a product-labeling and certification program funded jointly by the Environmental Protection Agency (EPA) and the Department of Energy (DOE) that helps consumers and organizations save energy and reduce emissions of greenhouse gases by using appliances, other products, or management practices that are energy efficient or that rely on cleaner forms of energy. EPA and DOE allow businesses, institutions, and local governments whose products or management practices meet certain criteria for energy efficiency to use the Energy Star label in their marketing. EPA and DOE have given Energy Star certification to light fixtures, home appliances, office equipment, home construction materials, and new houses, among others. The agencies also disseminate information on sellers of labeled products and offer program participants some technical assistance in implementing changes that increase energy efficiency. Energy Star is one of several climate protection partnerships in which EPA and DOE work to disseminate information on energy-efficient technologies and clean forms of energy.

This option would end appropriations for the Energy Star program. Doing so would save \$50 million in outlays in 2010 and \$294 million through 2014.

An argument in favor of this option is that current Energy Star labels might not provide sufficient information to enlighten consumers' choices and that more accurate information is already available to consumers through other private sources. In particular, the labels do not estimate the potential savings of an Energy Star product relative to competing products, unlike DOE's "Energy Guide" labels, which appear on many appliances and provide comparative information on energy use and costs. In addition, reducing energy use does not always ensure a reduction in the emission of greenhouse gases: Coal-fired electricity-generating plants produce a large amount of carbon dioxide, a greenhouse gas, so encouraging consumers to purchase electric appliances with an Energy Star label instead of buying a less efficient natural gas appliance might save energy, but it could cause a net increase in carbon dioxide emissions. The Energy Star label is not an indicator of products' effectiveness, moreover, so using an appliance with an Energy Star label will not necessarily result in energy savings if the product must be used more frequently or for a longer duration to do the same job that is accomplished by a non-Energy Star product.

Insufficient consumer knowledge about energy efficiency and consequent unwillingness to pay for more expensive, energy-efficient products may result in industry's reluctance to invest in unproven new technologies. Therefore, an argument for maintaining the Energy Star program is that the labels and public education efforts by EPA and DOE provide consumers with some, albeit imperfect, information about energy-saving products at the point of sale. In addition, some recent behavioral studies show that simply providing the public a qualitative indicator of positive energy savings (rather than a quantitative estimate) is sufficient to motivate energy-saving choices.

300

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-61	-62	-64	-65	-66	-318	-670	
Outlays	-52	-62	-63	-65	-66	-308	-659	

#### 300-11—Discretionary

### Eliminate the Environmental Protection Agency's Science to Achieve Results Grant Program

300

Since 1995, the Environmental Protection Agency (EPA) has used the Science to Achieve Results (STAR) program to fund scientific and engineering research that the agency lacks the resources to perform internally. STAR is a competitive, peer-reviewed grant program that accounts for 15 percent to 20 percent of the research budget for EPA's Office of Research and Development. The program received appropriations of \$60 million in 2009, down slightly from \$63 million in 2008.

This option would eliminate the STAR program, saving \$52 million in outlays in 2010 and \$309 million over five years.

STAR grants—typically about \$500,000 per year for several years-go to researchers in academic and nonprofit institutions. STAR grants also fund graduate fellowships in environmental sciences, with the goals of strengthening the nation's foundation in environmental science and attracting new researchers to that field. (So far, more than 2,200 STAR fellowships have been awarded. EPA did not request fellowship applications for 2009, but it expects to solicit them for the 2010 academic year.) Requests for STAR grant applications are written with the help of EPA staff members who expect to be the primary users of the research. According to a report from the National Research Council, those requests receive an extensive internal review before they are issued, to ensure they are directed toward "issues most important to EPA" and are consistent with the agency's strategic plans. Grant applications are subjected to "rigorous" peer review to prevent conflicts of interest between proposal review and project oversight. Historically, about 10 percent of fellowship applications and slightly less than 15 percent of grant applications-about half of those that pass EPA's peerreview process-have been funded.

Proponents of this option cite concerns raised by the Office of Management and Budget (OMB) in an assessment for the President's 2005 budget, which concluded that STAR's research on water quality, land use, and wildlife is similar to work done in other federal agencies. OMB also found that the program's coordination with other EPA offices and other agencies was inadequate to ensure that the agencies had access to research findings; that the program had not shown "adequate progress toward achieving long-term goals"; and that the National Research Council's evaluation, which was intended to improve program management, was "insufficient in scope" and failed to address the effectiveness and policy relevance of the funded research. In addition, although the evaluation was generally laudatory, it asserted that EPA made insufficient use of outside experts in planning STAR's research agenda and that substantial delay often occurred between the completion of STAR-funded research and the use of that research in related EPA rulemaking.

Opponents of this option note the National Research Council's positive evaluation of the research funded by the program and the Government Accountability Office's critique of OMB's assessment methodology as a "work in progress" that needed "considerable revisions" if it was to become an "objective, evidence-based assessment tool." The evaluation stated that STAR's size relative to the total budget for EPA's Office of Research and Development was a "reasonable recognition of the value of independent, peer-reviewed research to the agency"; that the program maintained "a high degree of scientific excellence"; and that it helped satisfy EPA's need for a "strong and balanced" research program. Moreover, the STAR program supports research-particularly on ecology, airborne particulates, and pollution prevention-that is not done by other government agencies, and so it expands the nation's scientific foundations in the areas of human health and the environment.

#### **300-12—Discretionary or Mandatory**

## Impose Fees That Recover the Costs of Pesticide and New-Chemical Registration

						Тс	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-17	-24	-24	-24	-25	-114	-245

Note: Fees collected under this option could be recorded in the budget as offsetting collections (discretionary) or as offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

Three statutes require the Environmental Protection Agency (EPA) to assess the safety of pesticides and certain other chemical compounds. Under the Federal Insecticide, Fungicide, and Rodenticide Act, EPA registers pesticides that are sold or used in the United States; Registration involves assessing a pesticide's potential effects on human health and the environment and determining which uses meet standards for safety. The Federal Food, Drug, and Cosmetic Act requires EPA to limit the concentrations of pesticide residues in food (the Food and Drug Administration enforces the limitations). And the Toxic Substances Control Act (TSCA) requires EPA to review new chemical substances or mixtures before they are produced in or brought into the United States. The Premanufacture Notification (PMN) program created by TSCA requires manufacturers and importers to give EPA 90 days' notice of the intent to introduce a chemical substance into commerce; during that time the agency may approve, constrain, or ban the substance.

The agency collects a variety of fees to help fund those programs. For example, the pesticide program has a schedule of 140 different registration fees, set according to the type of pesticide (conventional, antimicrobial, biochemical), the type of registration (new product, new use, new active ingredient), and the type of use (indoor or outdoor, first use on a food crop, additional food use, nonfood use). The fees range from zero for a new product with an already-registered active ingredient to \$599,235 for a new, conventional active ingredient submitted for food use and an experimental-use permit.

The fees currently cover about 25 percent of EPA's costs to administer the pesticide and PMN programs, in part because of statutory constraints on fee categories and amounts. For example, the fee for a PMN submission, which may contain up to six related chemicals, is capped at \$2,500. (Small businesses pay just \$100 per PMN submission.)

This option would raise fees and eliminate caps and prohibitions to allow EPA to recover half of its costs for implementing the pesticide and PMN programs. If pesticide fees were doubled, registration would cost up to \$1.2 million. Doubling the PMN application fee would yield about \$5,000 per submission. Combined, the new charges would increase receipts by \$17 million in 2010 and by \$114 million over five years.

Proponents of this option argue that higher fees would appropriately shift more of the costs of the pesticide and PMN programs from taxpayers to the programs' direct beneficiaries. That argument is made in the Administration's 2010 budget request, which includes a similar proposal.

Opponents argue that higher fees for pesticide registration would be passed along to farmers and, eventually, to purchasers of food. Opponents also argue that because the Toxic Substances Control Act exempts some existing substances, higher PMN fees would favor those preparations over new chemicals, regardless of whether the older substances were more dangerous than the new. For both fees, to the extent that collections flowed directly to EPA rather than to the Treasury or to a fund subject to the appropriation process, the agency would have less incentive to monitor and control costs for the pesticide and PMN programs.

Scale Back the Department of Agriculture's Conservation Stewardship Program										
						То	tal			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Outlays										
Prohibit new enrollments	-228	-428	-620	-817	-1,015	-3,108	-10,873			
Reduce new enrollments by 50 percent	-114	-214	-310	-409	-508	-1,555	-5,436			
Reduce per-acre payments by 10 percent	-42	-62	-81	-100	-120	-405	-1,315			

#### 300-13—Mandatory

The Conservation Stewardship Program (CSP), which was reauthorized in the Food, Conservation, and Energy Act of 2008, gives agricultural producers financial and technical help with the conservation and improvement of soil, water, air, energy, and plant and animal life on agricultural lands. (The Conservation Reserve Program, the subject of Option 300-14, encourages conservation through removing land from agricultural production.) Under the CSP, producers enter into five-year contracts (in some cases with an option to extend for another five years) in which they agree to undertake various conservation measures in exchange for annual payments. For every acre enrolled, a producer receives compensation for installing and adopting new conservation activities and for improving, maintaining, and managing existing conservation activities. The 2008 act limits new enrollment in the CSP to 12.769 million acres per year, at an average cost of \$18 per acre.

This option would curtail the CSP in one of three ways: by prohibiting new enrollments; by cutting annual enrollments in half (to 6.385 million acres per year); or by reducing the average per-acre payment by 10 percent (to \$16.20 per acre), starting in 2010. The first change would reduce spending by the department's Commodity Credit Corporation (CCC) by \$228 million in 2010 and by \$3.1 billion over five years. The second change would reduce CCC spending by \$114 million in 2010 and by

**RELATED OPTION: 300-14** 

\$1.6 billion through 2014. The third change would reduce CCC spending by \$42 million in 2010 and by \$405 million through 2014. None of the changes proposed by this option would affect the terms of existing contracts.

An argument for scaling back the CSP is that some provisions of the program cast doubt on its effectiveness. First, making payments to producers who have already adopted conservation practices does not enhance the nation's conservation efforts. The criteria used to determine improvements in existing conservation practices are not readily apparent, and the absence of objective measurements could result in higher payments than necessary to encourage adoption. Making payments that exceed producers' costs to adopt and maintain conservation measures could be viewed as a wasteful use of federal funds.

Supporters of the CSP see it as a better way to support agriculture-through a form of "green payment"-than the traditional crop-based subsidies. When fully implemented, the CSP could foster the adoption of more conservation practices to protect the nation's natural and productive resources. Such practices often require significant up-front costs to undertake and could reduce the economic output of agricultural land; CSP payments might offset those costs.

300

Limit Enrollment in the Conservation Reserve Program												
						Total						
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Outlays												
Prohibit new enrollments	0	0	-167	-268	-537	-972	-3,531					
Prohibit reenrollments	0	-223	-608	-881	-1,326	-3,038	-10,520					

#### 300-14—Mandatory

The Department of Agriculture's Conservation Reserve Program (CRP) is intended to promote soil conservation, improve water quality, and protect wildlife habitat by removing land from active agricultural production. Landowners sign contracts with the Department of Agriculture to keep land out of production, usually for 10 to 15 years, in exchange for which the department provides annual rental payments and cost-sharing assistance for establishing appropriate conservation practices on the enrolled land. Acreage may be removed from production in one of two ways: through general enrollments, which are held periodically for larger tracts of land, or through continuous enrollments, which allow producers to offer at any time smaller tracts of land that are devoted to those conservation practices considered the most effective (such as the use of filter strips, grass waterways, and riparian buffers). Not all contract offers are accepted, however; approval is based on an evaluation of the costs and potential environmental benefits of a landowner's plan. The CRP is funded by the Department of Agriculture's Commodity Credit Corporation at about \$2.0 billion to \$2.7 billion per year.

Currently, about 33.6 million acres of land is enrolled in the CRP. Total enrollment is capped at 32.0 million acres under the Food, Conservation, and Energy Act of 2008, after allowing sufficient time for some current contracts to expire. The Congressional Budget Office estimates that enrollment in the program will reach 31.9 million acres by 2010.

This option would limit the scope of the CRP in one of two ways: by prohibiting new general enrollments, beginning in 2010, but allowing current participants to reenroll when their contracts expire, reducing spending by \$972 million through 2014; or by prohibiting any new general enrollments (including reenrollments), beginning in 2010, reducing spending by \$3.0 billion through 2014.

Under these approaches, the amount of land enrolled in the CRP would drop significantly. Without new enrollments, by 2019, acreage in the CRP would total 24.3 million if reenrollment was permitted and 6.0 million if it was not.

Although there is widespread agreement about the need to take at least some environmentally sensitive land out of production, some supporters of scaling back the CRP see the program as expensive and poorly focused. They argue that the CRP's funding could be put to other uses that would provide greater environmental benefits. Other supporters of limiting the program believe that retiring large amounts of cropland in a given area could dampen economic activity (for example, by reducing the demand for seed, fertilizer, and other farm supplies), thus hurting rural communities. Also, reducing CRP enrollment could free more land for corn and biomass production for ethanol.

Opponents of scaling back the CRP note that the Department of Agriculture's plan to accept the most environmentally sensitive land in future enrollments would be a cost-effective way to protect fragile lands. Studies have indicated that the CRP yields high returns—in enhanced wildlife habitat, improved water quality, and reduced soil erosion—for every dollar spent.

Statutory Aid	critage Area Orants and
	Total

Fliminate the National Park Service's Local Funding for Heritage Area Grants and

#### 300-15—Discretionary

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-22	-22	-22	-22	-23	-111	-229	
Outlays	-18	-21	-22	-22	-23	-106	-224	

300

Two National Park Service programs—National Heritage Area (NHA) grants and a statutory aid program—assist local organizations in establishing, preserving, or operating areas of natural, historical, cultural, or recreational importance. Locations designated as National Heritage Areas by the Congress are eligible for NHA grants; other local programs may be allocated statutory aid by specific authorization. Both programs support sites that are operated and managed by state or local agencies, nonprofit groups, or private partnerships. As of 2008, 40 sites had been designated National Heritage Areas, up from 27 in 2006; 13 sites or programs received statutory aid in 2008. For 2009, \$15.7 million has been appropriated for NHA, up from \$15.3 million in 2008. Funding for the Park Service's statutory aid program is \$5.6 million in 2009, up from \$5.3 million in 2008.

This option would eliminate both programs, with a resulting reduction in discretionary outlays of \$18 million in 2010 and of \$106 million over five years.

NHA grants are intended as seed money to help organizations become self-sustaining through the establishment of partnerships with state and local governments, nonprofit groups, and businesses that would fund the organizations' ongoing operations. The Park Service states that Heritage Areas should "tell nationally important stories... [and] provide outstanding opportunities for conservation. Where appropriate, they should also strengthen, complement, and support existing units of the National Park System." NHA grants are capped at \$1 million annually and may last up to 15 years (although the total cannot exceed \$10 million) for areas designated since 1996. Heritage Areas may receive other federal funding (primarily from the Department of Transportation for road and infrastructure improvements). By statute, half of the funding for each Heritage Area must come from nonfederal sources. Statutory aid supports local efforts to establish, preserve, and operate other sites. Both programs are intended to extend the Park Service's mission of preserving nationally significant natural and historical resources without acquiring or managing those resources itself.

The previous Administration criticized the NHA grant program for its lack of demonstrated results and for not using a competitive process to award the grants. The Government Accountability Office (GAO) has stated that the Park Service lacks systematic processes for identifying qualified NHA sites and recommending them to the Congress for approval. According to GAO, the Park Service has not established "results-oriented performance goals and measures" in its oversight of heritage areas and has failed to track federal funding or determine the appropriateness of expenditures for the NHA program. (The Park Service maintains that it has not been funded to carry out those latter tasks.) GAO also contends that sunset provisions (which establish each grant's ending date) have been ignored. In a 2004 report, GAO noted that the Congress had extended all of the NHA grants that had reached their original sunset dates, and that those NHAs continue to receive funding under the originally enacted authorizations. Nine Heritage Areas designated in 1996 sought extensions in 2006.

One argument for eliminating the NHA grant program is that grant recipients have not become self-sufficient, as evidenced by the continued funding of Heritage Areas beyond their sunset dates. Property rights advocates also have voiced concern that the NHA program could be a way to exert federal influence over local zoning and land use planning. Moreover, the efforts funded by the NHA program and the statutory aid program are—in the words of the Park Service itself—"secondary to the primary mission of the National Park Service."

#### CHAPTER TWO

Arguments against eliminating the programs include the importance of the historic and cultural landscapes that the programs protect; of maintaining the programs' role in promoting stewardship; and of maintaining their role in fostering tourism and community revitalization. Public interest in creating new Heritage Areas is growing. The number of bills introduced in the Congress to study or designate new Heritage Areas has increased considerably in recent years: In the 111th Congress, 21 potential sites were proposed through March 2009 for designation or study as Heritage Areas.



Agriculture

ost of the programs that support farm income, promote agricultural research, and enhance marketing opportunities for farmers are contained in function 350. Those activities are administered by the Department of Agriculture. Mandatory programs-which account for most of the spending-provide income support for producers of major crops (including corn, cotton, soybeans, and wheat), crop insurance, and farm credit programs. Discretionary programs include agricultural research and extension, economic analysis and statistics collection, plant and animal health inspection, agricultural marketing, and international food aid. The Congressional Budget Office

estimates that total outlays for function 350 will be \$23 billion in 2009.

CBO projects that spending for farm income-support programs-which the Food, Conservation, and Energy Act of 2008 (Public Law 110-246) extended through 2012-will increase from \$6 billion in 2008 to \$9 billion in 2009, partly because crop and dairy prices in 2009 fell below the record-high prices of 2007 and 2008. Spending for the crop insurance program also is projected to increase, from \$4 billion in 2008 to \$7 billion in 2009, as indemnities and other program payments in 2009 reflect the higher value of crops insured in 2007 and 2008.

						Estimate	Average Annual Rate of Growth (Percent)	
	2004	2005	2006	2007	2008	2009	2004-2008	2008-2009
Discretionary Budget Authority	5.6	5.7	6.0	8.7	6.6	6.4 <sup>a</sup>	4.0	-3.0
Outlays								
Discretionary	5.6	5.8	5.8	6.0	8.4	6.1	11.0	-27.2
Mandatory	9.9	20.8	20.2	11.6	10.0	17.0	0.2	70.4
Total	15.4	26.6	26.0	17.7	18.4	23.1	4.5	25.6

Includes \$0.3 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

#### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 350, SEE THE FOLLOWING REVENUE OPTION:

Revenue Option 65 Finance the Food Safety and Inspection Service Solely Through Fees

#### 350-1—Mandatory

## Impose New Limits on Payments to Producers of Certain Agricultural Commodities

						То	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-37	-164	-68	-168	-169	-606	-1,474

The government supports producers of farm commodities, such as cotton, feed grains, oilseeds, peanuts, rice, and wheat, in three main ways. First, it gives producers direct payments based on production history (those payments are not affected by market prices). Second, the government gives some producers countercyclical or average crop revenue election (ACRE) payments, which depend, respectively, on market prices or average state revenue (the price multiplied by the state average yield for the crop). Third, under the marketing assistance loan program, the Department of Agriculture's Commodity Credit Corporation (CCC) essentially guarantees minimum prices for various crops on the basis of specific amounts per unit (bushel or pound) of eligible production on a farm. Hence, larger farms earn larger payments.

Since 1970, the amount producers can collect under the first two types of programs has been capped. Currently, the limits are set at \$40,000 for direct payments and \$65,000 for countercyclical payments. There are proportional caps for ACRE payments. There are no limits on CCC payments.

This option would cut the current payment limits in half for the first two types of programs—to \$20,000 per person for direct payments and \$32,500 per person for countercyclical payments, with proportional amounts for ACRE payments. Savings in CCC payments would amount to \$37 million in 2010 and \$606 million over five years. Most of the savings would come from reducing the limit on direct payments, primarily because total countercyclical payments are projected to be relatively low over the next several years as a result of higher prices for commodities. Policy positions for and against payment limits are heavily influenced by perceptions of fairness. Advocates of lowering the limits generally view the purpose of farm support programs as keeping smaller family farms in business, particularly those that struggle financially. Payment limits are intended both to reduce overall federal spending on farm programs and to promote greater equity in the distribution of program benefits. Lower limits would not directly increase payments to small producers, but they would reduce the budgetary costs of the programs and the proportion of total payments going to large farms. Thus, supporters of the option maintain, lower limits could help small farms indirectly, slowing the rate at which such farms are lost by reducing larger farmers' incentives to buy them to expand operations.

Opponents of the option argue that farm programs are not intended or well suited to provide a more equal distribution of income among farm households. They also contend that payment limits undermine the competitiveness of U.S. agriculture in global markets. Some producer organizations have called for eliminating the limits altogether, saying that tighter restrictions on program benefits hurt the larger, more efficient farms that are better able to take advantage of economies of scale in production. Opponents also note that reducing the payment limits would have different effects on commodities and regions. Because cotton, rice, and corn have a relatively high value of program benefits per acre, most of the option's savings would come from lower payments to producers of those crops, and the effect on the agricultural sector would be largest in the South, West, and Midwest, where those crops are concentrated.

Reduce Payment Acreage by 1 Percentage Point											
						Total					
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Outlays	-62	-65	-48	-59	-60	-294	-593				

The Department of Agriculture's direct, countercyclical, and average crop revenue election (ACRE) payments to agricultural producers are expected to make up about 97 percent of the total spending by the Commodity Credit Corporation (CCC) for program commodities (cotton, feed grains, oilseeds, peanuts, wheat, and rice) over the next 10 years. Those payments are calculated in part as 83.3 percent of a producer's base acreage (85 percent beginning with the 2012 crop) multiplied by an assumed yield per acre multiplied by a payment rate per unit (bushel, pound, or hundredweight) of production.

In general, a farm's base acreage for each eligible crop is calculated as the average number of acres planted with that crop between 1998 and 2001. Because direct and countercyclical payments are made regardless of what is currently produced on the farm, those payments tend not to distort farmers' decisions about production. ACRE payments depend upon actual farm production. Program participants also may receive benefits for those commodities through marketing-assistance loans, which are paid according to actual farm production.

This option would reduce the eligible payment acreage for direct, countercyclical, and ACRE payments by 1 percentage point—from 83.3 percent to 82.3 percent for crops harvested between 2009 and 2011 and from 85 percent to 84 percent beginning with the 2012 crop. That change would reduce the CCC's outlays for farm programs by \$62 million in 2010 and by \$294 million

RELATED OPTION: 350-1

over five years. (Greater changes in the percentages would yield proportionately greater savings.)

Producers of commodities that are not covered by direct, countercyclical, and ACRE payments—dairy products, mohair, sugar, and wool, for example—receive federal benefits primarily through marketing-loan gains, loan deficiency payments, or purchases. Proportionately reducing program benefits for those commodities to the reductions in this option would lower CCC spending by an additional \$54 million over the 2010–2014 period. Such a decrease would most likely be accomplished through a reduction in the applicable rates for marketingassistance loans or the purchase prices of dairy products.

The primary advantage of reducing payment acreage is that it would yield significant savings with a relatively small adjustment in the programs' provisions. The spending cuts would affect all program participants in proportion to their expected payments instead of disproportionately affecting producers of any particular commodity.

The main disadvantage of this option is that the cuts in commodity programs would target the least marketdistorting payments (direct and countercyclical payments) rather than marketing loan benefits, which essentially guarantee minimum prices for certain crops. In addition, although reducing payment acreage would be relatively straightforward, achieving proportionate reductions in spending for other commodities would be more complicated. A reduction in payment acreage also would reduce farm income. 350-3—Mandatory

## Reduce the Reimbursement Rate Paid to Private Insurance Companies in the Crop Insurance Program

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-68	-68	-67	-69	-71	-343	-715
Outlays	-61	-68	-7	-67	-68	-271	-639

The Federal Crop Insurance Program protects farmers from losses caused by drought, floods, pest infestation, and other natural disasters. Farmers can choose various amounts and types of protection (for example, against yield losses only or against yield losses and low prices) in policies that are sold and serviced by private vendors. The program reimburses the insurance companies for their administrative costs on the basis of the types of policies they sell and the amount they collect in premiums. The companies also share the underwriting risk with the federal government and can gain or lose depending on the extent of crop losses and indemnity claims. Typically, the companies gain overall.

The Food, Conservation, and Energy Act of 2008 (Public Law 110-246) cut the maximum reimbursement rate for the program's administrative costs from 24.2 percent to 21.9 percent of premiums (actual reductions in reimbursements vary with the type of policy and the severity of crop losses in the state). This option would further reduce the maximum rate, to 20.9 percent of premiums (with comparable reductions for types of policies that are currently reimbursed below the maximum). That change would save \$61 million in outlays in 2010 and \$271 million over five years. (Outlay savings in 2012 are smaller because provisions in current law shift most spending for expense reimbursements from 2012 to 2013.) The President's budget proposes similar reductions in subsidies for the crop insurance program through reductions in underwriting gains (the difference between producer premiums and insurance claims) paid to insurance

**RELATED OPTION: 450-8** 

companies and higher premiums charged to farmers for insurance.

Proponents of this option assert that lawmakers could cut the reimbursement rate to an amount below that enacted in 2008 without substantially affecting the quantity or quality of services provided to farmers, partly because total insurance premiums and the government's reimbursements have been rising faster than have the administrative costs of selling and servicing policies. They note that, notwithstanding the rate reduction in 2008, reimbursements per acre insured have more than doubled since 2000, partly because of higher crop prices and partly because coverage on acreage already insured has increased, yielding higher premiums without a corresponding increase in administrative costs. (Increased coverage is one result of the Agricultural Risk Protection Act of 2000, which significantly reduced farmers' costs for insurance.) Proponents also assert that even if cuts caused some companies to curtail services to farmers or to drop out of the market, others could step in and there would be no significant effect on the program.

An argument against this option is that farmers' access to insurance could be hampered by further cuts, which could impair the crop insurance industry. If the crop insurance program failed, opponents say, lawmakers would be more likely to resort to expensive, specialpurpose relief programs when disaster struck, negating any apparent savings from cutting the reimbursement rate.

Eliminate the Foreign Market Development Program										
						Total				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Outlays	-24	-31	-35	-35	-35	-160	-335			

#### 350-4—Mandatory

The Department of Agriculture's Foreign Agricultural Service (FAS) administers programs that promote exports of agricultural products from the United States and provide nutritional and technical assistance to other countries. In the Foreign Market Development Program, FAS acts as a partner in joint ventures with "cooperators"—such as agricultural trade associations and commodity groups—to develop markets for U.S. exports. The program, also called the Cooperator Program, typically promotes generic products and basic commodities, such as grains and oilseeds, although it also covers some higher-value products, such as meat and poultry.

This option would eliminate funding for the Foreign Market Development Program, reducing mandatory outlays by \$24 million in 2010 and by \$160 million over five years.

Supporters of the option argue that the Cooperator Program merely replaces private spending with public spending and that the cooperators should bear the full cost of foreign promotions because they benefit directly from them. They also argue that the program's services duplicate those of FAS's Market Access Program, which works similarly to create and expand foreign markets for U.S. agricultural products.

Opponents of the option argue that, because other countries provide support to their exporters, ending federal funding for the Cooperator Program could place U.S. exporters at a disadvantage in international markets. They also contend that the Cooperator Program does not duplicate other programs, partly because it focuses on basic commodities and sales to foreign manufacturers and wholesalers. Moreover, some analysts contend, the program helps the U.S. economy as a whole-not just the cooperators-by reducing the trade deficit. However, analysis shows that government efforts to support or subsidize exports have at best a temporary effect on the trade deficit, which is largely driven by the difference between domestic investment and domestic saving. Moreover, by distorting the allocation of economic resources, such efforts generally impose costs that exceed their benefits.

#### RELATED OPTIONS: 150-1, 350-5, 350-6, and 370-1

RELATED CBO PUBLICATIONS: The Effects of Liberalizing World Agricultural Trade: A Review of Modeling Studies, June 2006; The Effects of Liberalizing World Agricultural Trade: A Survey, December 2005; The Decline in the U.S. Current-Account Balance Since 1991, Issue Brief, August 6, 2004; and Causes and Consequences of the Trade Deficit: An Overview, CBO Memorandum, March 2000

Reduce Funding for the Market Access Program									
						Total			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Outlays         -3         -48         -60         -60         -231         -531									

#### 350-5—Mandatory

The Market Access Program is administered by the Department of Agriculture's Foreign Agricultural Service (FAS) to help trade associations, commodity groups, and for-profit businesses build markets overseas for U.S. agricultural products. Funding for the program increased from \$100 million in 2002 to \$200 million in 2006 and ensuing years.

This option would reduce funding for the Market Access Program in 2010 and subsequent years to \$140 million, the same funding authorized for the program in 2005. That change would reduce mandatory outlays by \$231 million over the 2010–2014 period. The President's budget proposes a reduction in funding for the Market Access Program to \$160 million in 2010 and subsequent years.

The Market Access Program promotes the export of such products as eggs, fruit, meat, poultry, seafood, tree nuts, and vegetables. About 20 percent of the program's funding goes to promote brand-name goods. The program requires varying degrees of cost sharing: Cooperatives and small private businesses must pay at least 50 percent of the overall costs of promoting brand-name products; trade associations and others pay at least 10 percent of the costs of promoting generic products.

Some supporters of this option argue that the Market Access Program does not warrant additional funding because the extent to which it has developed markets or replaced private expenditures with public funds is not known. Others argue that taxpayers' money should not be spent to advertise brand-name products and that participants should bear the full cost of foreign promotions because they receive the benefits directly. Further, some proponents assert, the Market Access Program duplicates the FAS's Foreign Market Development Program, which also provides funds for overseas marketing. Finally, those who argue in favor of the option say that federal intervention to promote exports distorts the allocation of economic resources and has no lasting influence on the trade deficit; some analysis indicates that the trade deficit is primarily the result of the gap between domestic investment and domestic saving.

An argument against this option holds that in recent years the Market Access Program has targeted its funds toward small companies and cooperatives and has reduced the share that goes to promoting brand-name products. Furthermore, because other countries support their exporters, limiting the program could place U.S. exporters at a disadvantage in international markets. Some opponents of this option maintain that the Market Access Program differs from other programs partly because it focuses on specialty crops, processed products, and consumer promotions, so it does not duplicate the efforts of other federal programs.

#### RELATED OPTIONS: 150-1, 350-4, 350-6, and 370-1

RELATED CBO PUBLICATIONS: The Effects of Liberalizing World Agricultural Trade: A Review of Modeling Studies, June 2006; The Effects of Liberalizing World Agricultural Trade: A Survey, December 2005; The Decline in the U.S. Current-Account Balance Since 1991, Issue Brief, August 6, 2004; and Causes and Consequences of the Trade Deficit: An Overview, CBO Memorandum, March 2000

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-31	-31	-31	-31	-31	-155	-310
Outlays	-17	-30	-31	-31	-31	-140	-295

#### 350-6—Mandatory

The Department of Agriculture promotes the export of U.S. farm products through several credit guarantee programs administered by the Foreign Agricultural Service. Those programs protect exporters and banks in the United States against default on financing they provide to foreign importers and banks to cover purchases of U.S. goods. If the foreign recipients of export credit fail to repay what they owe, those programs ensure that the federal government makes up most of the shortfall.

The principal credit guarantee program for agricultural exports is the Export Credit Guarantee Program, which covers credit with repayment terms of up to three years. The Department of Agriculture has implemented a series of changes to the program over the past several years. In 2005, in response to findings by a dispute resolution panel of the World Trade Organization, loan fees were increased, and higher-risk countries were excluded from the program. Under provisions of the Food, Conservation, and Energy Act of 2008 (Public Law 110-246), a 1 percent cap on origination fees was removed and several export credit guarantee programs, including the Supplier Credit Program, were terminated. Those modifications have reduced the estimated subsidies for the program, despite increased use of guarantees in recent years.

This option would restrict the repayment period for the Export Credit Guarantee Program to six months, reducing mandatory outlays by \$17 million in 2010 and by \$140 million through 2014.

Supporters of this option contend that the credit guarantees of up to three years provided under the Export Credit Guarantee Program offer substantial benefits to participating foreign and domestic banks but have little, if any, influence on U.S. agricultural exports overall. Moreover, in multilateral trade negotiations, the United States has expressed support for limiting the term of its credit guarantee programs to six months if other countries agree to eliminate their export subsidy programs. Furthermore, some advocates of the option argue, government programs that support or subsidize exports hurt the economy as a whole by distorting the allocation of economic resources and thus imposing costs that exceed their benefits.

Opponents of this option say that the United States should not curtail its export credit programs without parallel changes in the export subsidy programs of other countries. Other advocates of the program note the recent volatility in credit markets and maintain that the current longer-term credit guarantees reduce the cost of financing purchases and allow suppliers in the United States to increase sales in countries where they could not otherwise provide financing.

#### RELATED OPTIONS: 150-1, 350-4, 350-5, and 370-1

RELATED CBO PUBLICATIONS: The Effects of Liberalizing World Agricultural Trade: A Review of Modeling Studies, June 2006; The Effects of Liberalizing World Agricultural Trade: A Survey, December 2005; The Decline in the U.S. Current-Account Balance Since 1991, Issue Brief, August 6, 2004; Estimating the Value of Subsidies for Federal Loans and Loan Guarantees, August 2004; and Causes and Consequences of the Trade Deficit: An Overview, CBO Memorandum, March 2000

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## **Commerce and Housing Credit**

hrough agencies as diverse as the Small Business Administration (SBA), the Federal Housing Administration (FHA), the Federal Deposit Insurance Corporation, and the U.S. Postal Service, the federal government regulates and promotes U.S. commerce at home and abroad. Budget function 370 includes programs that promote U.S. products in foreign markets, provide deposit insurance for banks and credit unions, and provide loans and loan guarantees to small businesses. Activities of the Securities and Exchange Commission, the Federal Trade Commission, the Federal Communications Commission (FCC), and the Patent and Trademark Office generate fees that offset spending in function 370. Although the federal government records proceeds from the FCC's spectrum auctions in budget function 950 (as undistributed offsetting receipts), spending options involving those auctions are included in budget function 370.

Federal intervention in the financial markets in fiscal year 2009 resulted in the creation of new programs in function 370 whose costs dwarf estimated outlays for other activities. In 2008, the function's largest program, the Universal Service Fund (which supports affordable telecommunications services throughout the nation) spent about \$7.9 billion. By contrast, the Congressional Budget Office estimates that outlays in 2009 for the Troubled Asset Relief Program, which purchases and insures troubled assets from financial and other institutions, will exceed \$300 billion. The government also took over Fannie Mae and Freddie Mac, the government-sponsored enterprises that guarantee mortgages and mortgagebacked securities. Outlays for those two entities are estimated to be nearly \$300 billion in 2009. CBO also estimates that in 2009 the U.S. Postal Service will experience a shortfall of about \$3 billion.

For 2009, outlays for budget function 370 are estimated to total \$670 billion, compared with only \$28 billion in 2008. Past fluctuations in annual outlays have been caused by periodic revisions in the estimates of the cost of FHA and SBA credit programs. In 2010, CBO estimates, outlays will decrease sharply as the initial costs of the new financial relief programs are replaced by annual revisions in the estimates of the cost of those programs' activities.

						E ation at a	Average Annual	
	2004	2005	2006	2007	2008	Estimate 2009	Rate of Grow 2004–2008	2008–2009
Discretionary Budget Authority	*	2.6	1.9	1.8	3.2	8.5 <sup>a</sup>	n.a.	168.5
Outlays								
Discretionary	0.1	2.1	1.8	1.8	3.1	6.2	126.4	101.0
Mandatory	5.2	5.4	4.3	-1.3	24.8	663.8	48.1	2,576.5
Total	5.3	7.6	6.2	0.5	27.9	670.0	51.6	2,303.7

#### Federal Spending, Fiscal Years 2004 to 2009 (Billions of nominal dollars)

Note: \* = between -\$50 million and zero; n.a. = not applicable (because of a zero or negative value in the first year).

a. Includes \$3.2 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

#### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 370, SEE THE FOLLOWING REVENUE OPTIONS:

Revenue Option 7	Reduce the Mortgage Interest Deduction or Replace It with a Tax Credit
Revenue Option 32	Tax Large Credit Unions in the Same Way as Other Thrift Institutions
Revenue Option 42	Tax the Federal Home Loan Banks Under the Corporate Income Tax
Revenue Option 49	Eliminate the Source-Rules Exception for Exports
Revenue Option 54	Eliminate the Federal Communications Excise Tax and Universal Service Fund Fees
Revenue Option 61	Charge for Examinations of State-Chartered Banks
Revenue Option 62	Charge Transaction Fees to Fund the Commodity Futures Trading Commission

#### 370-1—Discretionary

## Eliminate the International Trade Administration's Trade Promotion Activities or Charge the Beneficiaries

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-315	-320	-325	-330	-336	-1,626	-3,451
Outlays	-267	-309	-321	-326	-332	-1,555	-3,352

The International Trade Administration (ITA) of the Department of Commerce operates a trade development program that assesses the competitiveness of U.S. industries and promotes exports. ITA also operates the U.S. and Foreign Commercial Service, which counsels domestic businesses on issues related to exports. The agency charges fees for those services, but the fees do not cover the costs of all activities.

This option has two alternatives: eliminate ITA's trade promotion activities or charge the beneficiaries for those services. Either change would save \$267 million in outlays in 2010 and about \$1.6 billion through 2014.

The principal rationale for this option is that business activities, such as trade promotion, are usually better left to the companies and industries they are likely to benefit rather than to a government agency. In addition, having the government engage in such activities (without charging the beneficiaries for their full cost) is an expensive means of helping U.S. businesses because the benefits are partially passed on to foreigners in the form of lower prices for U.S. exports. Moreover, the lower prices could result in some products' being sold abroad for less than the cost of production and sales and, thus, could degrade U.S. economic well-being. Furthermore, in the 2008 Program Assessment Rating Tool evaluation, the Office of Management and Budget concluded that businesses can obtain services similar to those offered by ITA from state, local, and private-sector entities.

An argument against eliminating ITA's trade promotion activities is that they may be subject to some economies of scale, so having one entity (the federal government) counsel exporters about foreign legal and other requirements, disseminate information about foreign markets, and promote U.S. products abroad might make sense. An alternative way to reduce net federal spending but continue the ITA's activities would be to charge the beneficiaries for their full costs. Fully funding ITA's trade promotion activities through voluntary charges, however, could prove difficult at best. In many cases, it would be impossible to promote the products of selected businesses that were willing to pay for such promotion without also promoting the products of other companies in the same industry. In those circumstances, there would be little incentive for companies to purchase ITA's services because they would be likely to accrue benefits regardless of whether they paid for them. Consequently, if the federal government wanted to charge beneficiaries for ITA's services, it might have to require that all companies in an industry (or the industry's national trade group) decide collectively whether to buy the services. If an industry chose to purchase the services, all of the companies in the industry would be required to pay according to some equitable formula.

RELATED OPTIONS: 150-1, 350-4, 350-5, and 350-6

RELATED CBO PUBLICATIONS: The Decline in the U.S. Current-Account Balance Since 1991, August 6, 2004; and Causes and Consequences of the Trade Deficit: An Overview, March 2000

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						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-120	-121	-122	-123	-124	-610	-1,266
Outlays	-24	-82	-107	-119	-123	-455	-1,096

#### 370-2—Discretionary

# Eliminate the Hollings Manufacturing Extension Partnership and the Baldrige National Quality Program

The Hollings Manufacturing Extension Partnership (HMEP) and the Baldrige National Quality Program are overseen by the National Institute of Standards and Technology to improve the performance of U.S. businesses. HMEP consists primarily of a network of nonprofit extension centers, partially funded by the federal government, that offer small and midsize businesses expertise in management and manufacturing. The Malcolm Baldrige National Quality Award, which is given to companies (and, in recent years, to education and health care institutions) for achievements in quality and performance, is the main portion of the other program.

This option would eliminate the Hollings Manufacturing Extension Partnership and the Baldrige National Quality Program, reducing discretionary outlays by \$24 million in 2010 and by \$455 million through 2014.

Proponents of this option question whether it is appropriate or necessary for the government to provide technical assistance such as that offered by the HMEP program. Many university professors of business, science, and engineering consult with private industry, and other ties between universities and business promote knowledge transfer. In fact, some of the centers that HMEP subsidizes predate the program. The Office of Management and Budget (OMB) has noted that survey results from the Modernization Forum indicate that about half of the partnership's clients believe the services they obtained from HMEP are available other places, although at a higher cost.

The program's enhancement of U.S. productivity also is questionable. It can be argued that federal spending for HMEP allows some inefficient companies to remain in business, tying up capital, labor, and other resources that could be used more productively elsewhere. Moreover, according to OMB's evaluation, manufacturing extension centers originally were intended to become self-sufficient, supported by fees and perhaps by contributions from state governments. Despite that, the program recovers only one-third of its costs through fees.

Opponents of eliminating the partnership program point to the economic importance of small and midsize companies, which they say produce more than half of U.S. output and employ two-thirds of the nation's manufacturing workers. They maintain that small companies often lack expertise, must work within small budgets, and face other barriers that can prevent them from obtaining the sort of information HMEP provides. Moreover, larger companies often rely on small and midsize companies for supplies and intermediate goods. Thus, opponents of the option say, HMEP promotes U.S. productivity and international competitiveness. The Administration's budget for 2010 requests \$125 million for HMEP.

An argument for eliminating the Baldrige National Quality Program is that businesses need no government incentives to maintain the quality of their products and services—the threat of lost sales is sufficient. Evidence of the value of the award to the winners is seen in their mentioning it in advertising. Thus, applicants for the award should be willing to pay entry fees sufficient to replace federal funding for the award. The primary argument for retaining the program is that it promotes U.S. competitiveness in the business, education, health care, and nonprofit sectors.

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#### 370-3—Mandatory

## Permanently Extend the Federal Communications Commission's Authority to Auction Licenses for Use of the Radio Spectrum

						То	tal	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays	0	0	0	35	-150	-115	-895	
Note: Proceeds from spectrum auctions are recorded in budget function 950 as undistributed offsetting receipts.								

In 1993, the Federal Communications Commission (FCC) was first granted limited authority to assign radio spectrum licenses through competitive bidding. The Balanced Budget Act of 1997 required the FCC to auction licenses when more than one private applicant sought a license. From 1994 through 2009, those auctions generated about \$55 billion in federal receipts.

This option would permanently extend the FCC's authority, now set to expire in 2012, to auction radio spectrum licenses, producing more than \$900 million in additional offsetting receipts (which are credited against direct spending) over the next decade. Conducting the auctions would cost the FCC about \$35 million in 2013 in direct spending, reducing the net from the auctions to about \$895 million over the next 10 years. The auction proceeds probably would not be recorded until the following year.

One rationale for this option is that competitive bidding places licenses directly in the hands of the parties that value them most, so the process is more efficient than are the older methods of assignment either by lottery or as the result of a comparative hearing. (In a comparative hearing, a license-seeking entity makes its case to the FCC in terms of the "public-interest standard," an imprecise criterion by which authority to use the spectrum would go to parties that, from society's point of view, would make the best use of it.) Moreover, the auction receipts would compensate the public for the private use of the radio spectrum.

Making more radio spectrum available for commercial applications through auctions has returned substantial economic and social dividends to the nation. Between 1995 and 2008, cellular telephone companies with licenses for the radio spectrum have increased cell phone subscriptions eightfold, to 270 million. The economic value generated exceeds \$140 billion annually. Furthermore, the growth of services continues apace: Providers of mobile access to the Internet, according to industry estimates, had more than 40 million subscribers in 2008, double the number in 2006. The growth in mobile data users and uses will be matched by increased demand for spectrum. Without additional spectrum, users in the densest areas could experience congestion.

Opponents of extending the FCC's authority maintain that the auctions no longer advance competition in the markets for telecommunications services. Rather, in major cities, the prices for the right to use the radio spectrum are so high that only very large companies can afford the licenses. Thus, new companies cannot enter the highly concentrated markets that provide high-speed Internet access, much less compete with the local telephone and cable companies that dominate those markets. (In smaller markets, the winning bids tend to be much lower, so there is easier entry in places where the need for additional providers of high-speed Internet access is greatest.) Another argument against the option is that the prospect of auction receipts has caused the FCC to allocate too little of the radio spectrum to unlicensed uses, such as wireless Internet access. (The use of unlicensed spectrum is especially attractive for Internet access in rural areas because it is difficult for service providers to acquire the right to use licensed spectrum in small quantities.) However, the agency has allocated additional spectrum for unlicensed uses several times since 1993 and is currently considering other allocations for such uses. The FCC also is looking into allowing more use of unlicensed low-power devices that can share parts of the spectrum primarily allocated for licensed use without causing significant interference.

RELATED CBO PUBLICATIONS: Small Bidders in License Auctions for Wireless Personal Communications Services, October 2005; and Where Do We Go from Here? The FCC Auctions and the Future of Radio Spectrum Management, April 1997

Guarantees

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-1	-3	-4	-6	-7	-21	-80	
Outlays	-1	-3	-4	-6	-7	-21	-80	

Impose Fees on the Small Business Administration's Secondary Market

#### 370-4—Discretionary

### Through its 7(a) program, the Small Business Administration (SBA) guarantees 50 percent to 75 percent of the principal amount of qualifying loans to small businesses. Banks and other lenders often pool the guaranteed portions of such loans and then sell investors trust certificates that represent claims to the cash flows. That is, the guaranteed portions of the loans are "securitized"-they are turned into tradable securities. Under authority provided in the Small Business Secondary Market Improvement Act of 1984, SBA provides a secondary guarantee of the trust certificates-guaranteeing timely payments on the certificates if the borrowers' payments are late. Consequently, through the Secondary Market Guarantee Program, SBA is taking on risk in addition to the initial guarantee of payment of the principal and interest in the event that borrowers default and the agency purchases the loans. That additional guarantee makes the securities more valuable to investors, who are, as a result, willing to pay more for them. Under current law, SBA charges no fee for the 100 percent secondary market guarantee.

This option would impose an annual charge of 10 basis points (10 cents per \$100 of principal) on the outstanding guaranteed principal for SBA's new secondary market guarantees, thereby reducing the program's subsidy rate. On the basis of the loan volume reported by SBA for 2008, the proposed charge would increase federal offsetting collections (which are credited against discretionary spending) by \$1 million in 2010 and by \$21 million over five years. The main advantage of this option is that the new fees would provide SBA with funding to cover the cost of honoring secondary market guarantees. Specifically, when a borrower is late in making a loan payment, SBA makes the payment on schedule to the holders of the trust certificates, but the program incurs interest costs. The new fees would offset those costs. To make payments, SBA has drawn from funds intended for repayments of principal that must eventually be made to trust certificate holders, along with accrued interest. Thus, the Secondary Market Guarantee Program has a budgetary shortfall, which apparently derives from SBA's investment of deferred payments of principal to certificate holders in risk-free Treasury securities while those balances are accruing interest at the higher certificate rate. Another advantage of the option is that it would level the playing field with other federally guaranteed securities, such as those insured for timely payment by the Government National Mortgage Association, or Ginnie Mae, for which a fee is collected.

A disadvantage of this option is that it could decrease the attractiveness of SBA loans to lenders and thereby inhibit the flow of funds to small businesses. Recent legislation has sought to make borrowing and lending easier, and the imposition of a new fee is contrary to those efforts. Specifically, the American Recovery and Reinvestment Act of 2009 (Public Law 111-5) provided funds to eliminate fees on the SBA 7(a) program to encourage borrowers and lenders to get back into the market, and it created a new loan program to fund investors in the secondary market.

RELATED CBO PUBLICATION: Estimating the Value of Subsidies for Federal Loans and Loan Guarantees, August 2004

**400** 

## Transportation

rograms that support the interstate highway system, public transportation projects, aviation, railroads, and water transportation are funded mostly through the Department of Transportation, which distributes grants to state and local governments to help build and maintain transportation infrastructure. Funding for the Federal-Aid Highway Program constitutes about half of the budgetary resources for function 400, but substantial amounts also go to air traffic control and Coast Guard operations. Research in aeronautics sponsored by the National Aeronautics and Space Administration also is included in this category.

The Congressional Budget Office estimates that outlays for function 400 will total \$88.4 billion in 2009, mostly for discretionary spending. The amounts of discretionary budget authority are smaller than discretionary outlays, however, because many transportation programs are funded by contract authority (a mandatory form of budget authority) provided in authorizing legislation. Spending of that contract authority is controlled each year by obligation limitations set in appropriation bills. The American Recovery and Reinvestment Act of 2009 (ARRA, Public Law 111-5) provided almost \$50 billion in discretionary budget authority for a variety of transportation programs. That amount includes almost a year's worth of funding for highways and transit programs. CBO estimates that most of the outlays from those funds will occur over the next five years.

Notwithstanding ARRA, spending under function 400 has almost doubled in the past decade, largely because of substantial growth in outlays for the federal-aid highway program. Spending for highway, transit, and highway safety programs is authorized through the end of 2009, as is spending for aviation programs. CBO's baseline projections assume that the Congress will enact legislation to extend those programs when they expire.

Federal S	pending,	, Fiscal Y	ears 200	04 to 20	09 (Billi	ions of nom	inal dollars)		
						Estimate	Average Annual Rate of Growth (Percent		
	2004	2005	2006	2007	2008	2009	2004–2008	2008–2009	
Discretionary Budget Authority	23.6	25.5	28.8	27.4	28.8	80.1 <sup>a</sup>	5.1	178.5	
Outlays									
Discretionary	62.8	66.1	68.9	71.2	76.0	86.3	4.9	13.4	
Mandatory	1.8	1.8	1.4	1.7	1.6	2.1	-3.9	35.0	
Total	64.6	67.9	70.2	72.9	77.6	88.4	4.7	14.0	

a. Includes \$49.5 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 400, SEE THE FOLLOWING REVENUE OPTIONS:

Revenue Option 52	Increase Excise Taxes on Motor Fuels
Revenue Option 53	Make Permanent the Partial Excise Tax Exemption for Biofuels
Revenue Option 60	Impose Fees for Use of the Inland Waterway System
Revenue Option 63	Charge Fees to Offset the Cost of Federal Rail Safety Activities
Revenue Option 64	Increase Registration Fees for the Federal Aviation Administration

400

### 400-1—Discretionary and Mandatory

						Total			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Spending									
Obligation limitations	-32,829	-7,879	-7,795	-7,667	-7,699	-63,869	-107,308		
Outlays	-8,864	-15,587	-10,588	-8,168	-8,176	-51,383	-92,983		

### Reduce Highway Funding to Maintain Positive Balances in the Highway Trust Fund

Note: Outlays for the highway program are controlled by limitations on obligations set in appropriation acts rather than by contract authority (a mandatory form of budget authority) set in authorizing law. This option assumes that the contract authority is reduced to equal the obligation limitations presented here.

The Federal-Aid Highway Program provides grants to states for highways and other surface transportation projects. When the Congress last reauthorized the program in 2005, it substantially increased highway funding, which is provided in the form of contract authority, a type of mandatory budget authority. However, most spending from the program is controlled by annual limitations on obligations set in appropriation acts. From 1992 to 1997, those limitations averaged \$18 billion per year; from 1998 to 2008, they averaged \$32 billion per year. In 2008, outlays from the Highway Trust Fund, an accounting mechanism in the federal budget that is credited with revenues generated by the federal gasoline tax and with other federal taxes related to highway transportation, totaled \$37 billion. At the end of 2008, the Congress supplemented revenues dedicated to the trust fund with a transfer of \$8 billion from the Treasury's general fund that allowed the Department of Transportation to meet obligations to the states in a timely manner. The American Recovery and Reinvestment Act of 2009 (Public Law 111-5) appropriated \$27.5 billion more for the program to be provided from the general fund; that law will increase outlays by \$10 billion in 2010 and about \$9 billion in 2011.

This option would shift more responsibility for funding the highway system to the states by lowering the obligation limitation for the Federal-Aid Highway Program after fiscal year 2009 to maintain a balance of at least \$5 billion in the highway account of the Highway Trust Fund. The federal taxes that directly fund the Highway Trust Fund would not change. One implication is that a state that judges spending beyond that paid for by the federal program to be beneficial would have to fund that spending with its own resources.

This option would decrease resources for the highway program by about 25 percent over the next 10 years. It would decrease outlays by about \$8.9 billion in 2010 and by more than \$51 billion through 2014.

The principal rationale for this option is found in the observation by some highway analysts that decisions about spending are more effectively made by states and localities, where most of the benefits accrue, than by the federal government. Under this benefits principle, it could be considered appropriate to shift responsibility for funding those projects from the federal government to the states. Nearly two-thirds of all highway travel occurs in urban areas, and most of that traffic is local. If states were to shoulder more building and maintenance costs, they could raise revenues for projects according to their needs and avoid incentives to use federal funding for projects that might offer fewer net benefits. Federal highway spending can displace spending by state and local governments and, in some cases, by the private sector. The Government Accountability Office reported in 2004 that the existence of federal grants has tended to cause state and local governments to reduce their own spending on highways and to allocate those funds for other uses.

An argument against this option is that the nation could require additional highway capacity to meet the demands of economic activity and that the federal government has a responsibility to pay for maintaining an adequate highway system to facilitate interstate commerce and ensure the safety on the nation's highways.

RELATED CBO PUBLICATIONS: *Using Pricing to Reduce Traffic Congestion*, March 2009; *Issues and Options in Infrastructure Investment*, May 2008; and Statement of Donald B. Marron, Congressional Budget Office, before the Subcommittee on Highways, Transit, and Pipelines, House Committee on Transportation and Infrastructure, *CBO's Projections of Revenues for the Highway Trust Fund*, April 4, 2006

	Emimale the New Starts Transit Program												
	Total												
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019						
Change in Spending													
Budget authority	-1,825	-1,836	-1,847	-1,856	-1,873	-9,237	-19,016						
Outlays	-274	-823	-1,193	-1,473	-1,702	-5,465	-14,896						

### 400-2—Discretionary

Under the New Starts program, the Department of Transportation funds the construction or expansion of rail and other fixed-guideway systems—mass transit systems that use exclusive or controlled rights of way. A related program, Small Starts, makes discretionary grants to public transportation capital projects that cost less than \$250 million and require less than \$75 million in federal funding. For 2009, including \$750 million in the American Recovery and Reinvestment and Act of 2009 (Public Law 111-5), the Congress appropriated a total of \$2.6 billion for both programs, of which \$200 million was specifically for Small Starts.

Fliminate the New Starts Transit Program

This option would eliminate New Starts, including Small Starts, to save about \$274 million in 2010 and almost \$5.5 billion over the next five years.

One rationale for ending the programs is that new rail transit systems tend to provide less value per dollar spent than bus systems do. Bus systems require much less capital and offer more flexibility in the adjustment of schedules and routes to meet changing demands. Moreover, supporters of the option argue, it is inappropriate and inefficient to have the federal government dictate how communities spend federal aid for transit because local officials know more about local needs and priorities than federal agencies do. Even without New Starts, state and local governments could use federal aid distributed by formula grants (noncompetitive awards based on a formula) for new rail projects. In 2009, the federal government provided \$8.3 billion in formula funding for transit projects, of which about \$4.1 billion was designated for the modernization of existing fixed-guideway systems, about \$3.9 billion was allocated in broad "urbanized area" grants for existing and new systems, and \$1.7 billion was designated for the maintenance and improvement of existing fixed-guideway systems.

One rationale against this option is that New Starts seeks to identify the most promising rail transit projects from a long list of candidates. Supporters of rail transit systems point out that ridership has risen in response to recent increases in gasoline prices. They also assert that building new roads does not alleviate urban congestion or pollution but leads only to greater decentralization and sprawl. New rail transit systems, by contrast, could help channel future commercial and residential development into corridors where public transportation is available, offering people convenient, affordable, and reliable transportation between home and work.

RELATED CBO PUBLICATION: Issues and Options in Infrastructure Investment, May 2008

Reduce the Federal Subsidy for Amtrak												
						Total						
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Spending												
Budget authority	-202	-203	-204	-205	-207	-1,021	-2,102					
Outlays	-202	-203	-204	-205	-207	-1,021	-2,102					

### 400-3—Discretionary

In 1970, when the Congress established the National Railroad Passenger Corporation—or Amtrak—it anticipated subsidizing the railroad for a short time until it became self-supporting. Over the past 35 years, however, the federal subsidy to Amtrak has amounted to approximately \$30 billion cumulatively, despite the direction of the 1997 Amtrak Reform and Accountability Act that the corporation take a more businesslike approach to operations. In 2009, the Congress appropriated about \$1.5 billion for Amtrak, more than a 10 percent increase from 2008.

In addition, the American Recovery and Reinvestment Act of 2009 (Public Law 111-5) appropriated \$1.3 billion for capital grants to Amtrak, \$450 million of which is to be used for security upgrades. That law also appropriated \$8 billion in grants available to the states and to Amtrak to fund high-speed and intercity regional rail service. The President has proposed spending an additional \$1 billion each year for the next five years for such programs.

This option would reduce Amtrak's annual federal subsidy by about \$200 million per year, yielding savings of \$1 billion over five years. The amount is illustrative and was chosen on the basis of the financial gains the railroad could achieve by eliminating some particularly unprofitable routes and services while still making necessary capital and maintenance expenditures. The Inspector General in the Department of Transportation estimates that eliminating sleeper-class service would save Amtrak \$75 million to \$158 million annually, net of lost revenues from customers who would no longer travel by train if sleeper services were discontinued. Still larger savings could accrue from eliminating the five most unprofitable routes, which, according to Amtrak's Route Profitability System, accounted for combined annual losses of close to \$250 million in recent years. This option does not specify any particular change in railroad operations, instead leaving management to determine how to adjust to reduced federal support.

Proponents of this option generally favor having Amtrak function more like a business. They argue that it should cut unprofitable routes and services and focus instead on those that are profitable and in high demand. Only 16 percent of Amtrak's long-distance passengers use sleeper service, at a subsidy that ranged in 2004 from \$269 to \$627 per passenger and exceeded subsidies for coach service by at least 50 percent and sometimes more than 100 percent per route. Cutting routes for which ticket sales do not cover operating costs would save funds and allow management to devote its attention to more profitable, faster growing routes.

Opponents of reducing subsidies generally regard Amtrak as a public service that should be available nationwide. They maintain that passengers on lightly traveled routes have few transportation alternatives and that Amtrak is vital to the survival of small communities along those routes. If Amtrak responded to reduced federal support by cutting unprofitable routes, travelers might be forced to choose other forms of transportation, and states might be put in the position of providing additional subsidies to keep routes operating. Continuing federal support could help Amtrak improve service throughout the system, attract more passengers, and make rail transportation more viable economically. They point out that Amtrak ridership has increased in response to recent gasoline price increases.

RELATED OPTIONS: 400-4, 400-5, and Revenue Option 63

RELATED CBO PUBLICATIONS: Effects of Gasoline Prices on Driving Behavior and Vehicle Prices, January 2008; The Past and Future of U.S. Passenger Rail Service, September 2003; and A Financial Analysis of H.R. 2329, the High-Speed Rail Investment Act of 2001, September 2001

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-1,209	-1,216	-1,223	-1,229	-1,240	-6,117	-12,593	
Outlays	-230	-739	-1,009	-1,136	-1,215	-4,329	-10,677	

### 400-4—Discretionary and Mandatory

### **Eliminate Grants to Large and Medium-Sized Hub Airports**

Under the Airport Improvement Program (AIP), the Federal Aviation Administration provides grants to airports to expand runways, improve safety and security, and make other capital investments. In 2007, about one-third of the grant money went to airports classified, on the basis of the number of passenger boardings, as large and medium-sized. Those airports—currently, there are 67, although the number fluctuates from year to year account for nearly 90 percent of boardings.

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This option would eliminate the AIP's grants to large and medium-sized airports but would continue to provide grants to smaller airports in amounts that match funding in 2007. That year, smaller airports received approximately \$2.2 billion, nearly two-thirds of the \$3.4 billion available under the program. Retaining only that portion of the program would reduce federal outlays by \$230 million in 2010 and by \$4.3 billion through 2014.

Funding for AIP is subject to distinctive budgetary treatment. The program's budget authority is provided in authorization acts as contract authority, which is a mandatory form of budget authority. But because the spending of contract authority is subject to obligation limitations contained in appropriation acts, the resulting outlays are categorized as discretionary.

The main rationale for this option is that federal grants simply substitute for funds that larger airports could raise from private sources. Because those airports serve many passengers, they generally have been able to finance investments through bond issues as well as through passenger facility charges and other fees. Smaller airports may have more difficulty raising funds for capital improvements, although some have been successful in tapping the same sources of funding as their larger counterparts. By eliminating grants to larger airports, this option would focus federal spending on airports that appear to have the fewest alternative sources of funding.

A rationale against ending federal grants to large and medium-sized airports is that the grants could allow the Federal Aviation Administration to retain greater control over those airports by imposing conditions for aid. Such conditions could help ensure that the airports continued to make decisions about investments and operations that would promote safe and efficient aviation.

**RELATED OPTION: 400-5** 

RELATED CBO PUBLICATIONS: Financing Small Commercial-Service Airports: Federal Policies and Options, April 1999; and The Economic Effects of Federal Spending on Infrastructure and Other Investments, June 1998

Eliminate the Essential Air Service Program												
Total												
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Spending												
Budget authority	-124	-124	-125	-125	-126	-624	-1,269					
Outlays	-99	-124	-125	-125	-126	-599	-1,244					
Note: Under current law, the Essential Air Service program receives mandatory and discretionary budget authority.												

### 400-5—Discretionary and Mandatory

The Essential Air Service program was created by the Airline Deregulation Act of 1978 to maintain airline service to communities that were receiving federally mandated service before deregulation. The program subsidizes air carriers serving small communities that meet certain criteria (such as being at least 70 miles from a large or medium-sized hub airport, except in Alaska and Hawaii, where separate rules apply). Those subsidies currently support air service to 149 U.S. communities, including 43 in Alaska. In fiscal year 2008, the average subsidy per passenger ranged from \$22 in Scottsbluff, Nebraska, to \$851 in Alamogordo, New Mexico. The Congress has directed that such subsidies not exceed \$200 per passenger unless the community is more than 210 miles from the nearest large or medium-sized hub airport.

This option would eliminate the Essential Air Service program, reducing outlays by \$99 million in 2010 and by \$599 million over five years. (The previous

RELATED OPTIONS: 400-3, 400-4, and 400-6

Administration had proposed restructuring the program by reducing funding and modifying eligibility criteria.)

One rationale for implementing this option is the program's high cost per passenger. Another is that the Essential Air Service program was intended, more than 25 years ago, to be a transitional program that would give communities and airlines time to adjust to deregulation. Still another is that if states or communities derive benefits from subsidized air service, they could provide the subsidies themselves.

A rationale against eliminating the program is that it alleviates isolation of rural communities. Because the availability of airline transportation is an important ingredient in the economic development of small communities, towns without the benefit of such service might lose a sizable portion of their economic base.

Increase Fees for Aviation Security											
	Total										
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Outlays	-1,780	-1,820	-1,850	-1,890	-1,930	-9,260	-19,490				

### 400-6—Discretionary

The attacks of September 11, 2001, led to sweeping changes in the nation's transportation systems to increase security. One major change occurred as the Aviation and Transportation Security Act of 2001 made the federal government, rather than airlines and airports, responsible for screening passengers, carry-on luggage, and checked baggage. Implementing the new standards required the hiring of screeners who were more highly qualified and trained, necessitating increased compensation and raising overall costs to the government.

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To help pay for increased security, the law authorized airlines to charge passengers \$2.50, capped at \$5 for a oneway trip, each time they boarded a plane. The 2001 law also authorized the government to impose fees on the airlines themselves and to provide funding to reimburse airlines, airport operators, and service providers for the additional costs of security enhancements. According to estimates developed by the Congressional Budget Office, the Transportation Security Administration would collect about \$2.5 billion from such fees in 2009—less than half of the federal funding provided for aviation security activities in that year.

This option would increase fees to cover a greater portion of the federal government's costs for aviation security. Passengers would pay a flat fee of \$5 per one-way trip, because travelers typically pass through security screening only once per one-way trip. Implementing the option would boost collections (and thus reduce net spending) by about \$1.8 billion in 2010 and by nearly \$9.3 billion through 2014. Under standard budgetary treatment, the collections would be classified as revenues, but because the Aviation and Transportation Security Act requires that revenues from the existing fees be recorded as offsets to federal spending, this option would treat the additional fees the same way.

The arguments for and against this option rest on the principle that the beneficiaries of a service should pay for it. The differences lie in who is seen as benefiting from such measures. A justification for the option is that the primary beneficiaries of transportation security enhancements are the users of the system. Security is viewed as a basic cost of airline transportation, in the same way that fuel and labor costs are. The current situation, in which those costs are covered partly by taxpayers in general and partly by users of the aviation system, provides a subsidy to air transportation.

Conversely, the rationale against higher fees is that the public in general—not just air travelers—benefits from improved airport security. To the extent that greater security reduces the risk of terrorist attacks, the entire population is better off. That reasoning suggests that the federal government should fund the enhanced transportation security measures without collecting additional funds directly from the airline industry or its customers.

**RELATED OPTIONS: 400-5 and Revenue Option 64** 

Impace Food on Users of the St. Lewronce Seeway												
Impose Fees on Users of the St. Lawrence Seaway												
					Total							
2010	2011	2012	2013	2014	2010-2014	2010-2019						
-12	-25	-25	-26	-26	-114	-249						
	2010	2010 2011	2010 2011 2012	2010 2011 2012 2013	2010 2011 2012 2013 2014	To 2010 2011 2012 2013 2014 2010-2014						

**400-7—Discretionary or Mandatory** 

Note: Fees collected under this option could be recorded in the budget as offsetting collections (discretionary) or as offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

The St. Lawrence Seaway Development Corporation (SLSDC) was established in 1954 to operate and maintain the U.S.-controlled portion of the seaway between the Port of Montreal and Lake Erie. The SLSDC is a federal agency within the Department of Transportation that collected commercial tolls to fund operation and maintenance costs from 1959 until the establishment of the harbor maintenance tax in the Water Resources Development Act of 1986. Revenues from the tax, which is levied on imports and domestic shipments at Great Lakes and coastal ports, are credited to the Harbor Maintenance Trust Fund (HMTF). An appropriation from the HMTF currently funds operation and maintenance costs on the seaway.

This option would reestablish commercial tolls on the portion of the St. Lawrence Seaway governed by the United States to cover operation and maintenance costs incurred by the SLSDC. It also would terminate appropriations from the HTMF. By reestablishing such a fee, the SLSDC would operate in the same manner as its Canadian counterpart, the St. Lawrence Seaway Management Corporation, which charges commercial tolls on the Canadian portion of the seaway. Adopting this option would generate \$12 million in receipts for 2010 and \$114 million over the 2010–2014 period.

The main rationale for this option is that users would be required to pay the SLSDC directly for the services they use. In particular, exporters—subsidized under the current system—would be put on an equal footing with importers and domestic shippers. The option's businesslike approach would create incentives for all users to economize on their use of seaway services, thus improving efficiency.

A rationale against reintroducing such fees is that tolls could harm the Great Lakes shipping industry, particularly exporters, who currently are not taxed for their use of the U.S. portion of the seaway. Some importers and shippers of domestic goods that already contribute to operation and maintenance costs through the harbor maintenance tax might be required to pay additional fees. The application of the harbor maintenance tax to those users of Great Lakes ports could be repealed to avoid duplicative charges, but doing so would reduce or eliminate the option's savings.

RELATED OPTIONS: 300-1 and Revenue Options 60 and 64

RELATED CBO PUBLICATION: Paying for Highways, Airways, and Waterways: How Can Users Be Charged? May 1992

# 450

## **Community and Regional Development**

he federal government funds programs that promote the economic viability of communities, encourage rural development, and assist in the nation's disaster preparedness and response. Function 450 includes funding for flood insurance and disaster relief, homeland security grants to pay state and local governments' first responders, the Community Development Block Grant program, credit assistance to rural communities, and programs that assist Native Americans.

Federal spending for function 450 peaked in 2006, reflecting immense recovery efforts undertaken in the

aftermath of the hurricanes that struck the Gulf Coast in 2005. With the conclusion of many of those activities, spending in 2008 was 56 percent lower than in 2006. Outlays in 2009 are expected to increase to about \$30 billion, mainly as a result of the more active hurricane season in 2008. Moreover, the provision of an additional \$8.2 billion for this function in the American Recovery and Reinvestment Act of 2009 (Public Law 111-5) will keep spending for this function slightly elevated over the next few years.

Federal Spending, Fiscal Years 2004 to 2009 (Billions of nominal dollars)													
						Estimate	Average Annual Rate of Growth (Percent)						
	2004	2005	2006	2007	2008	2009	2004-2008	2008-2009					
Discretionary Budget Authority	17.4	82.4 <sup>a</sup>	14.0	17.9	37.9	23.1 <sup>b</sup>	21.5	-39.2					
Outlays													
Discretionary	15.7	24.9	38.3	29.6	24.1	26.3	11.4	9.2					
Mandatory	0.2	1.3	16.2	*	-0.2	3.7	n.a.	n.a.					
Total	15.8	26.3	54.5	29.6	23.9	30.1	10.9	25.6					

Note: \* = between zero and \$50 million; n.a. = not applicable (because of a zero or negative value in the first or last year).

a. Most of the budget authority reflects \$60 billion in supplemental funding for the 2005 Gulf Coast hurricanes.

b. Includes \$8.2 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

#### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 450, SEE THE FOLLOWING REVENUE OPTION:

Revenue Option 38 Limit or Eliminate Tax-Exempt Private-Activity Bonds

«CBO»

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						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-514	-518	-521	-523	-528	-2,604	-5,360	
Outlays	-5	-135	-400	-500	-510	-1,550	-4,210	

### 450-1—Discretionary

## Drop Wealthier Communities from the Community Development Block Grant Program

The Community Development Block Grant (CDBG) program provides annual grants to communities to aid low- and moderate-income households, eliminate municipal blight, meet emergency needs, rehabilitate housing, improve infrastructure, and promote economic development. Under one component of the program, grants go directly to cities and urban counties, referred to as entitlement communities. (Other CDBG funds are allocated to states, which typically distribute them by a competitive process to smaller, more rural communities, known as "nonentitlement areas.") Funds from the entitlement component also may be used to repay bonds that are issued by local governments and guaranteed by the federal government under the Section 108 loan guarantee program. For 2009, the CDBG program received appropriations of \$4.6 billion, including \$1.0 billion provided in the American Recovery and Reinvestment Act of 2009 (Public Law 111-5); \$3.2 billion is for entitlement communities.

Under current law, the CDBG entitlement program is open to all urban counties, principal cities of metropolitan areas, and cities with a population of at least 50,000. The program allocates funds according to a formula based on a community's population, the number of residents whose income is below the poverty line, the number of housing units with more than one person per room, the number of housing units built before 1940, and the extent to which population growth since 1960 is below the average for all metropolitan cities. The formula does not require that a certain percentage of residents have income below the poverty line, nor does it exclude communities with high average income. A 2003 analysis from the Department of Housing and Urban Development, which administers the CDBG program, showed that funding under the formula shifted from poorer to wealthier communities, as measured by average poverty rates, when population data and other information were updated using results from the 2000 census.

This option would focus CDBG entitlement grants on needier areas and reduce funding accordingly. The option could be implemented in a variety of ways, but one approach would be to exclude communities whose per capita income exceeds the national average by more than a specified percentage. For example, restricting the grants to communities whose per capita income was less than 110 percent of the national average would reduce entitlement funds by 21 percent. To illustrate the general approach, this option would make a slightly smaller cut of 20 percent, which would save \$1.6 billion over five years. (The President's budget for 2010 includes a proposal to improve the formula's targeting of needy communities but does not specify the changes and increases in total spending on the program.)

One argument in favor of this option is that it would reduce a program that should not exist, because it might not be appropriate to use federal funds for local development. An alternative argument is that even if the CDBG program can be justified because of its redistributive effects, redirecting money to wealthier communities serves no pressing interest.

The main argument against this option is that dropping wealthier communities from the CDBG program could reduce efforts to aid low-income households within those communities unless local governments reallocated their own funds to offset the lost grants.

Eliminate NeighborWorks America											
	Total										
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Spending											
Budget authority	-183	-184	-185	-186	-187	-925	-1,905				
Outlays	-183	-184	-185	-186	-187	-925	-1,905				

### 450-2—Discretionary

NeighborWorks America, a public, nonprofit group officially known as the Neighborhood Reinvestment Corporation, oversees a network of locally initiated and operated groups called NeighborWorks Organizations engaged in activities involving housing, neighborhood revitalization, and community building. The corporation provides technical and financial aid to new Neighbor-Works Organizations and monitors and assists those already established in a network of more than 200 NeighborWorks Organizations in more than 4,400 communities nationwide. For 2009, NeighborWorks America received \$131 million to fund regular operations and \$50 million to mitigate mortgage foreclosures. (It estimated that \$25 million more, 8 percent of its total funding for the year, would come from other sources.)

NeighborWorks America supports the NeighborWorks Organizations through grants, training and education, and publications. Most of the grant money from its regular funding goes to local organizations to purchase, build, and rehabilitate properties and to capitalize revolvingloan funds. Recipients also use the grants to develop programs and cover expenses. The revolving funds make mortgage and home improvement loans to homeowners and also to owners of mixed-use properties who provide long-term rental housing for low- and moderate-income tenants. In recent years, NeighborWorks America and its network partners have focused increasing attention on preventing or mitigating the effects of foreclosures. More than 80 percent of the \$50 million the Congress designated in 2009 for mitigation programs was expected to be disbursed in grants to counseling intermediaries approved by the Department of Housing and Urban Development (HUD), NeighborWorks Organizations, and state housing finance agencies.

This option would eliminate NeighborWorks America, saving \$183 million in 2010 and \$925 million over five years. One rationale for the option is that the federal government should not fund programs that primarily benefit local communities. A second rationale is that Neighbor-Works America is unnecessary. It is a relatively minor source of funding for NeighborWorks Organizations; its grants in 2008 made up 22 percent of their government funding and 5.5 percent of their total funding. Larger shares came from private lenders, foundations, corporations, and HUD. Moreover, other federal programsparticularly those in HUD-also support efforts to rehabilitate low-income housing and promote home ownership and community development. Similarly, if the Congress wished to continue to fund mortgage and financial counseling services for people facing foreclosure, it could do so without channeling the money through NeighborWorks America.

An argument against this option is that the large number of federal programs attests to widespread support for a federal role in local development, especially where state and local governments lack adequate resources. In that view, it would be inappropriate to reduce such programs at a time of historically high foreclosure rates. Neighbor-Works America may have special value among federal programs because it has flexibility in making grants and because it provides NeighborWorks Organizations with training, program evaluation, and technical assistance. The program also helps to identify successful local efforts, publicize them, and reproduce them elsewhere across the nation. The NeighborWorks Center for Foreclosure Solutions, for example, was modeled on Neighborhood Housing Services of Chicago, a NeighborWorks affiliate. The extra funding for foreclosure mitigation NeighborWorks America received in 2009 reflects the value lawmakers place on its abilities and expertise.

						Total			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Spending									
Budget authority	-96	-108	-109	-109	-110	-532	-1,110		
Outlays	-29	-90	-103	-106	-107	-435	-995		

### 450-3—Discretionary

## Eliminate the Community Development Financial Institutions Fund

The Community Development Financial Institutions (CDFI) Fund was created in 1994 to expand the availability of credit, investment capital, and financial services in distressed communities. Administered by the Treasury Department, the fund provides equity investments, grants, loans, and technical assistance to CDFIs, which include community development banks, credit unions, loan funds, venture capital funds, and microenterprise funds. Those institutions in turn provide financial services, including mortgage financing for first-time home buyers, loans and investments for new or expanding small businesses, and credit counseling, in markets that are underserved by traditional institutions. The CDFI Fund also provides incentive grants to traditional banks and thrift institutions to invest in CDFIs and to increase loans and services to distressed communities. Since 2002, the fund has administered the New Markets Tax Credit (NMTC) program, which provides federal tax credits for qualified investments in organizations that are certified as "community development entities." The CDFI Fund received appropriations of \$207 million in 2009, including \$100 million from the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

This option would eliminate the CDFI Fund, reducing discretionary outlays by \$29 million in 2010 and by \$435 million through 2014. That estimate of savings subtracts the small amount of additional spending that would be required to have other agencies oversee the fund's existing loan portfolio and administer the NMTC program.

One argument in favor of this option holds that local development should be financed by state or local governments, not by the federal government, because its benefits are not national. Another argument asserts that the CDFI Fund is a relatively small and redundant channel for federal assistance; other federal agencies and programs that support home ownership and economic development include the housing loan programs of the Rural Housing Service, the Community Development Block Grant program, the Neighborhood Reinvestment Corporation, and the Economic Development Administration. Furthermore, assistance to CDFIs might be inefficient because it encourages loans that would otherwise not pass market tests for creditworthiness.

The primary argument against this option is that the federal government has a legitimate role in assisting needy communities, some of which lack access to traditional sources of credit. By helping existing CDFIs and stimulating the creation of others, the fund might provide an effective way to leverage private-sector investment with a relatively small federal contribution. Moreover, there is a greater need now for the services provided by CDFIs, given the recent increase in housing foreclosures and the overall weakened state of the credit markets. Consistent with that view, the President's budget for 2010 calls for doubling funding for the CDFI Fund.

RELATED OPTIONS: 450-1 and 450-2

RELATED CBO PUBLICATION: Policy Options for the Housing and Financial Markets, April 2008

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-5	-8	-11	-14	-19	-57	-2,965
Outlays	*	-2	-5	-7	-10	-24	-1,620

**Create State Revolving Funds to Finance Rural Water and Waste Disposal** 

### 450-4—Discretionary

The Department of Agriculture assists rural communities through a program that provides loans, loan guarantees, and grants for water and waste disposal projects. It also offers grants for solid waste management, emergency community water assistance, and technical assistance. The program received appropriations of \$538 million for 2009, plus an additional \$1.38 billion in the American Recovery and Reinvestment Act of 2009 (Public Law 111-5). The appropriation funds the program's grants and covers the cost of its loans and loan guarantees; that cost is defined under the Federal Credit Reform Act as the present value of interest rate subsidies and expected defaults.

The program's funds generally are allocated among states on the basis of rural populations and the number of rural families with income below the poverty level. The Department of Agriculture awards funds competitively to eligible state and local agencies, recognized Native American tribes, and nonprofit organizations. The terms of assistance generally depend on the median household income in a grant recipient's area. Thus, the interest rate on direct loans for water and waste disposal projects ranges from 60 percent to 100 percent of the market yields on municipal bonds covering similar periods. Areas that are particularly needy may apply for grants or combinations of grants and loans.

This option would reduce federal spending by capitalizing state revolving funds for rural water and waste disposal and then ending federal assistance. The amount of federal savings would depend on the amount and timing of the contributions to the revolving funds. Under one approach, the federal government would provide \$538 million annually for five years and then cut off assistance in 2015. That approach would yield savings of \$24 million over five years and \$1.6 billion through 2019. The capitalization would not by itself allow states to provide the current level of grants and loans, but the Congress could allow the revolving funds to use their capital as collateral to leverage private-sector financing. The state revolving funds established under the Clean Water Act and the Safe Drinking Water Act provide a model.

The rationale for this option is that the federal government should not bear continuing responsibility for local development; programs that benefit communities, whether urban or rural, should be funded by state or local governments. The rationale for the specific approach in this option is that it is reasonable to provide funding for a few years to capitalize revolving funds before they become self-sustaining.

One argument against this option is that states might change their aid formulas (substituting loans for grants or high-interest loans for low-interest loans) to avoid depleting the funds and to recoup the costs of leveraged financing. That action could price the aid out of reach of needier communities. In addition, the estimated federal savings might not materialize: The Congress continues to appropriate grants to the state funds for wastewater treatment systems, although the original authorization for those grants has expired, and it might also continue to fund rural water and waste disposal after the capitalization period. Finally, the program has been rated "effective" by the Office of Management and Budget.

### RELATED OPTION: 300-9

Eliminate Regional	Eliminate Regional Development Agencies											
	Total											
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Spending												
Budget authority	-101	-102	-102	-103	-104	-512	-1,052					
Outlays	-14	-47	-73	-90	-102	-326	-875					

### 450-5—Discretionary

The federal government provides annual funding to three regional development agencies: the Appalachian Regional Commission (ARC), the Denali Commission, and the Delta Regional Authority. The ARC was established in 1965 to promote economic growth in the Appalachian counties of 13 states, stretching from southern New York to northern Mississippi. The Denali Commission was created in 1998, on the ARC model, to provide similar services to communities in remote areas in Alaska. The Delta Regional Authority, established in 2000, similarly serves 240 counties and parishes in eight states near the Mississippi River, stretching from southern Illinois to the Louisiana coast. For 2009, the Congress appropriated \$75 million for the ARC, \$12 million for the Denali Commission, and \$13 million for the Delta Regional Authority.

This option would discontinue federal funding for all three regional development agencies, reducing discretionary outlays by \$14 million in 2010 and by \$326 million over five years.

The three agencies' programs are intended, among other things, to create jobs, improve rural education and health care, develop utilities and other infrastructure, and provide job training. However, it is difficult to assess whether such outcomes can be attributed to those programs rather than to the work of other governmental and nongovernmental organizations or to market forces and the effects of general economic conditions. An argument in favor of this option is that ending federal funding of the agencies would shift more responsibility for supporting local or regional development to the states and communities whose citizens benefit most from that development. Another rationale is that Appalachia, rural Alaska, and the Mississippi Delta are three among many needy regions in the United States, and they should not have a special claim to federal support. In that view, any federal development aid they do receive should come from nationwide programs, such as those overseen by the Economic Development Administration.

The main arguments against this option are that the federal government has a legitimate role in redistributing funds among states to support development in the neediest areas and that cutting federal funding would reduce local progress in education, health care, and job creation. Also, Appalachia, rural Alaska, and the Mississippi Delta arguably merit special attention because of the extent of their poverty. An additional argument against eliminating the Delta Regional Authority is that established organizations are needed to continue the redevelopment of the southern end of the Mississippi Delta, which still suffers from devastation caused by Hurricanes Katrina and Rita. Also, some observers could assert that funding for the Denali Commission has been cut enough, declining from \$50 million in 2007 to \$12 million in 2009.

Restrict First-Responder Grants to High-Risk Communities											
						Total					
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Spending											
Budget authority	-161	-162	-163	-164	-165	-815	-1,676				
Outlays	-6	-31	-73	-105	-138	-353	-1,168				

### 450-6—Discretionary

<b>Restrict First-Responder Grants to</b>	High-Risk Communities
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The Department of Homeland Security (DHS) issues grants to state and local governments to help police, firefighters, and other first responders prepare for, prevent, respond to, and recover from terrorist attacks and other disasters. The grants pay for equipment and services such as chemical suits, cargo scanners at ports, and biohazard training. For 2009, the Congress appropriated about \$3.1 billion for the grants, of which \$861 million will be distributed in a competitive process by the State Homeland Security Grant Program (SHSGP). By 2012, each state, the District of Columbia, and Puerto Rico is to receive no less than 0.35 percent of the appropriation. (The four U.S. territories are each guaranteed at least 0.08 percent.) Because of the requirement that each state receive a minimum allocation, final awards might not fully reflect some communities' potential attractiveness as targets for terrorists' attacks or the scale of human and economic loss an attack might cause.

This option has two components: The first is to eliminate the minimum allocation for first-responder grants under the SHSGP. All funding decisions therefore would be made by criteria that reflect risk and effectiveness. That approach would be similar to the process DHS uses to allocate funds to the Urban Areas Security Initiative and other discretionary first-responder grants. The second component would cut appropriations to the program by 18.5 percent (the total share of funding guaranteed by the minimum allocation under current law). The option would save \$6 million in 2010 and \$353 million over five years.

Proponents of eliminating the minimum allocation argue that many grants now go to communities with small and dispersed populations, little critical economic activity, and few evident targets for terrorists. Those communities are considered less likely to be attacked and, if they were, less likely to sustain large losses. Supporters of altering the funding mechanism also point out that not all the money currently available has been spent: For all state and local grant programs administered by the Federal Emergency Management Agency, including SHSGP, more than \$7.3 billion in prior-year funding had not yet been disbursed as of September 30, 2008. And according to some observers, the money that was spent yielded little improvement in national security, either because the spending did not enhance emergency preparedness or because it simply replaced other sources of funding for continuing preparedness efforts.

Opponents of changing the current allocation note that DHS already funds other security programs (such as those at airports, seaports, and other transportation centers) that selectively benefit communities where the risks of attack and loss could be greater. In addition, businesses and federal regulatory programs are working to help protect prime targets in those communities. Thus, opponents of this option argue that continuing to issue firstresponder grants on the basis of geography may help restore balance in the allocation of funding. Moreover, while the potential for terrorist attacks may be greater in some areas than in others, funding from SHSGP also helps mitigate the costs of crime, fire, storms, floods, or earthquakes. Advocates of that view support legislation that would broaden the uses for DHS's first-responder grants to place greater emphasis on preparations for all types of disasters.

RELATED CBO PUBLICATIONS: Federal Reinsurance for Terrorism: Issues in Reauthorization, August 2007; Federal Funding for Homeland Security: An Update, July 2005; and Homeland Security and the Private Sector; December 2004

### 450-7—Mandatory

## Eliminate or Reduce the Flood Insurance Subsidy on Certain Older Structures

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	0	0	0	0	0	0	0
Memorandum:							
Estimated Increase in Premiums Paid							
Phase out over five years all subsidies	40	290	590	890	1,200	3,010	10,725
Phase out over five years subsidies on properties other than primary residences	10	90	175	270	360	905	3,215
Phase out over five years subsidies on severe repetitive loss properties	0	2	6	8	10	26	76
Eliminate subsidies on new policies, including those purchased by new owners	0	55	105	140	175	475	1,765

Note: Under current conditions, net budgetary savings would be zero because the National Flood Insurance Program would spend increased income from premiums to reduce a backlog of claims awaiting payment.

The National Flood Insurance Program (NFIP) charges two sets of premiums to insure buildings and their contents. The first set applies to "pre-FIRM" structures buildings erected before 1975 or before the completion of a community's official flood insurance rate map (FIRM). The other set of premiums applies to "post-FIRM" structures. Post-FIRM premiums are intended to be actuarially sound (that is, to cover the costs of all insured losses over the long term). They are based on a building's elevation relative to the flood level that is thought to have a 1 percent chance of being equaled or exceeded each year in that location. Pre-FIRM rates, by contrast, generally are heavily subsidized and do not take into account a building's elevation.

More than 20 percent of the policies in the flood insurance program, administered by the Federal Emergency Management Agency (FEMA), are priced at subsidized rates. The subsidies are available only for the first \$35,000 of coverage on a one- to four-family dwelling and for the first \$100,000 of coverage on a larger multifamily residential, nonresidential, or small-business building. Additional coverage is available at actuarially sound rates. Taking both the subsidized and unsubsidized tiers into account, FEMA estimates that the average subsidies for buildings and contents amount to roughly 60 percent—that is, premiums represent 40 percent of the actuarial value of the insurance. (The subsidy for a particular building can vary greatly from the average, however, depending on the building's elevation.)

Different approaches could be used to reduce the subsidy, increasing the program's premium income by various amounts-but in themselves, those increases would not lead to any net budgetary savings, the Congressional Budget Office estimates. Currently, the program must use a large portion of its annual premium income to pay debt-service costs on the \$19.3 billion it has borrowed since 2005, and because the remainder is not enough to cover the average annual cost of future claims, a growing backlog of claims awaiting payment is expected. Thus, under current law, the effect of the additional receipts generated by any of the approaches would be to allow the NFIP to pay claims sooner than it could otherwise, and the benefit would go not to the federal Treasury but to flood insurance policyholders. The increase in funds available to pay claims would be smaller than the increase in total premiums paid by policyholders if some of the latter was retained by the private insurance companies that act as the NFIP's sales and servicing agents. Those

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companies now retain about 30 percent of the premiums from the policies they issue; if that percentage were not adjusted downward to compensate for the increase in rates, the net benefit to the NFIP would be about 70 percent of the increase in premiums paid.

A five-year phaseout of the subsidy on all pre-FIRM properties would raise premiums paid by about \$3 billion over the period from 2010 to 2014. That estimate accounts for the likelihood that some policyholders would drop coverage once the subsidy ended. (Flood insurance is voluntary in some cases; where it is required, compliance is far from complete.) Smaller increases in total premiums could be realized by phasing out the subsidy on all insured pre-FIRM structures other than primary residences-in other words, on second and vacation homes, rental properties, and nonresidential buildingsor on "severe repetitive loss properties," those that have experienced four or more losses of at least \$5,000 each or two or more losses that, combined, exceed the value of the property. CBO estimates that the former would increase premiums paid by \$905 million over five years and the latter by \$26 million over the same period. A fourth approach would be to eliminate the subsidy on all new policies, including those purchased by new owners after properties are sold. The estimated five-year increase in premiums for that approach is \$475 million.

Proponents of eliminating the subsidy on at least some pre-FIRM structures argue that the subsidy has outlived its original purpose as a temporary incentive to encourage insurance purchase by property owners who previously were unaware of the magnitude of the flood risks they faced. According to that view, charging actuarial rates on pre-FIRM properties would make those policyholders pay a fair share for insurance protection. It also would give them appropriate incentives either to relocate or to protect their property from flood-related losses.

One argument in favor of the subsidy is that it is unfair to charge full actuarial rates for properties built before FEMA documented the extent of local flood hazards. Also, because actuarial rates would be as much as 10 times the current rates, property owners would face unanticipated financial hardships, and property values would fall in some communities. Actuarial premiums that reduced participation in the program could lead to greater spending on federal disaster grants and loans, thus eroding the projected savings.

Other arguments focus on eliminating or maintaining the subsidies on particular sets of properties. An advantage of phasing out subsidies on all pre-FIRM properties is that doing so would do the most to close the program's actuarial shortfall, reducing the likely need for loans from the Treasury as was required in the aftermath of Hurricanes Katrina and Rita in 2005. (Eliminating all pre-FIRM subsidies could be insufficient to bring the NFIP to actuarial balance to the extent that the premium rates for post-FIRM properties carry some degree of implicit subsidy.)

By contrast, keeping subsidies for primary residences could be justified as improving the program's financial position while focusing the remaining subsidies on structures whose owners might face the greatest hardship in paying actuarial rates. Opponents of that approach note that ending subsidies for rental properties might cause owners to pass increased costs along to renters.

Targeting properties that experience repeated losses could be justified on the grounds that such properties appear to be those whose policies are the most underpriced. But many owners of such properties would face up to 10-fold increases in premiums because of the high risk of flooding. Conversely, some properties in that category might differ from other properties only in having been visited with unusually bad luck, raising the question of whether it is fair to treat them differently.

Finally, arguments for eliminating subsidies only for new policies hold that existing policyholders would not need to adjust to new rates and purchasers should now be aware of the dangers posed by floods, whether the properties are pre- or post-FIRM. Still, large increases in premiums could cause financial hardship by reducing the market value of some pre-FIRM properties.

**RELATED OPTION: 450-8** 

RELATED CBO PUBLICATIONS: *Value of Properties in the National Flood Insurance Program*, June 2007; Statement of Donald B. Marron, Congressional Budget Office, before the Senate Committee on Banking, Housing, and Urban Affairs, *The Budgetary Treatment of Subsidies in the National Flood Insurance Program*, January 25, 2006

450-8—Mandatory

# Reduce the Expense Allowance Retained by Private Insurance Companies in the National Flood Insurance Program

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays	0	0	0	0	0	0	0	
Memorandum:								
Estimated Increase in Premium Income, Net of Allowances	32	35	37	39	42	185	445	

Note: Under current conditions, net budgetary savings would be zero because the National Flood Insurance Program would use the funds not spent on the expense allowance to reduce a backlog of claims awaiting payment.

Almost all policies sold in the National Flood Insurance Program (NFIP) are issued and administered by private insurance agencies that participate in the NFIP's Write Your Own (WYO) program. The program is designed to increase the number of NFIP policies sold, improve service to policyholders, and provide the insurance industry with direct experience handling flood insurance. The WYO companies act as agents for the NFIP, which determines premium rates and underwriting rules and bears sole responsibility for paying claims. Participating companies retain a share of the premiums they collect as an expense allowance; that share-currently 29.7 percentis determined annually by the Federal Emergency Management Agency (FEMA) on the basis of industry expense data for similar lines of insurance (such as fire and homeowners' multiple-peril insurance) as reported by A.M. Best (an insurance- and credit-rating company). The companies also receive 1 percent of the premiums plus 1.5 percent of policyholders' incurred losses as compensation for the general (or overhead) costs associated with servicing claims. (Costs directly associated with a specific claim are compensated according to a fee schedule that increases less than proportionately with the size of the claim.) FEMA's Web site listed 92 participating companies as of March 2009.

This option would direct FEMA to reduce the WYO expense allowance by 1 percentage point but leave policyholders' premiums unchanged. That action would increase premium income, net of the allowances, by \$32 million in 2010 and by \$185 million over five years. (Option 350-3 discusses a similar change in the Department of Agriculture's crop insurance program.) In itself, however, the increase in net premium income would not lead to any net budgetary savings, the Congressional Budget Office estimates. Currently, the program must use a large portion of its annual premium income to pay debt service on the \$19.3 billion it has borrowed since the Gulf Coast hurricanes of 2005; because the remainder is insufficient to cover the average annual cost of future claims, a growing backlog of claims awaiting payment is expected. Thus, under current law, the additional net income generated by this option would allow the NFIP to pay claims sooner than it could otherwise, and the benefit would go not to the federal Treasury but to flood insurance policyholders.

The main argument in favor of this option is that the data FEMA uses to calculate the expense allowance are likely to yield overestimates of the costs that the companies incur as a result of selling NFIP policies. The insurance industry's practice of compensating agents in proportion to the dollar value of the policies sold seems at best to reflect average costs. For example, although differences in elevation (relative to the water level expected in a "100-year flood") can make the insurance premium on one property much higher than that on an otherwise identical property, the differences have no effect on the amount of time involved in selling the coverage. Moreover, even within the traditional percentageof-premium approach, the benchmark data probably overstate WYO costs: Because most flood insurance is sold along with other policies (such as homeowners' insurance), advertising and other marketing costs for flood insurance are minimal. The fact that WYO participation is widespread suggests that FEMA may have room to reduce the expense rate. Also, reducing the expense allowance while leaving the premiums unchanged would slightly reduce the structural deficit built into the NFIP by the subsidized rates charged on older buildings.

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The main argument against this option is that it could lead to the sale of fewer NFIP policies: Insurers that do not receive adequate compensation for their costs might drop out of the program, and some potential purchasers who were no longer able to buy flood insurance in a package from a single agent might not bother to find a second source. The option also could lead to an increase in FEMA's administrative expenses if the number of policies sold directly by the agency increased. Furthermore, if the premiums FEMA charges on its full-risk

RELATED OPTIONS: 350-3 and 450-7

policies (those that are not explicitly subsidized) are actuarially sound, the benefit of reducing the expense allowance on those policies arguably should be passed on to policyholders in the form of reduced premiums, not retained by the NFIP. The problem of the NFIP's structural deficit could be addressed more directly by reducing or eliminating subsidies rather than through hidden cross-subsidies from policyholders who pay full-risk premiums.

# 500

## Education, Training, Employment, and Social Services

rograms of the Departments of Education, Labor, and Health and Human Services provide—or assist states and localities in providing—a variety of services, including developmental services for children in low-income families, programs for elementary and secondary school students, grants and loans for postsecondary students, and general job-training and employment services.

Outlays for function 500 will total about \$73 billion in 2009, the Congressional Budget Office estimates, with about \$95 billion in discretionary spending. For mandatory spending, CBO projects about \$22 billion in savings, \$16 billion of which stems from a large negative credit reestimate in the student loan programs. Between 2004 and 2008, discretionary outlays increased by about 2.2 percent per year; discretionary spending is projected to increase 16 percent in 2009. Part of the increase in discretionary spending is the result of the American Recovery and Reinvestment Act of 2009 (Public Law 111-5), which provided about \$110 billion in discretionary budget authority in 2009, although most of that money will not be spent until fiscal years 2010 and 2011. Spending on education consumes the bulk of the function's discretionary outlays.

Mandatory spending in function 500 is primarily for student loans and grants for higher education, the Social Services Block Grant program, and rehabilitation services and disability research. Mandatory spending varies greatly from year to year because of changes in loan volume (especially for consolidation loans), interest rates, revisions to previous estimates of subsidy costs, and other factors that affect the federal student loan programs. The large increase in outlays in 2006 and decrease in 2009 reflect several of those factors.

						Estimate	Average Annual Rate of Growth (Percent)	
	2004	2005	2006	2007	2008	2009	2004-2008	2008-2009
Discretionary Budget Authority	78.1	79.5	80.3	80.5	80.0	193.6 <sup>a</sup>	0.6	141.9
Outlays								
Discretionary	75.1	79.4	80.2	79.6	82.0	95.0	2.2	15.9
Mandatory	12.8	18.8	38.4	12.1	9.3	-21.6	-7.6	n.a.
Total	88.0	98.2	118.6	91.7	91.3	73.4	0.9	-19.6

### Federal Spending, Fiscal Years 2004 to 2009 (Billions of nominal dollars)

Note: n.a. = not applicable (because of a negative value in the last year).

a. Includes \$109.7 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 500, SEE THE FOLLOWING REVENUE OPTIONS:

Revenue Option 10 Curtail the Deduction for Charitable Giving

- Revenue Option 11 Limit Deductions for Charitable Gifts of Appreciated Assets to the Gifts' Tax Basis
- Revenue Option 12 Create an Above-the-Line Deduction for Charitable Giving
- Revenue Option 13 Eliminate Subsidies for Child and Dependent Care
- Revenue Option 26 Consolidate Tax Credits and Deductions for Education Expenses
- Revenue Option 39 Cap Nonprofit Organizations' Outstanding Stock of Tax-Exempt Bonds

				0			
				То	tal		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-297	-299	-301	-302	-305	-1,504	-3,098
Outlays	-177	-267	-298	-300	-302	-1,344	-2,903

### 500-1—Discretionary

## Eliminate Grants to the States for Safe and Drug-Free Schools and Communities

The states receive grants under the Safe and Drug-Free Schools and Communities Act of 1994 (SDFSCA) to support programs that discourage violence and the use of alcohol, cigarettes, and drugs by young people in and around schools. SDFSCA funding is determined by a state's school-age population and the number of poor children who live in a state. In 2009, funding for state grants totaled \$295 million. The act stipulates that 93 percent of grant funds go to school districts for activities that address violence and drug abuse in schools, but it offers little guidance about what constitutes an effective use of those funds.

This option, which is similar to a proposal in the President's budget request for 2010, would eliminate payments to states under the SDFSCA, reducing federal outlays by about \$1.3 billion for 2010 through 2014.

An argument in support of this option is that evaluations of several programs supported by state grants have failed to demonstrate that those programs reduce the incidence of violence and drug abuse at school. Furthermore, although violence and drug abuse in general are pressing societal issues, they are problems that rarely occur on school grounds. Despite the occasional well-publicized incident, children are more likely to be victims of violence away from school, and drug abuse occurs infrequently on school property, although it is more widespread in schools than is violent crime.

An argument against this option is that individual efforts funded under the SDFSCA could serve to raise public awareness more generally of the problems of drug abuse and violence. Furthermore, if funding for successful programs were eliminated, any resulting escalations in drug abuse and violence might require even more costly interventions by school systems and communities.

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Eliminate Funding for Abstinence-Only Education											
		Total									
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Spending											
Budget authority	-96	-96	-97	-97	-98	-484	-997				
Outlays	-33	-80	-92	-94	-95	-394	-885				

### 500-2—Discretionary

Section 510(b)(2) of Title V of the Social Security Act defines abstinence-only education as having the exclusive purpose of teaching students that social, psychological, and health gains are realized when people abstain from sexual activity outside of marriage. The Community-Based Abstinence Education (CBAE) program awards grants competitively to states and organizations to operate such programs. Grant recipients are prohibited from endorsing or promoting the use of contraceptives.

This option, which is similar to a proposal contained in the President's budget request for 2010, would eliminate CBAE, reducing federal outlays by \$394 million from 2010 to 2014.

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Another source of federal funding for abstinence education programs, originally authorized by the Personal Responsibility and Work Opportunity Reconciliation Act of 1996 (PRWORA), expires in June 2009. Abstinence education projects funded under PRWORA used the same definition for abstinence education as those funded under CBAE and had similar characteristics. Proponents of this option cite a recent evaluation of two urban and two rural abstinence education projects that received funding under PRWORA. More than 2,000 students from across the four locations were randomly assigned either to a treatment group (through enrollment in abstinence-only education) or to a control group. The rural school districts' control groups had only limited sex education available; the two urban districts' control groups received more comprehensive teaching, including information on the use of contraceptives. The four locations

represented a range of implementation settings and strategies. The evaluators concluded that the sexual behavior of young people in the abstinence-only classes was no different from that of students in the control groups. They found that the young people in the treatment and control groups were equally likely to engage in sexual activity, to become sexually active at the same mean age, and to have similar numbers of sexual partners. Students in the treatment and control groups also were equally likely to have engaged in unprotected sex. Because abstinence-only programs are prohibited from teaching about the use of contraceptives to prevent pregnancy, proponents of this option argue, they also prevent students from learning about the use of contraceptives to prevent sexually transmitted diseases.

Opponents of this option argue that there is still insufficient evidence to conclude that abstinence-only education programs are not effective. They assert that the evaluators found that the abstinence-only education programs did increase awareness among young people of the benefits of sexual abstinence and that additional evaluations and different program designs should be considered before a conclusion is made about effectiveness. Opponents also contend that sex education programs that do not exclusively promote abstinence actually encourage sexual activity among students and that the most effective way to prevent pregnancy and sexually transmitted diseases is through abstinence from sexual activity.

	U									
						Total				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	18,398	19,064	19,647	20,254	20,885	98,248	214,050			
Outlays	10,058	17,175	18,957	19,641	20,250	86,081	198,131			

### 500-3—Discretionary

## Increase Funding for the Education of Children with Disabilities

The Individuals with Disabilities Education Act (IDEA) authorizes the federal government to make grants to states that fund special education and related services for students with disabilities. For their part, states are required to provide a free, appropriate public education that is designed to meet the needs of eligible students. Based on a formula developed in the Individuals with Disabilities Education Improvement Act of 2004, the maximum grant that a state could receive for fiscal year 2009 was about \$4,200 per child with disabilities, which has increased over time with the cost of education. However, the program's funding for 2009 provided only about \$1,370 per child; the American Recovery and Reinvestment Act of 2009 (Public Law 111-5) provided approximately \$1,630 more per child.

This option would increase funds to provide states with the authorized maximum grant for educating children with disabilities. To do so would require an increase in budget authority of \$18.4 billion in 2010 and of about \$98.2 billion through 2014. Outlays would increase by \$86.1 billion over the same period. The appropriation for IDEA grants to states for 2010 would be adjusted annually to reflect estimated increases in the maximum allowable grant. Supporters of this option argue that the authorized maximum grant to states represents a federal commitment to the states that should be met. In their view, public school systems are obligated to provide all children with a free, appropriate education. In the case of children with disabilities, that education often requires costly equipment and professional attention tailored to an individual student's needs. Proponents of additional federal support contend that the funds are needed to ensure that school districts can meet those obligations.

Opponents of this option assert that educating children, including children with disabilities, is a responsibility of state and local governments and that the federal government's involvement should be minimal. They reject the claim that the authorized maximum grant to states represents a federal commitment, viewing that amount instead as a ceiling for appropriations. Moreover, critics argue, problems with the way the current system operates including the imposition of administrative burdens on school systems and issues connected with incorrect identification of disabilities that are difficult to diagnose will not be solved simply by increasing federal funding.

	Total			_						
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	7,957	8,004	8,051	8,091	8,162	40,265	82,887			
Outlays	4,097	7,240	7,908	8,067	8,123	35,435	77,645			

### **500-4—Discretionary**

## Increase Funding for the Education of Disadvantaged Children

Title I-A of the Elementary and Secondary Education Act of 1965 authorized grants to local school districts to fund supplementary educational services for disadvantaged children who are underachieving academically. The Improving America's Schools Act of 1994 added accountability measures to the Title I-A program that were significantly strengthened by the No Child Left Behind Act of 2001, or NCLBA. (Those measures establish annual goals for educational improvement and impose escalating sanctions if goals are unmet). Funding authorized by NCLBA for Title I-A grants has increased steadily, beginning at \$13.5 billion for 2002 and, by 2007 and 2008, increasing to \$25 billion per year. Despite that, the grants generally have been funded at less than authorized amounts. In 2009, for example, regular appropriations for Title I-A were \$14.3 billion. The American Recovery and Reinvestment Act of 2009 (Public Law 111-5), however, provides \$10 billion in supplemental appropriations for Title I-A in 2009.

This option would boost funding for Title I-A for 2010 and beyond to \$25 billion, the amount authorized for 2008, with subsequent adjustments for inflation that would increase federal outlays by a total of \$35.4 billion through 2014.

The act's accountability measures require schools that start the furthest from the goal (having all students attain proficiency in reading and mathematics by the 2013– 2014 school year) make the greatest annual progress if they are to avoid sanctions. That low-performing group of schools includes many that enroll large concentrations of disadvantaged children. Thus, one argument in favor of this option holds that unprecedented improvements in educational performance will be required to close the gap between schools that do not meet standards and those that achieve the goals of NCLBA. Moreover, schools with high concentrations of disadvantaged children will probably need to dramatically increase both the quality and the intensity of the supplemental educational services they provide. Those improvements would require substantial increases in resources.

An argument against this option is that experience with earlier reforms indicates that simply providing more resources does not guarantee the closing of the achievement gap between economically disadvantaged children and their better-off peers. Studies of what determines achievement often show that other factors—excellence in school leadership and highly motivated instructors, for example—are at least as important as financial resources in producing a student population that excels academically and, thus, that academic achievement cannot be improved by additional resources alone.

RELATED CBO PUBLICATION: The Economic Effects of Federal Spending on Infrastructure and Other Investments, June 1998

Eliminate the Even Start Program and Redirect Some Funds to Other Education Programs										
						Total				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	-33	-34	-34	-34	-34	-169	-345			
Outlays	-1	-26	-32	-34	-34	-127	-301			

### 500-5—Discretionary

Eliminate the Even Start Program and Redirect Some I	Funds 1	to
Other Education Programs		

The Even Start Family Literacy Program provides educational and related services to a group of young children and to their parents who generally have not finished high school. The services include basic academic instruction and help with parenting skills for the parents and earlychildhood education for their children, along with supplementary services such as child care and transportation. Under the program, the Department of Education makes grants to states to provide assistance through eligible entities (such as local education agencies that collaborate with community-based or other nonprofit organizations).

During the 2008–2009 school year, the program supported 350 projects that served roughly 20,000 children and provided approximately \$3,400 per child. The most recent national evaluation of the program found that roughly one-third of funding supported adult and parenting education and associated support services and another one-third supported early childhood education. The remainder paid for case management, recruiting, evaluation, administration, and other activities. For 2009, federal funding for the program was approximately \$66 million, the same as in 2008.

This option, which is similar to a proposal submitted in the President's budget request for 2010, would eliminate grants to states under the Even Start program and redirect half of those funds to other federal programs that support early childhood education. That change would reduce outlays by a total of \$127 million over five years.

An argument in favor of this option is that a national evaluation did not show that Even Start's approach of involving parents in the education of their children was effective. Furthermore, there was a continuing difficulty in maintaining participation in the program; families in the Even Start program during the 2000-2001 school year used only a fraction of the services available to them. About half of the families who joined Even Start between the 1997-1998 school year and the 2000-2001 school year left the program within 10 months. By that time, fewer than one in five families had met their educational goals under the program.

An argument against this option is that other research has shown that children who participate in programs that provide intensive, high-quality services make larger cognitive gains while they are enrolled and exhibit better educational outcomes years after leaving the program than do children who receive no such intervention. In addition, there is evidence of a strong association between family background, including educational attainment and income, and the educational achievement of children. So although direct evidence is not available, it seems plausible that children whose parents have low literacy or limited education are more likely to be educationally successful if they receive early childhood instruction themselves and if the parents receive educational services and instruction to help their children learn. Also, those parents may be more motivated to participate in basic education programs for adults and improve their job prospects if one of the purposes of such programs is to support their children's educational development.

RELATED CBO PUBLICATION: The Economic Effects of Federal Spending on Infrastructure and Other Investments, June 1998

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays								
Standardize rates at 7.9 percent	10	30	35	35	35	145	350	
Standardize rates at 8.5 percent	-120	-195	-200	-205	-215	-935	-2,175	

Standardize the Interest Rates Charged on PLUS Loans

### 500-6—Mandatory

The federal government sponsors loan programs to help students and their parents pay for postsecondary education. Stafford loans are made to students themselves; PLUS loans are made to parents of dependent students and (more recently) to graduate students who have exhausted their eligibility for Stafford loans. (PLUS loans take their name from the original Parent Loans to Undergraduate Students program.) Under the Federal Family Education Loan Program, the government guarantees loans made by private lenders. The government's William D. Ford Federal Direct Loan Program makes loans directly from federal funds. Since July 1, 2006, the interest rate on Stafford loans has been 6.8 percent both for guaranteed loans and for the direct government loans. The same is not true for PLUS loans. The interest rates on loans made after July 1, 2006, differ for the two types of loans. The rate for the guaranteed loan program is 8.5 percent; the rate for direct loans is 7.9 percent.

500

This option would take one of two approaches to standardizing the interest rates charged for new PLUS loans: It would reduce the rate offered for guaranteed loans from 8.5 percent to match the direct loan rate of 7.9 percent, or it would raise the direct loan rate to match the guaranteed loan rate of 8.5 percent. In neither case would the rates match the Stafford rate. The first alternative would increase federal outlays by \$145 million over the period from 2010 to 2014. (Outlays would rise because the government guarantees lenders an interest rate, and it pays lenders the difference between that rate and the rate paid by borrowers.) Setting the interest rate at 8.5 percent would reduce federal outlays by \$935 million over the same period. (Outlays would decline because the government would receive larger interest payments from borrowers in the direct loan program.)

The argument for either alternative of this option is that the interest rate borrowers pay should not depend on whether the student's institution chooses to participate in the Federal Family Education Program or the William D. Ford Federal Direct Loan Program.

An argument in favor of the alternative of choosing the lower interest rate is that the direct loan rate is already significantly higher than the 6.8 percent charged for Stafford loans. An argument against that alternative is that lowering the rate would increase federal outlays.

A rationale for raising the interest rate to 8.5 percent is that PLUS loans are available to parents and graduate students regardless of their income and assets and, for many borrowers, that rate could be less than other rates on private loans available to them. By raising the interest rate, however, policymakers would further increase the cost of financing postsecondary education.

RELATED CBO PUBLICATIONS: The Cost of the Consolidation Option for Student Loans, May 2006; and Subsidy Estimates for Guaranteed and Direct Student Loans, November 2005

Eliminate Subsidized Loans to Graduate Students										
						Total				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	-3,010	-3,110	-2,575	-2,005	-1,940	-12,640	-22,325			
Outlays	-1,755	-2,675	-2,400	-1,910	-1,700	-10,440	-18,840			

### 500-7—Mandatory

## 1

The federal government sponsors programs to help students and their parents pay for postsecondary education. Subsidized loans help students with demonstrated financial need pay for their education, and unsubsidized loans are available, without regard to need, to any student. The Federal Family Education Loan Program provides government guarantees for loans made by private lenders. The William D. Ford Federal Direct Loan Program makes loans directly from federal funds. Borrowers benefit from the mostly below-market interest rates, and those with subsidized loans benefit further because the government forgives interest while students are enrolled and for a six-month period after they leave school.

This option would end, in 2010, the practice of making new subsidized loans to graduate students, under the assumption that those students would take out unsubsidized loans instead. This option would reduce federal outlays by \$10.4 billion over the period from 2010 to 2014. (The Federal Credit Reform Act of 1990 requires that the federal budget record all costs and collections associated with a new loan on a present-value basis in the year in which the loan is disbursed.)

An argument in favor of making subsidized loans available only to undergraduates is that doing so would help focus federal student aid in the area some people believe is the federal government's primary responsibility-making a college education available to all high school graduates. According to that rationale, graduate students have already received the benefit of a higher education. An argument against such a shift in funding, however, is that federal support for graduate students is equally important because those students are most likely to make scientific, technological, and other advances that will benefit the nation as a whole.

Under this option, graduate students who lost access to subsidized loans could take out unsubsidized federal loans for the same amount and still benefit from below-market interest rates. Although federal student loan programs have several options that can make repayment more manageable for students with large balances or for those who encounter difficult financial circumstances, graduate students nevertheless often amass large amounts of debt because of the number of years of schooling required to complete advanced degrees. Without the benefit of interest forgiveness while they are enrolled in school, that debt would be substantially larger when they entered the repayment period because the interest on the money borrowed over the years would be added to loan balances.

RELATED CBO PUBLICATION: Private and Public Contributions to Financing College Education, January 2004

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-186	-187	-189	-189	-191	-942	-1,941	
Outlays	-23	-181	-188	-189	-190	-771	-1,756	

Eliminate Administrative Fees Paid to Schools in the Campus-Based Student Aid

### 500-8—Discretionary

and Pell Grant Programs

### The federal government pays postsecondary schools to administer several student aid programs, or to distribute the programs' funds, or both. Under campus-based aid programs—the Federal Supplemental Educational Opportunity Grant Program, the Federal Perkins Loan Program, and the Federal Work-Study Program—the government distributes funds programs to institutions, which in turn award grants, loans, and jobs to qualified students. A statutory formula specifies that institutions may use as much as 5 percent of program funds to cover administrative costs. Under the Federal Pell Grant Program, the government makes a payment of \$5 per grant to reimburse schools for some administrative costs.

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This option would prohibit schools from using federal funds from the campus-based aid programs to pay for the programs' administration, thus reducing the need for appropriated budget authority by \$158 million in 2010. Eliminating the \$5 payment per Pell grant would reduce the funding requirement by another \$28 million in 2010. Together, those changes would reduce the need for appropriated budget authority by \$186 million in 2010 and by \$942 million over the period from 2010 to 2014. The changes would reduce outlays by \$771 million over the same period.

Arguments can be made for eliminating administrative payments and for retaining them. Schools benefit significantly from participating in federal student aid programs even without the payments because the aid makes attendance at those schools more affordable. For the 2008– 2009 academic year, students at participating institutions will receive an estimated \$19.8 billion in federal funds under the Pell Grant and campus-based aid programs. Institutions also incur costs to administer the programs. If the federal government does not pay those expenses, schools may simply pass the costs along to students in the form of higher tuition or smaller institutional aid awards.

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-64	-64	-65	-65	-66	-324	-664	
Outlays	-13	-64	-65	-65	-65	-272	-608	

### 500-9—Discretionary

## Eliminate the Leveraging Educational Assistance Partnership Program

The Leveraging Educational Assistance Partnership (LEAP) program helps states provide grants and workstudy assistance to financially needy postsecondary students while they attend academic institutions or vocational schools. States must match federal funds at least dollar for dollar and must meet maintenance-of-effort criteria (minimum funding based on funding in previous years). Unless they are excluded by state law, all public and private nonprofit postsecondary institutions in a state are eligible to participate in the program.

This option, which also was included in the previous Administration's 2009 budget, would eliminate LEAP, reducing federal outlays by \$13 million in 2010 and by \$272 million over five years. The extent to which financial assistance to students declined would depend on the responses of the states, some of which would probably make up at least part of the lost federal funds. A rationale in support of this option is that LEAP is no longer needed to encourage states to provide student aid. When the program was first authorized in 1972 (as the State Student Incentive Grant Program), only 28 states had student grant programs; now, all but one offer such need-based assistance. Moreover, states currently fund the program far in excess of the level to which federal matching funds apply.

An argument against eliminating LEAP is that some states might not increase their student aid funding to replace the lost federal funding, and some might even reduce their student aid programs. In that case, some students whose financial aid packages were reduced might decide to attend a less expensive school or forgo attending college altogether.

RELATED CBO PUBLICATION: Private and Public Contributions to Financing College Education, January 2004

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Reduce running for the Arts and numanities										
						Total				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	-381	-408	-430	-447	-475	-2,142	-5,093			
Outlays	-288	-375	-416	-440	-465	-1,984	-4,864			

### 500-10—Discretionary

In 2009, the combined federal funding for several arts and humanities programs that received federal subsidies was nearly \$1.7 billion. (The American Recovery and Reinvestment Act of 2009 [Public Law 111-5] provided \$75 million in additional appropriations for the arts and humanities.) The recipients were the Smithsonian Institution (funded at \$731 million), the Corporation for Public Broadcasting (\$462 million), the National Endowment for the Humanities (\$155 million), the National Endowment for the Arts (\$155 million), the National Gallery of Art (\$122 million), and the John F. Kennedy Center for the Performing Arts (\$36 million).

Reduce Funding for the Arts and Humanities

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If support of those programs was cut by 20 percent of current funding and future appropriations were held at that nominal amount, federal outlays relative to current funding (after an adjustment for inflation) would be reduced by \$288 million in 2010 and by \$2 billion between 2010 and 2014. The effect on the nation's arts and humanities activities would depend in large part on the extent to which other sources of funding—such as state and local governments, individual or corporate donors, and foundations—changed their contributions. Some proponents of reducing funding for the arts and humanities argue that support of such activities is not an appropriate function of the federal government. Other advocates of cuts assert that the expenditures are unacceptable as long as programs that address central federal concerns are not fully funded. Some federal grants for the arts and humanities already require nonfederal matching contributions, and many museums charge admission or request donations from patrons at the door. Those practices could be expanded to accommodate a reduction in federal funding.

Critics of cuts in funding, in contrast, contend that alternative sources are not likely to fully offset a drop in federal funding. Subsidized projects and organizations in rural or low-income areas might find it especially difficult to garner increased private backing or sponsorship. Thus, a decline in federal support, opponents argue, would reduce activities that preserve and advance the nation's culture and that introduce the arts and humanities to people who might not otherwise have access to them.

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-577	-581	-584	-587	-592	-2,921	-6,012	
Outlays	-98	-560	-576	-581	-585	-2,400	-5,437	

### 500-11—Discretionary

## **Eliminate the Senior Community Service Employment Program**

The Senior Community Service Employment Program (SCSEP) funds part-time jobs for low-income people ages 55 and older who have poor prospects for other employment. Participation in the program in 2009 is limited to people whose annual incomes were below 125 percent of the federal poverty level (for someone living alone, \$13,000). SCSEP grants are awarded to nonprofit organizations and state agencies that hire SCSEP participants to work in part-time community service jobs. The American Recovery and Reinvestment Act of 2009 (Public Law 111-5) provided \$120 million in additional appropriations for senior community service.

This option would eliminate SCSEP, reducing federal outlays by \$2.4 billion through 2014.

Participants in the program are paid the federal or state minimum wage or the local prevailing wage for similar employment, whichever is higher. They are offered annual physical examinations as well as training, counseling, and assistance with moving into unsubsidized jobs when they complete their projects. The Department of Labor estimates that SCSEP had 106,000 participants in 2008, working in schools, hospitals, and senior citizens' centers and on beautification and conservation projects.

An argument in support of this option is that the costs of the services now supplied by the program's participants could be borne by the organizations that benefit from their work; under current law, those organizations usually bear just 10 percent of such costs. Shifting the full costs of the services to the organizations would increase the likelihood that only the most highly valued services would be provided.

An argument against this option is that eliminating SCSEP, which is a major federal jobs program for lowincome older workers, could cause serious hardship for some people. Although, in general, older workers are less likely to be unemployed than are younger workers, if they are unemployed it can take longer for older workers to find work.

500

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-874	-891	-909	-919	-927	-4,519	-9,383	
Outlays	-237	-580	-736	-803	-830	-3,187	-7,655	

### 500-12—Discretionary

## **Eliminate Funding for National Community Service Programs**

National community service programs support students and other volunteers who provide assistance to their communities in the areas of education, public safety, the environment, and health care, among others. Appropriations for national service programs totaled about \$900 million for fiscal year 2009, which supported the AmeriCorps Grants Program, Volunteers in Service to America (VISTA), the National Civilian Community Corps (NCCC), and Learn and Serve America. The American Recovery and Reinvestment Act of 2009 (Public Law 111-5) provided \$200 million in additional appropriations for national community service programs. State and local governments and private enterprises contribute supplemental funding to support AmeriCorps service projects that, in many cases, build on existing federal, state, and local programs. AmeriCorps and NCCC participants receive an educational allowance, a stipend for living expenses, and access to health insurance and child care subsidies. Learn and Serve America participants generally do not receive stipends or educational awards.

This option would eliminate federal contributions for national service programs, reducing outlays relative to current baseline projections by \$237 million in 2010 and by about \$3.2 billion through 2014, after an adjustment for inflation. (Those estimates account for the costs associated with terminating the programs.)

An argument in favor of this option holds that the goal of federal aid to students should be to provide lowincome people with access to postsecondary education. Because participation in the programs is not based on family income or assets, funds do not necessarily go to the poorest students.

A major rationale against this option is that the programs provide opportunities for participants to engage in national service, which can benefit communities and promote idealism. 600

## **Income Security**

ederal income-security programs provide individuals with cash or in-kind benefits. Some programs, such as the Supplemental Nutrition Assistance Program (formerly the Food Stamp Program), Supplemental Security Income, most of Temporary Assistance for Needy Families, and the earned income tax credit, use means-testing; others, including unemployment compensation and civil service retirement and disability payments, are not tied to recipients' income or assets.

The \$431 billion in outlays in budget function 600 last year accounted for nearly 15 percent of all federal spending. Most of that, about 87 percent, was mandatory spending. Growth in outlays for many programs follows a countercyclical pattern, rising as the economy falters. Since 2000, annual growth in outlays has averaged 7 percent, but it has ranged from a slight decrease in 2004 to an increase of 18 percent last year. Retirement and disability programs—including military retirement—accounted for about 25 percent of the category's spending. In 2008, refundable tax credits, bolstered by the one-time rebates from the stimulus bill enacted in 2008, made up 21 percent of spending, nearly double the share of such credits in 2004. Food and nutrition assistance, the next-largest component, made up about 14 percent of the function's outlays in recent years. Outlays for unemployment compensation, which fluctuate with the overall economy, accounted for roughly 11 percent of spending in 2008 but ranged between 9 percent and 17 percent over the past decade.

About 9 percent of income-security spending overall, and most of the discretionary spending in function 600, was for housing assistance.

The Congressional Budget Office estimates that outlays in function 600 will total \$506 billion in 2009 and that about \$64 billion of that amount will be discretionary spending. Most of the growth since 2004 has been focused in refundable tax credits, civil service and military retirement, the Supplemental Nutrition Assistance Program, and the Supplemental Security Income program.

					Estimate	Average Annual Rate of Growth (Percent)		
	2004	2005	2006	2007	2008	2009	2004-2008	2008-2009
Discretionary Budget Authority	45.2	45.8	47.7	50.9	53.3	73.8 <sup>a</sup>	4.2	38.6
Outlays								
Discretionary	52.3	53.6	54.3	56.3	58.3	63.9	2.8	9.7
Mandatory	280.8	291.6	298.1	309.6	373.0	442.1	7.4	18.5
Total	333.1	345.3	352.5	366.0	431.3	506.0	6.7	17.3

#### Federal Spending, Fiscal Years 2004 to 2009 (Billions of nominal dollars)

a. Includes \$13.4 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 600, SEE THE FOLLOWING REVENUE OPTIONS:

Revenue Option 6	Use an Alternative Measure of Inflation to Index Some Portions of the Tax Code
Revenue Option 15	Include Employer-Paid Premiums for Income-Replacement Insurance in Employees' Taxable Income
Revenue Option 21	Consolidate and Simplify Different Types of Defined-Contribution Retirement Plans
Revenue Option 24	Include Social Security Benefits in Calculating the Phase-Out of the EITC
Revenue Option 27	Limit or Eliminate Eligibility for the Child Tax Credit
Revenue Option 36	Repeal the Low-Income Housing Credit
Revenue Option 47	Increase Federal Employees' Contributions to Pension Plans

Modify the Assessment Base and Increase the Federal Insuran	ce Premium for
Private Pension Plans	
	Total

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays								
Increase the fixed-rate premium by 15 percent	-177	-188	-188	-193	-198	-944	-2,019	
Increase the variable-rate premium by 33 percent	-107	-441	-536	-468	-308	-1,861	-2,353	

The Pension Benefit Guaranty Corporation (PBGC) is a federal agency that insures participants in private employers' defined-benefit pension plans against the loss of specified benefits in the event their plans are terminated without sufficient assets. Private employers are not required to provide pensions, but those that do must follow rules in the Employee Retirement Income Security Act for meeting minimum standards for participation, accrual of benefits, vesting, and funding, for example. If a plan is terminated with insufficient assets to pay promised benefits, PBGC assumes the plan's assets and liabilities (up to an annual per-participant limit). It uses those assets along with insurance premiums from active plans to make monthly annuity payments to qualified retirees and their survivors. At the end of 2008, PBGC reported a deficit of about \$11 billion-indicating that its assets were about \$11 billion less than the present value of the benefits that it owed to workers and retirees in underfunded plans that had been terminated or whose termination the agency viewed as "probable."

PBGC's insurance premium for a single-employer plan consists of a fixed annual payment (\$34 in 2009) for each participant (worker or retiree) in the plan; for an underfunded plan, a variable payment equal to \$9 for each \$1,000 by which the plan is underfunded; and for a plan terminated in or after January 2006, a \$1,250 payment for each participant in each of the first three years after the sponsor's emergence from bankruptcy. In 2008, offsetting receipts (credits against direct spending) from the fixed portion of the premium totaled about \$1.2 billion; and from the variable portion, about \$258 million.

Under one alternative, this option would increase collections from the fixed-rate premium by 15 percent. The increase could occur either by increasing the current charge from \$34 to \$39 per participant or by changing the assessment base to some measure of insured benefits and setting the premium to a rate that would yield 15 percent more in collections. This component of the option would increase offsetting receipts by \$177 million in 2010 and by \$944 million over five years.

Under a second alternative, which could be pursued singly or in combination with the first, this option would increase the variable-rate premium by one-third, to \$12 per \$1,000 of underfunding. That change would increase offsetting receipts by \$107 million in 2010 and by \$1.9 billion over five years.

A principal advantage of increasing premiums is that doing so could improve PBGC's long-term financial condition. Raising premiums for riskier plans also would align premiums more closely with the risk they pose to PBGC. Currently, premiums increase only with underfunding, even though other factors (such as the financial condition of the sponsors and the share of plans' assets allocated to risky securities) also increase the risk to PBGC. By raising the cost of maintaining underfunded or riskier plans, this option would provide more incentive to employers to fully fund their plans. Moreover, the current per-participant charge could constitute a disadvantage for new companies with a disproportionate share of employees who have accumulated few pension benefits. An advantage of changing the assessment base for the fixed-rate premium rather than increasing the charge per participant is that doing so would more directly relate the fixed-rate premium to insured benefits.

A disadvantage of this option is that the increases in premiums would not necessarily be well targeted to plans that PBGC eventually took over because charges would still rely on the extent to which a plan is underfunded, which is not perfectly related to the probability that a plan will be terminated. The higher costs of underfunding might also lead more businesses to freeze pension plans, thereby restricting the growth in their plans' benefits. Finally, higher premiums could increase the risk that financially weak employers would terminate their plans.

RELATED CBO PUBLICATIONS: A Guide to Understanding the Pension Benefit Guaranty Corporation, September 2005; The Risk Exposure of the Pension Benefit Guaranty Corporation, September 2005; Estimating the Value of Subsidies for Federal Loans and Loan Guarantees, August 2004; and Controlling Losses of the Pension Benefit Guaranty Corporation, January 1993

### 600-2—Mandatory

INCOME SECURITY 131

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Five-year average salary to compute pension benefits	-45	-145	-246	-344	-430	-1,210	-4,388
Four-year average salary to compute pension benefits	-24	-75	-127	-175	-217	-618	-2,205

Modify the Formula Used to Set Federal Pensions

The government's major retirement plans for civilian employees—the Civil Service Retirement System (CSRS) and the Federal Employees Retirement System (FERS) provide initial benefits (before cost-of-living adjustments are applied) that are based on the average of an employee's highest earnings over three consecutive years. In 2009, outlays for pension benefits under the two programs are projected to total \$69 billion.

This option would use a five-year average instead of a three-year average to compute benefits for workers who retire under CSRS and FERS after September 30, 2009. The resulting initial pensions would be about 3 percent smaller for most new civilian retirees, saving the federal government \$1.2 billion over five years. The average new CSRS retiree would receive \$1,424 less in 2010 and \$7,148 less over five years than under current law. The average new FERS retiree would receive \$462 less in 2010 and \$2,322 less over five years.

An alternative approach would use a four-year average to set CSRS and FERS pensions. Such action would yield savings of \$618 million over five years. The average new CSRS retiree would receive \$757 less in 2010 and \$3,800 less over five years; the average new FERS retiree would receive \$246 less in 2010 and \$1,234 less over five years.

One rationale for using a longer average is that it would better align federal practices with those in the private sector, which commonly uses five-year averages to calculate base pensions. The change in formula would encourage some federal employees to work longer to boost their pensions, thus helping the government retain experienced personnel.

An argument against this option is that the change in the formula also could reduce the quality of the federal workforce and would reduce benefits more for CSRS retirees. Using a five-year average instead of a three-year average would reduce the attractiveness of the government's civilian compensation package and trim the increase in retirement benefits a employee would receive from working an additional year. This option would reduce benefits more for CSRS retirees than it would for those who retire under FERS because CSRS provides a larger definedbenefit pension than FERS does. Unlike CSRS employees, federal employees under FERS participate in Social Security and receive government contributions to the 401(k)-like Thrift Savings Plan.

RELATED CBO PUBLICATIONS: Assessing Pay and Benefits for Military Personnel, Issue Brief, August 15, 2007; Characteristics and Pay of Federal Civilian Employees, March 2007; Measuring Differences Between Federal and Private Pay, November 2002; and The President's Proposal to Accrue Retirement Costs for Federal Employees, June 2002

RELATED OPTIONS: 600-3 and Revenue Option 47

600-3—Mandatory

Base Cost-of-Living Adjustments for Federal and Military Pensions and	
Veterans' Benefits on an Alternative Measure of Inflation	

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	0	0	0	-1,000	-2,200	-3,200	-22,600

In 2010, the federal government expects to pay \$71 billion in pension benefits to 2.6 million retired civilian workers and \$51 billion to 2.2 million military retirees and their survivors. Pension payments to about 500,000 veterans and their survivors are projected to be \$4 billion, and compensation to 3.3 million disabled veterans and their survivors is projected to be \$40 billion. All of those benefits are indexed to the increase in the CPI-W (the consumer price index for urban wage earners and clerical workers), but the extent of the protection from inflation varies from one program to the next, as does the age at which benefits are payable.

Pensions paid under the Civil Service Retirement System (CSRS) are subject to annual cost-of-living adjustments (COLAs) that provide complete protection against increases in the CPI-W. Pensions paid under the newer Federal Employees Retirement System (FERS) are fully protected only when that increase is less than 2 percent per year. If the percentage increase in the CPI-W is between 2 percent and 3 percent, FERS annuitants receive a COLA of 2 percent. If the increase exceeds 3 percent, the COLA is the percentage increase in the CPI-W minus 1 percentage point. Unless they retire on disability, FERS annuitants receive COLAs only at ages 62 and above. CSRS and FERS participants generally can begin to receive pension benefits at age 60 with 20 years of service or at age 62 with 5 years of service. Participants with 30 years of service are eligible to receive benefits even if they retire before the age of 60.

Pensions for military personnel hired before August 1, 1986, qualify for full COLAs. People who entered service after that date face a choice: They may elect to stay under the old system and receive a full COLA, or they can accept a \$30,000 bonus at their 15th year of service and receive reduced annual COLAs that equal the percentage increase in the CPI-W less 1 percentage point. Those who choose the latter arrangement receive a one-time "catch-up" payment at the age of 62, restoring the

annuity to what it would have been had the full COLA been paid. After age 62, retirees continue to receive the reduced COLA. Most military personnel have declined the 15-year bonus and retained eligibility for the full COLA. Active-duty military personnel are eligible to receive pension benefits after completing 20 years of service, regardless of age. Reservists are not eligible for retirement annuities until they reach 60. Personnel with fewer than 20 years of service generally are not eligible for any benefits unless they retire on disability.

Full COLAs are attached to all veterans' benefit programs—disability compensation and death benefits for survivors, and pensions. Disability benefits are paid to veterans with certified disabilities, in amounts that depend on the severity of the disability. Veterans also are eligible for means-tested pension benefits.

This option would replace the CPI-W with the chained CPI-U, the chained consumer price index for all urban consumers (the CPI-U is an alternative measure of inflation developed by the Bureau of Labor Statistics) as the index by which federal civilian, military, and veterans' benefits are adjusted for inflation. The Congressional Budget Office estimates that, on average, the chained CPI-U is likely to grow 0.3 percentage points more slowly than the CPI-W over the next 10 years. Under this option, annual COLAs would equal the increase in the chained CPI-U for CSRS annuitants, military retirees, and veterans. Comparable adjustments would be made for FERS annuitants when the increase in the chained CPI-U was less than 2 percent a year. FERS annuitants would receive a COLA of 1.7 percent when the increase in the chained CPI-U was between 2 percent and 3 percent and a COLA 1 percentage point below that increase when the chained CPI-U exceeded 3 percent. Military retirees who chose the \$30,000 bonus under the new system would receive a reduced COLA equal to the percentage growth in the chained CPI-U minus 1 percent.

#### CHAPTER TWO

Those changes would decrease mandatory outlays by \$3.2 billion between 2010 and 2014 and by \$22.6 billion through 2019. CBO projects that savings would not be realized until 2013 because, under current law, no COLAs for such programs are expected to be paid from 2010 to 2012. On average, a CSRS annuitant would receive about \$3,000 less over 10 years than under current law; a FERS annuitant would receive about \$2,200 less. The average military retiree would receive roughly \$3,500 less over 10 years relative to current law, veterans' disability compensation would be about \$1,800 less, and veterans' pensions would be about \$1,740 less. (Using the chained CPI-U for all federal benefit programs that are indexed for inflation would reduce outlays by \$20 billion through 2014 and by \$140 billion through 2019.)

An argument in favor of using the chained CPI-U is that many analysts believe the CPI-W overstates increases in the cost of living. Using the alternative measure would reduce federal outlays while ensuring that benefits do not fall any lower in real (inflation-adjusted) terms than they are when recipients become eligible for the programs. (For more details, see the discussion in Option 650-1.) Federal pension plans offer more protection against inflation than most private pension plans do, and COLAs are increasingly scarce in the private sector. According to a 2001 survey, fewer than 15 percent of private-sector plans gave annuitants formal annual COLAs; another 25 percent made ad hoc cost-of-living adjustments. More than 60 percent of plans had made no adjustments since the 1990s. Moreover, even with reduced COLAs, many federal and military annuitants would still fare better than

other retirees because they are covered by the comprehensive Federal Employees Health Benefits program or have access to military and veterans' treatment facilities.

Although the chained CPI-U more closely reflects changes in the cost of living than the CPI-W does, the chained CPI-U is subject to revision over two years. (For more details, see the discussion in Revenue Option 6.) Therefore, it would be necessary to base the adjustment for each year on the cumulative index value from a base year several years in the past. In that way, the revisions would not distort the usefulness of the index.

Various arguments could be made against limiting COLAs. The chained CPI-U might understate changes in the cost of living for retirees, whose spending patterns can differ from those of the general population. In that case, limiting COLAs could allow the benefits received by current and future retirees to decline over time in real terms. CSRS annuitants would be particularly affected because they are most dependent on their pensions (and may have stayed with CSRS because of the understanding that they would always have the protection against inflation offered by the current COLA.) Moreover, because current and prospective employees would be expected to analyze retirement benefits when comparing alternative wage and benefit packages, reducing federal retirement benefits could hamper the government's ability to recruit and retain a highly qualified workforce. Finally, because military personnel can retire earlier and receive immediate pensions after just 20 years of service, their lower COLAs would have larger effects over longer periods.

RELATED OPTIONS: 650-1 and Revenue Options 6 and 47

RELATED CBO PUBLICATIONS: Assessing Pay and Benefits for Military Personnel, Issue Brief, August 15, 2007; Characteristics and Pay of Federal Civilian Employees, March 2007; Comparing the Pay of Federal and Nonfederal Law Enforcement Officers, August 2005; Measuring Differences Between Federal and Private Pay, November 2002; and The President's Proposal to Accrue Retirement Costs for Federal Employees, June 2002

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-559	-1,129	-1,707	-2,304	-2,924	-8,623	-24,231
Outlays	-422	-988	-1,565	-2,157	-2,772	-7,904	-23,425

### 600-4—Discretionary

## Increase Payments by Tenants in Federally Assisted Housing

Most low-income tenants who receive federal rental assistance are aided through the Housing Choice Voucher Program (sometimes called Section 8), the low-rent Public Housing Program, or project-based assistance programs that designate privately owned, governmentsubsidized units for low-income tenants. Administered by the Department of Housing and Urban Development (HUD), those programs usually require that tenants pay 30 percent of their monthly gross household income (after certain adjustments) for rent; the federal government subsidizes the difference between that amount and the maximum allowable rent. In 2008, the Congressional Budget Office estimates, the average federal expenditure for all of HUD's rental housing programs combined was roughly \$7,000 per assisted household. That amount includes the housing subsidies and the fees paid to the agencies that administer the programs.

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This option would increase tenants' rent contributions from 30 percent of adjusted gross income to 35 percent over a five-year period. Provided that federal appropriations are reduced to offset those higher rent contributions, savings in outlays would total \$7.9 billion over

**RELATED OPTION: 600-5** 

five years: \$3.6 billion for the Housing Choice Voucher Program, \$1.9 billion for the Public Housing Program, and \$2.4 billion for project-based assistance programs.

An argument in support of this option is that even if the tenants' contribution increased to 35 percent of adjusted income, that contribution would still be well below the nearly 50 percent of income paid by the average non-assisted renter who is eligible for assistance. Furthermore, households that receive assistance would still benefit from paying a fixed percentage of their income toward housing, whereas similar nonassisted households could confront possible market increases in housing costs relative to income.

An argument against the option is that housing costs would rise for most households that currently receive assistance, and even a modest increase in rent could be difficult to manage for households with very low income. Furthermore, by increasing the proportion of their income that tenants are required to pay in rent, the option would reduce the incentive of some participants to increase their income by working more.

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Spending							
Budget authority	-56	-108	-158	-206	-251	-779	-2,646
Outlays	-22	-77	-128	-177	-224	-628	-2,375

### 600-5—Discretionary

## **Reduce Rent Subsidies for Certain One-Person Households**

Recipients of federal housing assistance typically live either in subsidized-housing projects or in open-market rental units. Financial support for the second type of housing often comes from the Housing Choice Voucher Program, which is administered by the Department of Housing and Urban Development. That program pays the difference between a tenant's contribution (usually 30 percent of his or her monthly adjusted gross income) and the rent (which is determined by the local market).

Both the local payment standard and the federal subsidy vary according to the type of unit in which a given tenant lives. Generally, an individual in a one-person household may choose an apartment with up to one bedroom. Recipients in larger households can rent larger units. This option would link the rent subsidy for new applicants from one-person households to the cost of an efficiency apartment rather than a one-bedroom unit. (The change also would apply to any single person receiving assistance who moves to another subsidized unit.) Provided that federal appropriations are adjusted accordingly, the option would save \$628 million through 2014.

A rationale for this option is that an efficiency unit should provide adequate space for someone who lives alone. A potential drawback is that renters in some areas might have difficulty finding efficiency apartments and, under the new rule, might have to spend a larger percentage of their income for a one-bedroom unit.

**RELATED OPTION: 600-4** 

						Tot	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-10	-190	-310	-320	-325	-1,155	-2,865

### 600-6—Mandatory

## Target the Subsidy for Certain Meals in Child Nutrition Programs

The National School Lunch Program, the School Breakfast Program, and the Child and Adult Care Food Program (CACFP) provide funds that enable public and nonprofit private schools, residential child care institutions, and day care centers to offer free meals to students from households whose income is at or below 130 percent of the federal poverty line and reduced-price meals for those whose household income is above 130 percent but at or below 185 percent of the federal poverty line. Students whose household income is above 185 percent of the poverty line pay full price at participating schools and centers, although their meals are still subsidized to some extent.

The subsidy rate per meal does not depend on what it costs a given site to provide the meal—the amount depends solely on the household income of the student who receives the meal. Federal cash subsidies for free meals in the 2008–2009 school year are \$2.57 for lunch and \$1.40 for breakfast; \$2.17 per reduced-price lunch and \$1.10 per reduced-price breakfast; and \$0.24 per full-price lunch and \$0.25 per full-price breakfast served. (Schools in Alaska and Hawaii and schools with large numbers of students who participate in the freeand reduced-price-meal programs receive additional subsidies.) Although each school may set the prices it charges for reduced- and full-price meals, none may charge more than \$0.40 for a reduced-price lunch or \$0.30 for a reduced-price breakfast. Participating schools and CACFP centers are also entitled to receive commodities, at a value of 21 cents for each lunch served during the 2008–2009 school year.

This option, which would yield net savings of \$1.2 billion over five years, would eliminate the breakfast and lunch subsidy for full-price meals for students beginning in July 2010 and expand eligibility for free meals to students from households whose income is between 130 percent and 185 percent of the poverty line.

A rationale for this option is that there is no clear justification for subsidizing meals for students who are not from low-income households. Another argument for the option is that it would simplify the administration of the program because it would not be necessary for schools to distinguish between students who are eligible for free and reduced-price meals. An argument against the option is that participating schools that have used funds from the full-price subsidy to offset the costs of administering breakfast and lunch programs could decide to raise prices for students from higher-income households or leave the program altogether. The latter outcome would mean that eligible students would no longer receive free or reducedprice meals.

### 600-7—Mandatory

# Eliminate the Exclusion for Unearned Income Under the Supplemental Security Income Program

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-730	-820	-720	-800	-810	-3,880	-7,990

The federal Supplemental Security Income (SSI) program provides monthly cash payments-based on uniform, nationwide eligibility rules-to low-income elderly people and people with disabilities. In addition, many states provide supplemental payments. Because SSI is a meanstested program, recipients' non-SSI income can reduce their SSI benefits, subject to certain exclusions. For unearned income (which includes Social Security benefits), \$20 a month is excluded from the benefit calculation; above that amount, SSI benefits are reduced dollar for dollar. To encourage SSI recipients to work, the program allows a larger exclusion for earned income. Changes in income, earned or unearned, must be reported as soon as possible and no later than 10 days after the end of the month in which the change occurs. Beneficiaries who fail to report changes that would result in reduced SSI benefits may be required to return the overpayment and could pay a penalty of \$25 to \$100.

RELATED OPTIONS: 600-8 and 600-9

This option would eliminate the exclusion for unearned income, reducing outlays by \$3.9 billion between 2010 and 2014 (assuming that the option would not affect an individual's eligibility for Medicaid, even if it caused that person to become ineligible for SSI).

A rationale for this option is that a program designed to ensure a minimum standard of living for its recipients need not provide a higher standard for people who happen to have unearned income (generally, Social Security benefits). An argument against the option is that eliminating the monthly exclusion would decrease by as much as \$240 the annual income of the roughly 3.5 million low-income people (approximately 45 percent of all federal SSI recipients) who otherwise would benefit in 2010 from the exclusion. Another drawback is that the option could add to the administrative burden of the SSI program because small amounts of unearned income would affect monthly benefit payments.

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600-8—Mandatory

## Create a Sliding Scale for Children's Supplemental Security Income Benefits Based on the Number of Recipients in a Family

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	0	-100	-170	-190	-200	-660	-1,690

The federal Supplemental Security Income (SSI) program makes cash payments to low-income elderly and disabled people on the basis of uniform, nationwide rules for eligibility. In addition, many states provide supplemental payments to program recipients. In 2008, about \$8 billion, or about one-fifth of total benefits, was disbursed for children covered by the program.

Unlike other means-tested benefits, SSI payments for each additional child do not decline as the number of SSI recipients in a family increases. In 2008, a family that included one qualifying child could expect to receive up to \$637 a month if the family's income (excluding SSI benefits) was below the cap for the maximum benefit. If the family included other eligible children, it could receive another \$637 a month for each additional child. (A child's benefit is based on the presence of a severe disability and on the family's income and resources. Neither the type of disability nor participation by other family members in the SSI program is considered.)

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This option would create a sliding scale for SSI disability benefits so that a family would get incrementally fewer benefits per child as the number of children in the family who qualified for SSI increased. If the option was implemented in 2011 (to allow the Social Security Administration, which administers the SSI program, to gather data on multiple SSI recipients in individual families), outlays would drop by \$100 million in 2011 and by \$660 million between 2011 and 2014. This option's sliding scale, which was recommended in 1995 by the National Commission on Childhood Disability, would not change the current maximum benefit for one child. However, benefits for each additional child in the same family would be reduced. If the sliding scale had been applied in 2008, a family would continue to receive \$637 a month for the first child who qualified for the maximum benefit. But it would receive \$398 for the second child and \$340 for the third. Benefits would continue to decrease for additional children in the same family. As with current SSI benefits, the payments would be adjusted each year to reflect changes in the consumer price index.

Proponents of a sliding scale argue that the resulting reductions in benefits would reflect economies of scale that generally affect the cost of living for families with more than one child. Furthermore, the high medical costs that disabled children often incur, which would not be subject to economies of scale, would continue to be covered because SSI participants are generally eligible for Medicaid.

An argument against this option is that children with disabilities sometimes have unique needs (for housing modifications or specialized equipment, for example) that might not be covered by Medicaid. If SSI benefits were reduced, some families might be unable to meet those needs.

RELATED OPTIONS: 600-7 and 600-9

### Remove the Ceiling on the Collection of Overpayments from the Supplemental Security Income Program

						Total			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Outlays	-100	-150	-130	-150	-150	-680	-1,480		

The federal Supplemental Security Income (SSI) program makes monthly cash payments to low-income elderly and disabled people. The Social Security Administration (SSA), which administers the program, sometimes pays recipients more than it later determines they should have received. According to *Supplemental Security Income: Progress Made in Detecting and Recovering Overpayments, but Management Attention Should Continue* (GAO-02-849), issued in 2002 by the General Accounting Office (now the Government Accountability Office), the complexity of the rules that govern the SSI program is a primary reason for the overpayments.

After discovering an overpayment, SSA may reduce the recipient's subsequent monthly benefit to recover the amount. Under current rules, however, the maximum that SSA may deduct from a recipient's monthly payment is the lesser of two amounts: the recipient's entire monthly SSI benefit or 10 percent of the recipient's total monthly income (minus certain exclusions). Thus, SSA may deduct no more than 10 percent of the monthly SSI benefit of a recipient who has no other source of income. Moreover, the Commissioner of Social Security may lower the rate of recovery or waive collection of an overpayment altogether if it is determined that doing so would support the purposes of the SSI program.

This option would remove the ceiling on the amount of overpayments that SSA could recover from monthly SSI payments but retain the commissioner's discretionary authority to reduce or waive the required amount. Removing the 10 percent ceiling would increase the amount collected from overpayments—and thereby reduce net outlays for benefits—by \$100 million in 2010 and by \$680 million over the 2010–2014 period. (Removing the ceiling would increase administrative costs by \$35 million to \$45 million each year; however, those costs are subject to the appropriation process and are not included in the amounts shown in the table.)

An argument in support of this option is that it would improve the federal government's ability to recover money paid to recipients erroneously. Moreover, retention of the commissioner's discretionary authority would lessen the chances that such recoveries would result in undue hardship for SSI recipients.

An argument against the option is that SSI recipients generally have low income and few, if any, financial assets. For recipients who have no other income, even a 10 percent reduction in SSI payments might present a hardship. The current ceiling allows affected recipients to pay the amount they owe in small increments, which limits the reduction they must make in their current spending.

RELATED OPTIONS: 600-7 and 600-8

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Increase Funding for Child Care											
						Total					
(Millions of dollars)	2010	2011	2012	2013	<b>201</b> 4	2010-2014	2010-2019				
Change in Spending											
Budget authority	300	350	400	450	510	2,010	5,820				
Outlays	240	340	390	440	500	1,910	5,610				

### 600-10—Mandatory

The Child Care and Development Block Grant, which provides money to states to subsidize the child care expenses of low-income families, is funded through a combination of discretionary appropriations and a capped entitlement. Created in 1990, the program was subsequently modified and reauthorized through 2002 as part of the Personal Responsibility and Work Opportunity Reconciliation Act of 1996. Between 2002 and 2005, the entitlement—which included annual increases through 2002 under the 1996 law—was set at the 2002 amount of \$2.7 billion per year and was not adjusted for inflation. That part of the block grant was increased as part of the Deficit Reduction Act of 2005 to \$2.9 billion per year through 2010.

This option would increase the 2010 authorization for the entitlement portion of the block grant to adjust for inflation since 2006 and would index that amount thereafter. That change would boost federal spending by \$240 million in 2010 and by \$1.9 billion through 2014. A rationale for indexing the entitlement portion of the block grant is that it would maintain low-income families' access to subsidized child care. That access, in turn, would increase the incentive to work for some lowincome parents, making it easier for them to enter the job market and to stay employed. Increased participation in paid child care might also improve children's well-being, potentially decreasing behavioral problems and improving social skills and readiness for school.

An argument against this option is that many low-income parents have access to informal, or unpaid, care (provided by relatives, for example). In those cases, increases in child care subsidies might simply result in those parents' shifting from unpaid to paid care. Furthermore, there is little evidence of an objective difference in outcomes for children in unpaid or paid child care.

## **Social Security**

ocial Security, the federal government's largest program, consists of two parts: Old-Age and Survivors Insurance (OASI) and Disability Insurance (DI). As of December 2008, OASI was paying benefits to 41.6 million people; another 9.3 million were receiving DI benefits. In 2008, benefits totaled \$503 billion and \$104 billion, respectively, for the two programs. Discretionary outlays, mainly for administrative costs, totaled about \$5 billion last year.

Spending on OASI benefits has grown at an average annual rate of about 5 percent over the past few years (with annual cost-of-living adjustments accounting for most of the increase); payments go mainly to retired workers and their spouses and to elderly widows. Although some younger people-chiefly the children of deceased workers-qualify for OASI, more than 90 percent of the payments go to people age 62 or older. DI recipients are mainly in their 50s and early 60s. Outlays to that group have more than doubled over the past

decade, in part because more people in the baby-boom generation are reaching ages at which disability is more common; that trend will continue, and it will cause increased spending for DI over the next decade. Under current law, OASI outlays also will rise rapidly as baby boomers qualify for Social Security.

The Social Security trust funds, taken as a whole, will be exhausted in 2043, according to the Congressional Budget Office's most recent long-term projections (see Long-Term Projections for Social Security, August 2009). Under its March baseline, CBO projects that the DI trust fund will be exhausted in 2019. If the funds were exhausted, the Social Security Administration would not have the legal authority to provide the full benefits that are scheduled to be paid to future beneficiaries. In other publications, CBO has presented scenarios for scheduled benefits and payable benefits, but for the sake of simplicity, this report discusses only scheduled outlays.

						Estimate	Average Annual Rate of Growth (Percent)	
	2004	2005	2006	2007	2008	2009	2004-2008	2008-2009
Discretionary Budget Authority	4.1	4.4	4.6	4.7	5.0	6.4 <sup>a</sup>	5.0	27.3
Outlays								
Discretionary	4.0	4.6	4.6	4.7	4.9	5.5	5.2	11.4
Mandatory	491.5	518.7	543.9	581.4	612.1	676.7	5.6	10.6
Total	495.5	523.3	548.5	586.2	617.0	682.2	5.6	10.6

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### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 650, SEE THE FOLLOWING REVENUE OPTIONS:

Revenue Option 6	Use an Alternative Measure of Inflation to Index Some Portions of the Tax Code
Revenue Option 20	Tax Social Security and Railroad Retirement Benefits Like Defined-Benefit Pensions
Revenue Option 45	Increase the Maximum Taxable Earnings for the Social Security Payroll Tax
Revenue Option 46	Require Self-Employed People and Employees to Pay the Same Amounts in Payroll Taxes

650-1—Mandatory

Link Initial Social Security Benefits to Average Prices Instead of Average Earnings											
	Total										
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Outlays											
Implement pure price indexing	-400	-1,500	-3,700	-6,800	-11,200	-23,600	-194,600				
Implement progressive price indexing	-200	-900	-2,100	-3,900	-6,500	-13,600	-111,200				

### Link Initial Social Security Benefits to Average Prices Instead of Average Earnings

Social Security benefits for retired and disabled workers are based on those individuals' average earnings over a lifetime. The Social Security Administration (SSA) uses a statutory formula to compute a worker's initial benefit. In a process known as wage indexing, the benefit formula changes each year to account for economywide growth of wages. Average initial benefits for Social Security recipients therefore grow at the same rate as do average wages, and such benefits replace a constant portion of wages. (After people become eligible for benefits, their monthly payment also is adjusted annually to account for increases in the cost of living.)

One way to constrain the growth of Social Security benefits would be to change the initial benefit computation so that the real (inflation-adjusted) value of average initial benefits did not rise over time. That approach, called price indexing, would allow increases in real wages to result in higher real Social Security payroll taxes but not in higher real benefits. Specifically, beginning with participants who became eligible for benefits in 2010, this option would link the growth of initial benefits to the growth of prices (as measured by changes in the consumer price index) rather than to the growth of average wages. (The formula would continue to be indexed to wages, but the benefit generated by that formula would be multiplied by the ratio of the price level to the average wage level.) Such a switch to indexing initial benefits on the basis of prices rather than wages-the pure price indexing approach-would reduce federal outlays by \$24 billion over five years and by \$195 billion over a decade. By 2050, Social Security outlays would be reduced by 30 percent-or, measured relative to the size of the economy, from 5.8 percent to 4.1 percent of gross domestic product.

Under pure price indexing, the reduction in payments relative to those that are scheduled to be paid under current law would be larger for each successive cohort of beneficiaries after 2010; the extent of the reduction would be determined by the growth of real wages. For example, if real wages grew by 1.4 percent annually (approximately the assumption incorporated in the Congressional Budget Office's long-term Social Security projections), workers who were first eligible for benefits in 2030 would receive 26 percent less than they would have received under the current rules; those eligible for benefits in 2050 would receive 44 percent less.

An alternative approach, called progressive price indexing, would retain the current formula for workers who had lower earnings, reducing the growth of initial benefits only for workers who had higher earnings. Currently, the formula for calculating initial Social Security benefits is structured so that workers who have higher earnings receive higher benefits, but the benefits paid to workers with lower earnings replace a larger share of their earnings. Under the specifications for progressive price indexing in this option, benefits for the 30 percent of workers with the lowest lifetime earnings would grow with average wages, as they are currently slated to do. Initial benefits for higher-income workers would grow more slowly, at a rate that corresponded to their position in the distribution of earnings. For example, for workers whose earnings put them at the 31st percentile of the distribution, benefits would grow only slightly more slowly than wages, whereas for the highest earners, benefits would grow with prices-as they would under pure price indexing. The benefit formula would gradually become flatter, and after about 60 years, the top 70 percent of earners would all receive the same monthly benefit.

Under progressive price indexing, the initial benefits for most workers would grow more quickly than prices but more slowly than average wages. A switch to progressive price indexing would reduce federal outlays by \$14 billion over 5 years and by \$111 billion over 10 years. By 2050, outlays for Social Security would be reduced by 18 percent, or from 5.8 percent to 4.7 percent of gross domestic product.

An advantage shared by both approaches in this option is that although they would reduce outlays for Social Security compared with those scheduled to be paid under current law, real average benefits in the program would not decline over time. If the pure price indexing approach was followed, future beneficiaries would generally receive not only the same real monthly benefit paid to current beneficiaries but also, as average longevity increased, a larger total lifetime benefit. A disadvantage of that approach is that benefits would replace a smaller portion of workers' earnings than they do today.

Progressive price indexing would reduce scheduled Social Security outlays less than would pure price indexing, and beneficiaries with lower earnings would not be affected. Real annual average benefits would still increase for all but the highest-earning beneficiaries. Benefits would replace a smaller portion of affected workers' earnings than they do today but a larger portion than they would under pure price indexing.

Under both approaches, the reductions in benefits relative to current law would be greatest for beneficiaries in the distant future. Those beneficiaries, however, would have had higher real earnings during their working years and thus a greater ability to save for retirement.

#### **RELATED OPTION: 650-2**

RELATED CBO PUBLICATIONS: Long-Term Analysis of S. 2427, the Sustainable Solvency First for Social Security Act of 2006, Letter to the Honorable Robert F. Bennett, April 5, 2006; Menu of Social Security Options, May 25, 2005; Long-Term Analysis of Plan 2 of the President's Commission to Strengthen Social Security, Letter to the Honorable Larry E. Craig, July 21, 2004; Measuring Changes to Social Security Benefits, Fiscal Policy Brief 11, December 1, 2003; and Social Security: A Primer, September 2001

Raise the Normal Retirement Age in Social Security											
						Total					
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Outlays	-100	-300	-800	-1,700	-4,200	-7,100	-91,900				

### 650-2—Mandatory

The age at which workers become eligible for full retirement benefits—the normal retirement age—depends on their year of birth. For workers born before 1938, that age was 65. The age of eligibility increased in two-month increments until it reached 66 for workers born in 1943. For workers born between 1944 and 1954, the age holds at 66, but it increases again in two-month increments until reaching 67 for workers born in 1960 or later. Workers can receive benefits at age 62, but at that age, the amount will be a smaller share of their earnings than they could have qualified for by waiting until the normal retirement age to claim benefits.

Under this option, the normal retirement age would begin to increase by two-month increments for workers born in 1948 (who turn 62 in 2010), reaching 67 for workers born in 1953. Thereafter, the retirement age would continue to increase by two months per year until it reached 70 for workers born in 1971. After that, it would increase by one month every other year. As under current law, workers would still be able to begin receiving reduced benefits at 62, but the amount of the reductions would be larger.

Mathematically, this approach to constraining growth is equivalent to reducing earnings-replacement rates. (Option 650-1 offers a more direct method of reducing those rates.) However, the benefits of workers who qualify for disability insurance would not be reduced under this approach. Because many workers retire at the official normal retirement age, increasing the age limit is likely to result in beneficiaries' placing claims later than they would if an effectively identical policy were implemented through adjustments in the benefit formula. This option also could lead workers to remain employed longer.

This option would shrink federal outlays by \$7.1 billion over 5 years and by \$92 billion over 10 years. By 2050,

the option would reduce Social Security outlays by 14 percent—or, measured relative to the size of the economy, from 5.8 percent to 5.0 percent of gross domestic product.

A rationale for this option is that people who turn 65 today will, on average, collect Social Security benefits for significantly longer than retirees did in the past; the average lifespan in the United States is expected to continue to lengthen. Over the next 25 years, for example, the Social Security trustees project that life expectancy at age 65 will increase from 18.1 years to 19.5 years. Therefore, a commitment to provide retired workers with a certain monthly benefit at age 65 in 2030 is more costly than is that same commitment made to today's recipients. Linking the normal retirement age to future increases in life expectancy is one way of dealing with that source of the program's rising costs.

An argument against this option is that it would create a somewhat stronger incentive for older workers nearing retirement to apply for disability benefits. Under current law, workers who retire at age 62 in 2033 would receive 70 percent of their primary insurance amount (the benefit they would have received if they had claimed benefits at their normal retirement age); if they qualified for disability benefits, however, they would receive 100 percent of that amount. Under this option, workers who retire at 62 in 2033 would receive only 55 percent of their primary insurance amount; they would still receive 100 percent if they qualified for disability benefits. To eliminate that added incentive to apply for disability benefits, policymakers could narrow the difference by also reducing scheduled disability payments-for example, by setting the benefits for disabled workers at the amount they would have received upon retiring at age 65.

RELATED CBO PUBLICATIONS: *Measuring Changes to Social Security Benefits*, Fiscal Policy Brief 11, December 1, 2003; Jae Song and Joyce Manchester, "Have People Delayed Claiming Retirement Benefits? Responses to Changes in Social Security Rules," Congressional Budget Office Working Paper 2008-04, May 2008

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RELATED OPTIONS: 650-1 and 650-4

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays	-100	-300	-900	-1,700	-2,800	-5,800	-44,500	

### 650-3—Mandatory

## Lengthen by Three Years the Computation Period for Social Security Benefits

As required by law, the Social Security Administration calculates retirement benefits on the basis of a worker's wage history, using the average indexed monthly earnings, or AIME. The current formula computes the AIME on the basis of a beneficiary's highest 35 years of earnings that are subject to Social Security taxes.

This option would gradually lengthen the AIME computation period to 38 years of earnings for people who turn 62 in 2012 and beyond. The extended averaging period would generally reduce benefits by requiring that additional years of lower earnings be factored into the benefit computation.

Lengthening the period by three years would reduce federal outlays by about \$6 billion through 2014 and by nearly \$45 billion through 2019. By 2050, Social Security outlays would be reduced by 2 percent—or, measured as a share of gross domestic product, from 5.8 percent to 5.6 percent.

An argument in support of expanding the computation period considers increased life expectancy: Because people now live longer, lengthening the period would encourage them to remain in the labor force longer and extend the amount of time they pay into the Social Security system. Extending the period also would reduce the advantage currently enjoyed by workers who postpone entering the labor force, for instance, while they pursue advanced education. People with more education generally earn more than their counterparts who enter the labor force sooner, but with lower-paying jobs. Because many years of low or no earnings can now be ignored in calculating the AIME, the former group experiences little or no loss of benefits for any additional years spent not working and thus not paying Social Security taxes.

An argument against this option is that some beneficiaries retire early because of circumstances they do not control, such as poor health or job loss, and this option could adversely affect those recipients who were least able to continue working. Other disproportionately affected workers would be those who did not work for significant periods, such as parents who interrupted a career to raise children or workers who experienced long stretches of unemployment.

# Base Social Security Cost-of-Living Adjustments on an Alternative Measure of Inflation

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays	0	0	0	-4,600	-10,400	-15,000	-108,100	

Each year, as specified by law, the Social Security Administration adjusts recipients' monthly benefits. The 5.8 percent cost-of-living adjustment (COLA) that went into effect in January 2009 was based on the increase in the consumer price index for urban wage earners and clerical workers (CPI-W) between the third quarters of 2007 and 2008. (That index is calculated by the Bureau of Labor Statistics, or BLS.) The Social Security Administration starts raising basic benefits to correspond to the percentage increase in the CPI-W after workers become eligible for benefits—for retired workers, at age 62.

The CPI-W, however, can overstate inflation because it does not fully account for changes in patterns of spending. This option would set the COLA equal to the growth in the chained consumer price index for all urban consumers. (The chained CPI-U is an alternative measure of inflation also developed by BLS.) The Congressional Budget Office estimates that, on average, the chained CPI-U is likely to grow 0.3 percentage points more slowly than the CPI-W over the next 10 years. That change would reduce federal outlays by \$15 billion over five years and by \$108 billion through 2019. Because CBO projects that there will be no COLAs-under current law-from 2010 through 2012, the proposal would have no effect on outlays until 2013. (Using the same measure for all benefit programs that are indexed for inflation would reduce federal spending by \$20 billion over the five-year period and by nearly \$140 billion through 2019.) By 2050, such action would have reduced Social Security outlays by 4 percent—or, measured as a percentage of gross domestic product, from 5.8 percent to 5.5 percent. The bulk of that reduction (in percentage terms) would be achieved by 2035.

Other options that would reduce Social Security outlays—by constraining the increase in initial benefits (Option 650-1), for example, or by raising the normal retirement age (Option 650-2)—would affect future beneficiaries only. This option, by contrast, would reduce benefits to current beneficiaries so that current and future generations would bear the reductions more equally. Under options that would permanently reduce the rate of growth of Social Security outlays, savings would compound over time. This option, in contrast, would reduce that growth rate only temporarily. After about 30 years, aggregate spending growth would be the same as it would be under current law, but outlays would be at a permanently lower level.

A rationale for this option is that if, as many analysts assert, the CPI-W overstates increases in the cost of living, then using the chained CPI-U would reduce federal outlays but ensure that benefits did not fall any lower in real (inflation-adjusted) terms than they were when recipients became eligible for the program. The CPI-W measures inflation on the basis of price changes for a fixed basket of goods. According to many analysts, that method fails to fully account for increases in the quality of existing products, the value of newly introduced products, or the extent to which households can maintain their standard of living by substituting one product for another when the price of a good changes relative to the prices of all other goods. BLS created the chained CPI-U to address that "substitution bias."

Although the chained CPI-U more closely reflects changes in the cost of living than the CPI-W does, the chained CPI-U is subject to revision over two years. (For more details, see the discussion in Revenue Option 6.) Therefore, it would be necessary to base the adjustment for each year on the cumulative index value from a base year several years in the past. In that way, the revisions would not distort the usefulness of the index.

An argument against reducing the COLA is that the prices faced by Social Security beneficiaries could rise faster than do prices faced by the population at large. For example, beneficiaries are likely to spend more than younger people do for medical care, the price of which

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generally outpaces inflation overall. BLS computes an experimental consumer price index for the elderly (the CPI-E) that aims to track inflation for the population ages 62 and older. From 1983 through January 2009, the CPI-E grew faster than the CPI-W by an average of 0.3 percentage points per year. The difference was attributable mainly to costs for medical care, which rose 2.5 percentage points faster than the CPI-W as a whole.

Another potential drawback of this option is that a reduction in the COLA would generally have a larger effect on the oldest beneficiaries and on those who ini-

RELATED OPTIONS: 600-3, 650-1, 650-2, and Revenue Option 6

tially became eligible for Social Security on the basis of a disability. For example, if benefits were adjusted every year by 0.3 percentage points less than the increase in the CPI-W, beneficiaries would face a reduction in benefits at age 75 of about 4 percent compared with what they could have received under current law; at age 95, they would face a reduction of about 9 percent. To protect vulnerable populations, lawmakers might choose to reduce the COLA only for beneficiaries whose income or benefits were greater than specified amounts. Doing so, however, would reduce the option's potential savings.

### 650-5—Mandatory

## Reduce the Spousal Benefit in Social Security from 50 Percent to 33 Percent

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays	*	-100	-200	-400	-800	-1,500	-18,200	
Note: * = between -\$50 million and zero.								

Under current Social Security law, an eligible spouse of a retired or disabled worker is entitled to a spousal benefit that is equal to 50 percent of the worker's benefit. To be eligible, the spouse of the worker must be at least age 62 or caring for an eligible child, and the spouse receives that amount only if it is higher than the spouse's own earned benefit. In such cases, a couple's combined benefit would be 150 percent of the higher earner's benefit. Otherwise, the benefit would range from 150 percent to 200 percent of the higher earner's benefit. (It would be 200 percent only if both spouses earned the same benefit.) Upon the death of either spouse, the survivor's benefit is generally set equal to 100 percent of the higher earner's benefit.

This option would reduce the spousal benefit to 33 percent of the benefit of the higher-earning spouse for workers who become eligible for Social Security benefits in 2010 or later; it would reduce federal outlays by \$1.5 billion over 5 years and by about \$18 billion over 10 years. In 2020 and later, Social Security outlays would be reduced by about 1 percent.

A rationale for implementing this option is that it would strengthen the connection between taxes paid and benefits received. When the current rules for the spousal benefit were established, households in which only the husband worked were considered typical, and the spousal benefit was designed to ensure adequate benefits for such couples. However, those rules weaken the link between the Social Security taxes that are paid and the benefits that are received. Relative to Social Security taxes paid, a one-earner couple currently receives substantially higher benefits than either a single worker who has the same earnings history or a two-earner married couple. Reducing the benefit to couples has been proposed in combination with increasing the benefit paid to surviving spouses; implementing the changes together would effectively transfer income from couples to survivors. With the death of a spouse, a survivor faces not only reduced Social Security benefits but potentially lost pension and wage income as well. As a result, widows and widowers are more likely than are married couples to be poor. In 2006, 4.4 percent of married people over the age of 65 were poor, compared with 13.9 percent of widows and widowers in the same age group.

Moreover, larger households benefit from economies of scale. For example, housing that is suitable for two people usually costs less than twice that for two people living separately, so it is less expensive for a two-person household to maintain a standard of living that is the same as that for two one-person households. The Census Bureau's poverty measures, created many years ago, imply that the cost of living for a two-person elderly household is only 26 percent higher than that for a one-person elderly household. If that is correct, a 33 percent spousal benefit would more accurately account for the cost of supporting a two-person household.

An argument against this option is that the economies of household size are hard to compute and may be smaller than the Census Bureau's estimate. A National Research Council panel in 1995 estimated that the household costs for a couple are about 60 percent higher than for a person who lives alone. Another argument against this option is that it would reduce benefits for spouses who stay home to raise children.

Eliminate the Social Security Lump-Sum Death Benefit											
						Total					
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Outlays	-170	-200	-200	-200	-200	-970	-1,920				

### 650-6—Mandatory

When a married Social Security beneficiary dies, his or her spouse receives a lump-sum benefit of \$255. The payment is made regardless of whether the married couple shared a domicile, so long as the survivor is eligible for Social Security benefits on the basis of the beneficiary's earnings record. If the deceased beneficiary had no spouse but there is a child who is eligible for dependent benefits, the death benefit is paid to the child. No payment is made if there is no eligible spouse or child. In about 45 percent of the cases of death among Social Security participants, the Social Security Administration pays lump-sum death benefits to a spouse or dependent. In calendar year 2007, about 800,000 such payments were made, for outlays of \$203 million.

This option would eliminate lump-sum death payments to survivors of beneficiaries who die after September 30, 2009, thus reducing federal outlays by almost \$1.0 billion through 2014.

Although the original 1935 Social Security Act did not provide for survivors' benefits, it included a lump-sum benefit to be paid if a worker died before the statutory retirement age. When monthly survivors' benefits were introduced in 1939, the lump-sum death benefit was changed and paid only in cases in which no one was entitled to survivors' benefits on the basis of the deceased person's earnings. The lump-sum death benefit went either to a family member or to an individual who helped pay burial expenses. The amount of the payment was linked to the monthly benefit that the deceased worker would have received had he or she lived. In 1950, lawmakers expanded eligibility for the lumpsum benefit, which was provided even when survivors' benefits also were paid. As a result, the benefit was paid in the case of nearly every death, sometimes to distant relatives or funeral homes. In 1954, policymakers capped the benefit at \$255. That limit applied more and more frequently, as monthly benefits increased, and by the mid-1970s virtually all payments were \$255. In 1981, legislation narrowed eligibility for the benefit to its current conditions. (Although the payment is still frequently called a "burial" benefit, it is no longer linked to burial expenses.)

Supporters of eliminating the lump-sum death benefit note that because the payment is small, the cost of administering it, measured as a percentage of the payment, is relatively high: Administrative expenses account for 1 percent of total Social Security outlays but about 7 percent of outlays for the lump-sum death benefit. And because the death benefit is fixed in nominal terms, administrative expenses are likely to account for a growing share of outlays for the death benefit.

Opponents of the option maintain that although the benefit is relatively small, it is of value to many survivors, who receive it at a time of extra financial pressures. If the lump-sum benefit is to be eliminated, opponents argue that such action should be taken as part of a set of broader changes to Social Security that would protect low-income participants from reductions in their total benefits.

# Require Children Under Age 18 to Attend School Full Time as a Condition of Eligibility for Social Security Benefits

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Outlays	-20	-100	-170	-170	-170	-630	-1,570	

The unmarried children of retired, disabled, or deceased workers may qualify for Social Security benefits if they are under the age of 18, regardless of their educational status. After that, benefits generally continue only as long as they are enrolled in secondary school. Eligibility continues until the second month after they turn 19 or until they complete the school year in which they celebrate their 19th birthday—whichever comes first. To qualify for benefits before that cutoff date, those older children must provide the Social Security Administration (SSA) with a statement by a school official certifying their attendance. (Students need not attend school during summer breaks as long as they plan to return in the fall.) Students who are homeschooled or participating in GED (General Education Development) programs may qualify for benefits, depending on state law. In December 2008, SSA paid benefits to about 142,000 student beneficiaries. (Fifty percent were survivors of deceased beneficiaries, about 40 percent were children of disabled workers, and the remainder were children of retired workers.)

This option would extend the attendance requirement to child beneficiaries who are age 16 or 17 and who have not graduated from high school. No benefits would be paid for any month in which the child did not meet the requirement of full-time school attendance. In 2007, about 810,000 16- and 17-year-olds received a total of about \$5.1 billion in Social Security benefits. About 4 percent of those beneficiaries did not attend school. The Congressional Budget Office's estimates of the reductions in outlays under this option incorporate the assumption—which is highly uncertain—that the option would reduce the number of those dropouts by one-quarter. Under that assumption, outlays would fall by about \$630 million over five years.

Proponents of this option note that it would encourage children who are eligible for the benefit to remain in school. However, an argument against the option is that the requirement to collect attendance information on 16- and 17-year-old beneficiaries would increase SSA's administrative costs along with those for schools and affected beneficiaries. In addition, opponents say, the option could reduce benefits for families with children who do not attend school because of mental or emotional disabilities. SSA could make exceptions in such cases, but doing so would increase administrative costs and could entail delays in benefits. Another argument against the option is that it would reduce the income of affected families that already could face financial pressures because of a parent's death or disability.

						То	otal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-100	-200	-500	-800	-1,000	-2,600	-8,700

### 650-8—Mandatory

## Eliminate Social Security Benefits for Children of Early Retirees

Social Security benefits go to retirees, their dependents, and some other classes of people as well. The unmarried children of retired workers generally qualify for Social Security benefits if they are under the age of 18, if they are 18 and still in high school, or if they become disabled before age 22. A child's benefit is equal to one-half of a parent's basic benefit, subject to a dollar limit on the amount that a family may receive.

This option would eliminate benefits for children of retirees who have not yet reached the normal retirement age, beginning with retirees who will reach age 62 in 2010. The option would reduce federal outlays by \$2.6 billion over the period from 2010 to 2014.

An advantage of this option is that it would encourage some would-be early retirees to remain in the labor force longer. Benefits for retired workers and their spouses currently are reduced if a worker retires before the normal retirement age, although benefits are not reduced for the children of that worker. An additional consideration is that younger workers are more likely than their older counterparts to have children under the age of 18. Thus, workers who have not yet reached the normal retirement age have an incentive to retire while their offspring are still eligible for benefits. (That incentive is quite small for families in which spouses also are entitled to dependents' benefits. Because of the limit on total family benefits, any increase that is attributable to a family's eligible children in such cases may not exceed 38 percent of the amount on which a worker's benefits are based.)

A potential disadvantage of this option is that families of workers who do not retire voluntarily—who, for example, retire because of poor health and yet do not qualify for disability benefits—might experience hardship attributable to the loss of family income. Moreover, because spouses who are younger than 62 receive benefits only if they have children who are under the age of 16 or are disabled, eliminating children's benefits for families of early retirees would result in a total loss of benefits for spouses in those families. In such cases, the loss of income generally would be significant. (The option could be adjusted so that those spouses continued to receive benefits, although the reduction in outlays would be a bit smaller.)

A modified approach to this option would apply the same actuarial reduction to children's benefits that is applied to workers' benefits. Thus, the child of a worker who retired three years before the normal retirement age would receive a maximum of 40 percent of the parent's basic benefit instead of the 50 percent that is currently allowed. The total reduction in outlays would, depending on the year being considered, represent a quarter to a half of the potential savings from eliminating benefits for children of early retirees. Although such a modified approach would have a smaller effect on federal outlays than the elimination of benefits would have, it would protect workers who had young children from experiencing large losses in benefits. That approach also would retain most of the incentive for workers to retire early.

### 650-9—Mandatory

# Require State and Local Pension Plans to Share Data with the Social Security Administration

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	0	0	0	-160	-310	-470	-2,430

Two provisions of Social Security law—the government pension offset and windfall elimination—reduce benefits for people who receive pension income for work not covered by Social Security (such as some state or local government jobs.) To apply those provisions accurately, the Social Security Administration (SSA) must know which beneficiaries are receiving that pension income. The federal Office of Personnel Management provides data to SSA that identify workers who receive federal government pension benefits; SSA relies on beneficiaries to report on income from state or local governments.

This option, which is included in the Administration's 2010 budget request, would require state and local governments to notify SSA of pension benefits from noncovered employment provided to retirees or other beneficiaries. Implementing a system to collect and administer that information would take several years, but payments would be reduced for about 60,000 beneficiaries annually, and federal outlays would fall by \$160 million in 2013 and by \$470 million through 2014. Part of that change—about half in 2013, falling to 13 percent by 2019—would stem from recovering overpayments by reducing future payments to beneficiaries who had not reported state and local pension income.

Social Security is structured to replace more earnings for workers with low earnings over a career than for higherearning workers. But it does not differentiate people whose career earnings are low from those who appear to have low career earnings because some earnings were not covered by Social Security. If the formula was applied without an adjustment, recipients of government pensions would receive benefits that, relative to their Social Security payroll taxes, would be larger than benefits to workers with similar lifetime earnings. The windfall elimination provision offsets that extra benefit.

Under the standard benefit formula, one class of beneficiary—dependent spouses—collects retirement benefits

based on the earnings of their spouses or ex-spouses. If the primary earner is retired or disabled, the dependent spouse generally receives benefits equal to half the primary earner's benefits; if the primary earner is deceased, the dependent spouse generally receives benefits equal to the primary earner's. In both cases, spousal benefits are effectively reduced dollar for dollar by any Social Security benefits that the dependent spouse earned on his or her own. Under the government pension offset, spousal benefits also are reduced, but by \$2 for every \$3 in pension benefits from government employment not covered by Social Security. That approach effectively treats twothirds of the pension income from noncovered employment as equivalent to Social Security benefits.

Although beneficiaries subject to the government pension offset or windfall elimination provision are required to inform SSA if they receive pension benefits from noncovered jobs, in about 4 percent of those cases, SSA does not obtain that information. Under this option, state and local governments would be required to submit the necessary data electronically, thus giving SSA access to the same data on state and local government pension income that it has for federal pension benefits.

An advantage of this option is that it would allow SSA to compute benefits more accurately. Federal pensioners and state and local pensioners typically are subject to the government pension offset and windfall elimination provision, but state and local pensioners who do not report information accurately might receive benefits to which they are not entitled.

A disadvantage of this option is that it would increase the administrative burden on state and local governments, although those costs would be relatively small because those governments already provide the Internal Revenue Service with data on pensions.

### 650-10—Mandatory

# Increase Social Security Benefits for Workers Who Have Low Earnings Over a Long Working Lifetime

						Tot	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	400	2,000	4,600	7,700	11,300	26,000	147,100

Social Security benefits generally are calculated on the basis of a worker's average wages over the course of his or her career. Under the standard formula, retired people who had low lifetime earnings receive the same benefits regardless of whether they were out of the workforce for some period (perhaps because they were raising children) or because they consistently received low earnings over the course of a career. Recognizing that workers with consistently low annual earnings are more likely to be in financial need than are people who worked intermittently but for high annual earnings, policymakers established a second formula in 1972, the "special minimum benefit," to give participants the higher of the standard benefit or the special minimum benefit. Unlike the standard formula, in which average benefits grow with average wages, the special minimum formula is indexed to prices. Because wages generally grow faster than prices, the gap between the two formulas is continually shrinking. Each year, fewer people gain from the minimum benefit, and those who do, gain less. The special minimum is projected to provide no advantage to those who become eligible in 2011 and later.

This option, which was an element of Plan 2 of the President's 2001 Commission to Strengthen Social Security, would replace the special minimum benefit with an enhancement for participants who worked many years but had low average wages. The provision would apply to workers who become eligible to claim benefits in 2010 and later. All benefits would be based on the standard formula, but benefits for some workers would be multiplied by an additional factor. This option would increase federal outlays by \$26 billion over 5 years and by \$147 billion over 10 years, reflecting offsetting savings in the federal share of the Supplemental Security Income and Medicaid programs. By 2050, the option would increase Social Security outlays by 7 percent—or, measured relative to the size of the economy, from 5.8 percent to 6.1 percent of gross domestic product.

This option would increase the standard benefit for workers who had more than 20 years of work to their credit but whose average indexed monthly earnings were below those of workers who earned twice the minimum wage for 35 years of full-time work. The effect would be greater for beneficiaries who had more years of work and for those who had lower average indexed monthly earnings. For example, the benefit would be increased by 40 percent for workers who worked full time for 30 years but never earned more than the minimum wage.

Although this option would help those workers whom the special minimum benefit was also designed to assist those with a history of consistently low annual earnings—a drawback is that it would not distinguish between workers who had low annual earnings because they earned low hourly wages and those who had higher hourly wages but worked for only part of the year.

### 650-11—Mandatory

### Require Social Security Beneficiaries Who Withdraw Their Applications to Pay Interest on Returned Benefits

The Social Security Administration (SSA) allows people who have applied for retirement benefits to withdraw their applications at any time and for any reason; they then cease to receive monthly payments. To effect the change, beneficiaries submit a form and repay any benefits received to that point. Interest is not added to repayments, regardless of how long retirees collect benefits. Retirees are permitted to reapply for benefits at any time.

Some beneficiaries choose to withdraw because they have continued to work or have reentered the workforce. But because a later application results in higher monthly benefits, some beneficiaries withdraw their applications solely to increase their monthly payments.

Consider the example of a man born in 1945 who could retire at age 62 and claim a monthly benefit of \$1,500. If he survived until age 70 and then claimed benefits, however, he would receive \$2,640 per month, although he would have forgone \$144,000 he could have collected in benefits from age 62 through age 69. Under the current policy, he could have claimed benefits at age 62, then withdrawn his application just as he turned 70, repaid the \$144,000 he received over that time, and claimed benefits again. He would then begin to receive \$2,640 per month and would keep any investment income he earned on the original \$144,000.

This option would require Social Security beneficiaries who withdraw applications for benefits to pay interest on any repayments they make. The requirement would produce some revenue from interest payments, but the likely primary effect would be to deter retirees from withdrawing their benefit applications simply to receive interest-free loans from the government. (The Congressional Budget Office has no basis for estimating the number of people who would pursue the strategy under current law and thus cannot meaningfully estimate the budgetary effects of the option or present a table showing any estimates of budgetary changes that would result.)

This strategy was not widely known before 2008, and SSA estimates that only a few people have chosen to pay back benefits as a way to increase future payments. An evaluation by the Social Security Inspector General estimated that in calendar years 2004 through 2008, only about 220 retired beneficiaries repaid more than \$15,000 to obtain higher monthly payments. If trends continued, the option would have virtually no effect on Social Security outlays, although numerous media outlets have publicized the opportunity in the past year, and the number of people pursuing it could increase substantially.

One rationale in this option's favor is that it would eliminate the opportunity current law gives to knowledgeable beneficiaries to receive what effectively are interest-free loans from the federal government. However, this option also would apply to people who withdrew from receiving benefits for other reasons, such as an unexpected need to return to work. Its effects on those people could be mitigated, however, if it exempted beneficiaries who withdrew shortly after making an initial application or whose repayment amounts were below a specified threshold.

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## **Veterans Benefits and Services**

enefit programs for military veterans, most of them run by the Department of Veterans Affairs (VA), include health care, disability compensation, pensions, life insurance, housing loans, education, training, and vocational rehabilitation. The Congressional Budget Office estimates that outlays for budget function 700 will total about \$95 billion in 2009, about \$47 billion of which will be in discretionary outlays.

Spending on disability compensation, a mandatory program, increased significantly—by 38 percent over five years—from about \$26 billion in 2004 to about \$36 billion in 2008. That growth resulted primarily from the increased caseloads arising from a push by VA to reduce a backlog of pending cases and from the addition of newly compensable diseases.

In recent years, lawmakers have also expanded health benefits for veterans, thus increasing spending on those programs. Outlays for medical care, which are subject to appropriation, rose from roughly \$27 billion in 2004 to \$37 billion in 2008, an increase of 37 percent. Mandatory spending for education, training, and vocational rehabilitation benefits increased slightly from \$2.5 billion in 2004 to \$2.7 billion in 2008.

						Estimate	Average Annual Rate of Growth (Percent)		
	2004	2005	2006	2007	2008	2009	2004-2008	2008–2009	
Discretionary Budget Authority	29.2	32.3	34.2	38.4	43.8	49.4 <sup>a</sup>	10.6	12.8	
Outlays									
Discretionary	28.6	30.5	32.4	35.4	41.2	46.8	9.5	13.6	
Mandatory	31.2	39.7	37.4	37.4	43.5	48.6	8.7	11.6	
Total	59.8	70.2	69.8	72.8	84.7	95.3	9.1	12.6	

a. Includes \$1.4 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

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700-1—Mandatory

## Reduce Veterans' Disability Compensation to Account for Social Security Disability Insurance Payments

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-1,780	-1,850	-1,930	-2,000	-2,070	-9,630	-21,150

Approximately 3 million veterans—about 2 million of whom are under age 65—receive compensation from the Department of Veterans Affairs (VA) for their serviceconnected disabilities. The amount is based on a rating of an impairment's effect on a veteran's earnings capacity, on average; disability ratings range from zero to 100 percent. Additional allowances are paid to veterans whose disabilities are rated 30 percent or higher and who have dependent spouses, children, or parents.

Veterans with disabilities may also qualify for cash payments from other sources, including workers' compensation; private disability insurance; means-tested program benefits, such as Supplemental Security Income; and, for veterans under 65, the Social Security Disability Insurance (DI) program. About 146,000 veterans who receive disability compensation from VA also receive DI payments. When Social Security beneficiaries are eligible for disability benefits from more than one source, ceilings usually limit combined disability benefits from public sources to 80 percent of a recipient's average predisability earnings. Those DI payments-after any reduction-are adjusted periodically to reflect changes in the cost of living and in national average wages. Veterans' compensation payments for disabilities are not considered for that purpose, however, and thus do not apply toward limits.

That same exclusion applies to means-tested benefits and to some benefits that are based on public employment.

This option would limit disability compensation for veterans who receive VA disability benefits and DI payments. The option would reduce VA's disability compensation by the amount of the DI benefit. Applying that change to current and future recipients of veterans' compensation would affect an estimated 153,000 recipients in 2010, saving almost \$1.8 billion that year and approximately \$9.6 billion between 2010 and 2014. Applying the change only to veterans who are newly awarded compensation payments or DI payments would affect an estimated 3,000 recipients in 2010, saving about \$40 million in outlays that year and about \$1.1 billion through 2014.

A rationale in favor of this option is that it would eliminate duplicate public compensation for a single disability. An argument against it is that the change would subject veterans' disability benefits to a form of means-testing (VA benefits are considered entitlements). Moreover, to the extent that this option applied to current DI recipients, some disabled veterans would have their income reduced.

750

## **Administration of Justice**

he cost of administering federal law includes funding for the judicial branch; the Departments of Justice and Homeland Security; financial and tax crime enforcement activities within the Department of the Treasury; and the operation of other independent agencies, such as the Equal Employment Opportunity Commission, the Legal Services Corporation, and the U.S. Sentencing Commission.

Most spending in function 750 is discretionary, and it has increased over the past five years at an average annual rate of 5.3 percent. Budget authority for 2009 includes \$5.2 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5), most of it for grants from the Department of Justice to state and local governments for law enforcement assistance. The limited mandatory spending in this function has averaged less than \$1 billion annually. The exceptional year was 2004, when some \$6.4 billion in victim compensation payments was recorded as a result of the terrorist attacks of September 11, 2001. Spending for this function is projected to reach nearly \$50 billion in 2009, an increase of 5.9 percent over 2008.

Federal Spending, Fiscal Years 2004 to 2009 (Billions of nominal dollars)											
						Estimate	Average Annual Rate of Growth (Percent)				
	2004	2005	2006	2007	2008	2009	2004-2008	2008–2009			
Discretionary Budget Authority	37.9	39.4	41.1	43.7	46.9	54.4 <sup>a</sup>	5.5	15.9			
Outlays											
Discretionary	38.0	39.3	40.3	40.6	46.7	48.1	5.3	2.9			
Mandatory	7.6	0.7	0.7	0.7	0.4	1.8	-51.5	337.9			
Total	45.6	40.0	41.0	41.2	47.1	49.9	0.8	5.9			

a. Includes \$5.2 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-728	-733	-738	-742	-749	-3,689	-7,606	
Outlays	-139	-354	-513	-636	-739	-2,380	-6,202	

### 750-1—Discretionary

## **Reduce Funding for Certain Department of Justice Grants**

The Department of Justice (DOJ) carries out law enforcement activities directly, but it also has five grant programs that assist nonprofit community organizations and state and local law enforcement agencies, each of which is funded in a separate account in the federal budget. The programs are as follows: State and Local Law Enforcement Assistance, Justice Assistance, Juvenile Justice, Community Oriented Policing Services (COPS), and Violence Against Women.

The assistance provided through those programs will total nearly \$6.9 billion in 2009, including \$4.0 billion provided in the American Recovery and Reinvestment Act of 2009 (Public Law 111-5). This option would further reduce such financial assistance by 25 percent, saving \$139 million in 2010 and about \$2.4 billion between 2010 and 2014.

Grant recipients use the funds for an array of activities, including the purchase of body armor and other equipment for law enforcement officers and the improvement of DNA analysis and other forensic activities conducted by state and local police agencies. Other supported activities include substance abuse treatment programs for prisoners; funding for Boys and Girls Clubs; research, development, and evaluation of state justice programs; and the collection and analysis of statistics and information on the judiciary. Critics of federal spending for law enforcement assistance argue that DOJ directs much of its funding toward problems that are not the responsibility of the federal government. According to figures published by the Bureau of Justice Statistics, state and local governments spent about \$180 billion on criminal justice activities in 2006, whereas the federal government spent just under \$40 billion on those activities. Instead, critics say, the federal government should concentrate on funding national security efforts.

Critics also argue that resources are used inefficiently and that financial assistance could be scaled back substantially with few consequences for the nation's law enforcement capabilities. For example, the Government Accountability Office has reported that grants awarded through the COPS program made only a modest contribution to declines in crime in the 1990s.

Opponents of the option maintain that the federal government has a vital role in augmenting the resources of the states and in directing funds to areas of critical need. In some cases, they argue, the problems those funds address are national, and without the incentive of federal grants, the states might neglect such problems because of the scarcity of resources. Therefore, those advocates assert, such federal assistance helps make many communities safer.

Eliminate the Legal Services Corporation										
						То	tal			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	-394	-396	-398	-400	-404	-1,992	-4,101			
Outlays	-355	-396	-398	-400	-404	-1,953	-4,058			

### 750-2—Discretionary

The Legal Services Corporation (LSC) was first authorized in 1974 as a private, nonprofit organization with authority to distribute grants to local entities that provide civil legal assistance to low-income clients. Today, it awards competitive grants for one to three years to designated service areas covering the United States and its five territories. The LSC's appropriation from the Congress for 2009 was \$390 million.

Each year, the LSC's appropriation contains language that restricts its use of funds for certain activities. Neither funds appropriated by the Congress nor those otherwise generated may be used for political activities, such as advocacy, strikes, or demonstrations; class-action lawsuits; client solicitation; or cases involving abortion, partisan redistricting, drug-related eviction, or welfare reform. Organizations that receive LSC funding may not collect attorneys' fees or represent prisoners or illegal residents (except for victims of domestic or child abuse).

This option would terminate funding for the LSC beginning in 2010. That change would reduce discretionary outlays by \$355 million in 2010 and by almost \$2 billion over the next five years. One rationale for this option is that providing legal services to the poor is properly the duty of state and local governments because they can be more responsive to local needs. In fact, programs that receive LSC grants already receive some resources from states, localities, and private entities, as well as from private attorneys involved in pro bono work. Moreover, critics of the program argue that, despite the restrictions already placed on the LSC, the activities of legal services lawyers too often focus on social causes rather than on meeting the needs of poorer people with routine legal problems.

Those in favor of continued support for the LSC argue that, despite funding from outside sources, contributions from the federal government represent more than half of the funding for LSC grantees, on average, and remain the single largest and most important funding source for civil legal services nationally. LSC-funded programs resolve nearly one million cases per year, more than 60 percent of them involving family or housing law. Even so, LSC estimates that approximately half of the people who seek legal assistance are turned away now. Eliminating the LSC would remove a reliable source of funding for legal assistance for low-income people.

800

## **General Government**

he general government function funds programs in the legislative and executive branches that support the basic responsibilities of the federal government. The programs in function 800 fit into three broad categories revenue collection and financial management, general administration, and personnel operations—and can include assistance to state and local governments. The Internal Revenue Service accounts for the greatest share of spending (almost \$11 billion in 2009). Large expenditures include payments for claims and judgments against the U.S. government, the General Services Administration's Federal Buildings Fund, and salaries and expenses for the Congress and legislative branch agencies.

The Congressional Budget Office estimates that total outlays for function 800 in 2009 will be nearly \$22 billion—almost \$19 billion in discretionary spending. Over the previous five years, spending for the function decreased at an average annual rate of just over 2 percent (to about \$20 billion), although discretionary outlays increased by about 1 percent a year. The large increase in discretionary budget authority for 2009 is attributable primarily to about \$5.5 billion in additional funds for the Federal Buildings Fund and about \$3 billion in lowincome housing credits provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

	2004				2007 2008	Estimate 2009	Average Annual Rate of Growth (Percent)	
		2005	2006	2007			2004-2008	2008-2009
Discretionary Budget Authority	16.9	15.9	16.7	16.6	17.3	24.6 <sup>a</sup>	0.7	42.1
Outlays								
Discretionary	16.1	16.5	16.0	15.9	16.9	18.9	1.2	11.8
Mandatory	6.3	0.6	2.2	1.6	3.5	2.8	-13.8	-18.9
Total	22.3	17.0	18.2	17.5	20.3	21.7	-2.3	6.6

a. Includes \$6.2 billion provided by the American Recovery and Reinvestment Act of 2009 (Public Law 111-5).

#### IN ADDITION TO THE SPENDING OPTIONS FOR BUDGET FUNCTION 800, SEE THE FOLLOWING REVENUE OPTION:

Revenue Option 8 Limit or Eliminate the Deduction for State and Local Taxes

«CBO»

800

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-204	-205	-206	-207	-209	-1,031	-2,123	
Outlays	-204	-205	-206	-207	-209	-1,031	-2,123	

#### 800-1—Discretionary

## Eliminate General Fiscal Assistance to the District of Columbia

The Constitution gives the Congress responsibility for overseeing the District of Columbia-a task delegated largely to the city's government under the Home Rule Act of 1974. However, the Congress reviews and approves the District's proposed annual budgets and appropriates money to the city each year. Under the National Capital Revitalization and Self-Government Improvement Act of 1997, the federal government reduced the annual payment of general assistance to the District. In exchange, the federal government agreed to fund the operations of the District's criminal justice, court, and correctional systems; assumed responsibility for paying off more than \$5 billion in unfunded liabilities that the city owed to several pension plans; raised the federal share of the District's Medicaid spending from 50 percent to 70 percent; and provided special borrowing authority to the city.

This option would eliminate fiscal assistance to the District that is not related to the specific obligations that the federal government assumed in the 1997 law. In 2009, such general assistance totals \$202 million: \$35 million in tuition support for city residents; \$54 million for school improvements and scholarships; \$20 million for education reform; \$54 million for general assistance that includes payments for laboratory facilities, libraries, and the water and sewer authority; and \$39 million for emergency planning and security. Ending such assistance would reduce federal outlays by \$204 million in 2010 and by about \$1 billion over five years.

800

The rationale for this option is that the federal government has already relieved the District of most of the cost of a substantial, and increasing, portion of its budget, covering criminal justice, Medicaid, and pensions. The proposed trade-off for assuming responsibility for those functions was ending other assistance, including the annual federal payment. Eliminating general assistance would be consistent with that policy. Moreover, the city's 2010 proposed budget includes nearly \$190 million in federal stimulus funding that provides direct budget relief and more than \$90 million in federal funding for operating grants. Since the Revitalization Act, the District has had 12 consecutive balanced budgets. In line with those fiscal improvements, its bond ratings have improved and debt-financing costs have fallen. Standard & Poor's, a leading credit-rating service, upgraded the District from B (a "junk bond" rating) in 1997 to A+ in 2005. Eliminating general assistance might give the District greater incentive to control wasteful spending. Critics of the city's government contend that, with a budget of \$10 billion in 2009, the District has the resources to provide a full range of services to its residents.

One argument against ending general assistance is that the District of Columbia has few alternative sources of revenue and is facing a drop in projected revenues of 6.5 percent in 2009 and 2.0 percent in 2010. Unlike many other cities, the District is prohibited from imposing commuter taxes on nonresidents who work in the city and benefit from its services. (Two of every three dollars earned in the District are earned by nonresidents.) More than 40 percent of city property—including property owned by the federal government or foreign nations—is exempt from local taxes.

Another argument against this option is that the District's difficulties—with public education, water and sewers, roads and bridges, delivery of health care, and public safety services—suggest the need for continuing federal assistance. Eliminating federal funding for the city's tuition assistance program—which enables District residents to pay in-state tuition rates at public colleges nationwide or to receive up to \$2,500 a year in financial aid at historically black colleges and universities—might undermine efforts to make the District more attractive to middle-class families. In recent years, some federal assistance has been earmarked for charter schools and tuition vouchers, which has allowed the Congress to use the District as a laboratory to test those education approaches.

#### 800-2—Mandatory

## Require the IRS to Deposit Fees for Its Services in the Treasury as Miscellaneous Receipts

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Outlays	-176	-177	-178	-181	-183	-895	-1,839

The 1995 appropriation act for the Department of the Treasury and various agencies authorized the Internal Revenue Service (IRS) to establish or increase fees for some of its services. Since then, the IRS has used that authority mainly to charge taxpayers for entering into payment plans. The 1995 act permitted the IRS to retain and spend the receipts collected from such fees. Previously, the amount that it was allowed to keep was limited. However, the 2006 appropriation act for the Department of the Treasury and various agencies removed that limitation. In 2008, the agency collected \$188 million in fee receipts.

This option would require the IRS to deposit all those fee payments into the Treasury as miscellaneous receipts, eliminating the agency's ability to spend them. The change would reduce the IRS's direct spending by \$176 million in 2010 and by \$895 million through 2014 (assuming that the removal of spending authority did not substantially reduce the amount that the IRS collected in fees). However, those savings would be lost if the agency's annual appropriations—about \$11 billion for 2009—were increased to make up for the lost fee receipts. One rationale in favor of this option is that processing payment plans for taxpayers is an administrative function directly related to the agency's mission—getting citizens to pay the taxes they owe—and thus is a function for which the agency already receives appropriations. Another is that the IRS does not directly use the receipts it collects from installment fees to pay for processing those agreements. Moreover, the current spending authority may give the agency an incentive to unnecessarily encourage taxpayers to pay their taxes in installments or to seek new and unnecessary fees. Finally, the current spending authority removes part of the IRS budget from the discipline of the annual appropriation process.

An argument against this option is that continuing to allow the IRS to generate and use fee receipts may help ensure that the federal government's main revenue collector has sufficient funding to fulfill its mission. A decrease of more than \$175 million in annual funding might negatively affect its ability to collect revenues. In addition, eliminating the spending authority could reduce the IRS's incentive to allow installment payments or its ability to provide for them, thus affecting taxpayers who would benefit from such arrangements.

Eliminate the Presidential Election Campaign Fund										
						Total				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	-52	-52	-52	-52	-52	-260	-520			
Outlays	0	-40	-215	-5	0	-260	-520			

#### 800-3—Mandatory

The Presidential Election Campaign Fund is financed exclusively by voluntary contributions from U.S. taxpayers, who can set aside \$3 (or \$6 on joint returns) of their annual federal income taxes for the program. The decision to contribute does not increase the amount someone pays in federal taxes. The fund provides matching funds for candidates in Presidential primaries, grants to sponsor political parties' Presidential nominating conventions, grants for the general election campaigns of major party nominees, and partial funding for qualified candidates in minor and new parties in the general election. All recipients of public funds must agree to abide by limits on contributions and spending and to comply with audits by the Federal Election Commission.

This option would eliminate the fund, saving \$40 million in 2011 and \$260 million over the 2010–2014 period, which includes one Presidential election. Some eligible candidates since 2000 have forgone public financing during primaries, however, and, in 2008, a major party's candidate for the first time opted out of public financing for the general election. If candidates from the major parties continued to decline public financing, then the savings from eliminating the fund could be substantially lower.

The Presidential Election Campaign Fund was devised in the early 1970s to reduce what lawmakers perceived to be the disproportionate influence (or the appearance of influence) of wealthy contributors. The demands of fund-raising, which prevented some candidates from adequately presenting their views to the public, and the rising cost of Presidential campaigns, which effectively disqualified candidates who did not have access to large sums of money, also were cited as reasons to create the fund.

Supporters of eliminating the fund argue that candidates have found numerous means of circumventing spending

limits, such as having political parties or special-interest groups pay for "issue advertisements." They contend that the fund does not obviate the need for fund-raising during the primaries: Candidates either focus on soliciting the private donations necessary to qualify for matching public funds or they rely solely on private donations to avoid the campaign spending limits imposed on those who receive public funding. Moreover, the ability of the Internet to help candidates raise considerable sums from small donors leads some observers to conclude that public financing is no longer needed to limit the influence of wealthy contributors. Supporters of this option also dispute the need to give public funding either to the already well-financed major parties and their candidates or to the minor parties and candidates, which historically have little chance of success. Finally, the proportion of taxpayers who set aside the contribution to the fund has dwindled over the past three decades to just 11 percent in 2006, suggesting that the program has little public support.

Opponents of this option assert that eliminating public financing of Presidential elections would leave candidates entirely dependent on private donations or personal wealth. They further argue that, to ensure participation from a variety of candidates, the program should in fact increase funding and raise spending limits. Some proponents of the fund suggest that an increase in the financial resources available to candidates should be funded by raising the amount taxpayers can set aside, from \$3 for individuals to \$10 and from \$6 to \$20 for married couples filing jointly. Finally, opponents of eliminating the fund argue that taxpayers' participation could be improved if the program's history and rationale—and the fact that participation does not increase a person's tax liability—were better publicized.

Emmate the National Youth Anti-Drug Media Campaign										
						Total				
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Spending										
Budget authority	-71	-71	-71	-72	-72	-357	-736			
Outlays	-64	-71	-71	-72	-72	-350	-728			

Eliminate the National Vouth Anti Daug Modia Campaign

#### 800-4—Discretionary

The National Youth Anti-Drug Media Campaign, administered by the Office of National Drug Control Policy, was established by the Congress in the Treasury and General Government Appropriations Act of 1998. The Office of National Drug Control Policy Reauthori- zation Act of 2006 expanded the language of the 1998 act and added many new program requirements. Under the
reauthorization act, the purpose of the campaign is to prevent drug abuse among young people, increase aware- ness among adults about the effects of drug abuse on young people, and encourage parents and other interested adults to discuss with young people the dangers of illegal drug use. Most of the campaign's funding goes to pur- chase advertising time or space in youth, adult, and eth-
nic media outlets, including national and local TV, radio, newspapers, magazines, the Internet, billboards, and movie theaters. The reauthorization act requires advertis- ing to be tested for effectiveness before it is released, and it requires an independent entity to evaluate the effective- ness of the entire campaign each year. Companies paid by the campaign to run antidrug advertisements are required to donate an equal amount of advertising time or space or to make other in-kind contributions to the antidrug effort.

This option would eliminate the National Youth Anti-Drug Media Campaign, saving \$64 million in outlays in 2010 and \$350 million over five years.

An argument in favor of this option is that there is no solid evidence that advertising is effective at reducing or preventing the use of illegal drugs. A multiyear national evaluation of the campaign completed in 2005 reported that the campaign did not reduce drug use among young people nationally. Some analysts assert that treatment and interdiction will do more than advertising to curtail drug use among young people. They also argue that the campaign duplicates other efforts, such as those of the nonprofit Partnership for a Drug-Free America, to educate young people about the dangers of drug abuse.

Opponents of eliminating the program maintain that educating young people about the hazards of illegal drug use is a national responsibility. They argue that a national antidrug media campaign is needed to counter messages in the mass media and popular culture that seem to promote drug use. Some point to surveys that have shown declines in teens' drug use in recent years as evidence of the success of the campaign. They also argue that the cost to the nation of drug abuse is so high that it is worthwhile to maintain a program that reduces drug use even slightly. «CBO»



he President's budget and the Congressional budget resolution sometimes include amounts in function 920 that reflect proposals that are not clearly specified or that would affect several budget functions. Because funding is ultimately provided for specific

purposes, the historical data show no budget authority or outlay totals for function 920. In this volume, function 920 includes options that cut across programs and agencies and that affect more than one budget function.

						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Spending								
Budget authority	-100	-100	-100	-100	-100	-500	-1,010	
Outlays	-40	-80	-110	-120	-130	-480	-1,170	

#### 920-1—Discretionary

## Raise the Threshold for Coverage Under the Davis-Bacon Act

Since 1935, the Davis-Bacon Act has required that federally funded or federally assisted construction projects under contracts that exceed \$2,000 pay workers no less than "prevailing wages" in the project's locality. The Department of Labor measures wages for such projects on the basis of the wages and benefits earned by at least 50 percent of workers in a particular type of job or on the basis of the average wages and benefits paid to workers for that type of job.

Raising the threshold for determining which projects are covered by the Davis-Bacon Act from \$2,000 to \$1 million would save \$480 million over five years, provided that federal agencies' appropriations were reduced to match the anticipated reduction in costs.

A rationale for raising the threshold is that it has remained the same for more than seven decades and raising it would allow the federal government to spend less on construction, although the option's precise effect on contractors' costs is difficult to estimate. An argument against such a change is that it could reduce the earnings of some construction workers and might jeopardize the quality of construction at federally funded or federally assisted work sites.

					Total	
2010	2011	2012	2013	2014	2010-2014	2010-2019
-16	-31	-32	-33	-33	-145	-320
-7	-16	-39	-64	-88	-215	-1,042
-5	-10	-10	-10	-10	-46	-101
-2	-5	-12	-20	-28	-68	-329
	-16 -7 -5	-16 -31 -7 -16 -5 -10	-16 -31 -32 -7 -16 -39 -5 -10 -10	-16 -31 -32 -33 -7 -16 -39 -64 -5 -10 -10 -10	-16 -31 -32 -33 -33 -7 -16 -39 -64 -88 -5 -10 -10 -10 -10	2010         2011         2012         2013         2014         2010-2014           -16         -31         -32         -33         -33         -145           -7         -16         -39         -64         -88         -215           -5         -10         -10         -10         -10         -46

#### 920-2—Discretionary and Mandatory

						Total	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Reduce Benefits at Retirement Age							
Change in mandatory outlays	-16	-31	-32	-33	-33	-145	-320
Change in discretionary outlays	-7	-16	-39	-64	-88	-215	-1,042
Eliminate Augmented Benefits							
Change in mandatory outlays	-5	-10	-10	-10	-10	-46	-101
Change in discretionary outlays	-2	-5	-12	-20	-28	-68	-329
Note: The approaches are not mutually	exclusive h	it the effects	s of impleme	onting both y	would he less	than the sum of the	ir individual effects

## **Reduce Benefits Under the Federal Employees' Compensation Act**

Federal civilian employees with work-related injuries or occupational diseases are eligible to receive compensation under the Federal Employees' Compensation Act of 1916 (FECA). The program, which is administered by the Department of Labor, provides wage replacement, medical, and vocational-rehabilitation benefits. A beneficiary with no dependents receives two-thirds of lost pay; a worker with at least one dependent receives augmented benefits that equal 75 percent of lost pay. The compensation continues throughout a worker's retirement years, even though in most instances FECA benefits substantially exceed a worker's normal retirement pay. Roughly 140,000 FECA claims were filed in 2006; of those, 55,000 resulted in long-term replacement benefits to federal employees or their families (averaging about \$36,000) for a job-related injury, disease, or death. About three-fourths of those beneficiaries received augmented benefits. More than 60 percent of the beneficiaries were at least 55 years old.

This option would reduce FECA benefits in one of two ways. The first approach would give beneficiaries age 55 or older a separate FECA annuity equal to two-thirds of the benefit they would have received under current law. The second approach would eliminate the additional benefits given to injured federal employees with at least one dependent. The two approaches are not mutually exclusive, but the effects of implementing both would be less than the sum of their individual effects. In either case, reducing FECA benefits would lower mandatory spending from the benefit account and could lower discretionary spending for agencies' salary and expense accounts to the extent that future appropriations are reduced. (The discretionary savings occur because employing agencies reimburse the FECA account out of appropriated funds.)

Reducing FECA benefits after age 55 would yield mandatory savings of \$16 million in 2010 and \$145 million through 2014. The accompanying discretionary savings could be \$7 million in 2010 and \$215 million through 2014 (assuming appropriations are reduced). The second approach, eliminating augmented benefits, would save \$5 million in 2010 and \$46 million through 2014 in mandatory spending. Additional discretionary savings could total \$2 million in 2010 and \$68 million through 2014.

A rationale for the first approach is that, under the current benefit schedule, FECA provides what could be considered a windfall for permanently disabled employees who otherwise would be retired, indefinitely paying benefits that are higher than those offered by retirement plans. (By comparison, federal workers who retire under the Civil Service Retirement System at age 55 with 30 years of service receive benefits equal to 56 percent of their salaries.) Moreover, in addition to receiving FECA benefits, permanently disabled employees covered by the Federal Employees Retirement System can cash out the definedcontribution portion of their retirement plans.

An argument against the first approach is that it would change a benefit of nearly a century's standing that compensates federal employees for workplace injuries or illnesses. Another argument holds that injured workers who reach retirement age might have higher living expenses

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than their noninjured counterparts and thus need greater compensation. Furthermore, reducing coverage would be unfair to employees who would have continued working past retirement age had they not become disabled. (Fewer than 2 percent of federal civilian workers remain on the job after age 65, however.) Finally, the program's extensive review process has helped to exclude false claims.

The primary rationale for eliminating augmented FECA benefits for employees with dependents is that such benefits are out of line with those of other workers' compensation systems. Only six state systems authorize additional benefits for employees who have at least one dependent, and those benefits are much smaller—\$5 to \$10 per week in five states and \$25 per week in the sixth—compared with the 8.33 percent of the worker's previous salary in the case of FECA, or about \$80 per week for an employee making \$50,000 per year. Moreover, salaries and other employee benefits do not increase for workers with dependents.

One argument that is offered against eliminating augmented benefits is that they are necessary to compensate for additional child care needs that arise because of an employee's injury.



# **Revenue Options**

## **Increase Individual Income Tax Rates**

						Tot	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
Raise all tax rates on ordinary income by	10.0	20.1	44.0	44.0	40.1	105 (	454.0
1 percentage point Raise all ordinary tax rates and AMT rates by	19.0	38.1	44.2	46.2	48.1	195.6	454.8
1 percentage point	34.2	51.0	54.9	57.9	61.0	259.0	608.9
Raise all ordinary tax rates, AMT rates, and dividend and capital gains rates by 1 percentage point	34.9	54.5	56.2	59.3	62.5	267.4	626.0
Raise the top ordinary tax rate by 1 percentage point	3.2	5.3	6.1	6.8	7.4	28.8	73.5
Raise the top two ordinary tax rates by 1 percentage point	3.8	7.1	8.4	9.2	10.0	38.5	98.8
Raise the top three ordinary tax rates by 1 percentage							
point Raise the top four ordinary tax rates by 1 percentage	4.1	8.5	10.3	11.3	12.3	46.5	119.4
point	6.2	15.1	18.6	19.8	21.2	80.9	200.0
Raise the tax rate on ordinary taxable income over \$1 million for joint filers (\$500,000 for others) by							
5 percentage points	12.1	16.6	15.5	19.5	22.6	86.3	222.6
Source: Joint Committee on Taxation							

Note: AMT = alternative minimum tax.

Current law contains six statutory rates on taxable income earned by individuals through tax year 2010: 10 percent, 15 percent, 25 percent, 28 percent, 33 percent, and 35 percent. After 2010, those tax rates are scheduled to revert to the five brackets (15 percent, 28 percent, 31 percent, 36 percent, and 39.6 percent) that were effect before enactment of the Economic Growth and Tax Relief Reconciliation Act of 2001. (Under the President's budget proposal for 2010, only the current top two rates would revert to the top two corresponding rates in effect before 2001.) Depending on total taxable income, a taxpayer might face several rates (see the table on page 177). In 2009, a person filing singly with taxable income of \$35,000 would pay a tax rate of 10 percent on the first \$8,350 of income, 15 percent on the next \$25,600, and 25 percent on the last \$1,050. The starting points for those tax brackets are indexed to increase with inflation each year. Not all income is taxed at those rates, however. Income from long-term capital gains (gains on assets that are held for more than one year) is subject to lower rates, under a separate schedule. The same is true for income from dividends through 2010. Taxpayers who are subject to the alternative minimum tax (AMT)—another method of computing federal income tax liability—face statutory rates of 26 percent and 28 percent.

This option would increase statutory rates under the individual income tax in one of several ways:

- Raise all tax rates on ordinary income (income other than capital gains) by 1 percentage point.
- Raise all ordinary tax rates and the rates of the AMT by 1 percentage point.
- Raise all ordinary tax rates, the AMT rates, and the separate rates on dividends and capital gains by 1 percentage point.
- Raise the top one, top two, top three, or top four tax rates on ordinary income by 1 percentage point.
- Raise by 5 percentage points the rates on ordinary taxable income above \$1 million for married couples filing jointly and on ordinary taxable income above \$500,000 for other taxpayers.

Boosting all statutory tax rates on ordinary income by 1 percentage point would increase revenues by a total of \$196 billion over the five-year period from 2010 to 2014. Under that alternative, for example, the top rate of 35 percent in 2010 would increase to 36 percent, and the top rate of 39.6 percent thereafter would increase to 40.6 percent. Rates for the AMT would remain the same as they are under current law. Thus, the revenue impact of raising all of the ordinary tax rates would diminish over time relative to the size of the economy as more taxpayers became subject to the AMT and therefore were not affected by the rise in regular rates.

Raising AMT rates along with all of the regular tax rates by 1 percentage point would increase revenues during the five-year period by \$259 billion. There would be less of an effect from the number of taxpayers subject to the AMT because those taxpayers would face higher statutory tax rates, too. If, in addition to raising the ordinary and

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AMT rates, lawmakers boosted the separate tax rates on capital gains and dividends by 1 percentage point, federal revenues would increase by a total of \$267 billion over the next five years.

Alternatively, lawmakers could target specific individual income tax rates. For example, *boosting only the top statutory rate on ordinary income by 1 percentage point* would raise \$29 billion over the period from 2010 to 2014. Most people who are subject to the top rate in the ordinary schedule are not subject to the alternative minimum tax, so the AMT would not limit the effect of that increase in regular tax rates.

A final approach would be to create another bracket at the top of the regular rate schedule by *raising the tax rate on ordinary taxable income in excess of \$1 million for joint filers (\$500,000 for other taxpayers) by 5 percentage points.* Income above those amounts would be taxed at a rate of 40 percent through 2010 and 44.6 percent thereafter to increase revenues by \$86 billion over the five-year period.

As a way to raise revenues, a boost in tax rates would have some administrative advantages over other types of tax increases because it would require only relatively minor changes to the current tax collection system. Rate hikes also would have drawbacks, however. Higher tax rates would reduce the incentive to work and save. In addition, they would encourage taxpayers to shift income from taxable to nontaxable forms and to increase spending on tax-deductible items, such as home mortgage interest. In those ways, higher tax rates would cause economic resources to be allocated less efficiently than they might be otherwise.

The estimates shown here incorporate the assumption that taxpayers would respond to higher rates by shifting income from taxable to nontaxable or tax-deferred forms. (Such a shift might involve substituting tax-exempt bonds for other investments or opting for more tax-free fringe benefits instead of cash compensation.) However, the estimates do not incorporate potential changes in how much people would work or save in response to higher statutory tax rates. Such changes are difficult to predict and would depend in part on whether the federal government used the added tax revenues to pay down debt or to finance tax cuts or additional spending.

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Starting Point for Tax Rate	e Bracket (2009 dollars)	Statutory Tax Rate on Ordinary Taxable Income (Percent)					
Single Filers	Joint Filers	2009-2010	After 2010				
0	0	10	15				
8,350	16,700	15	15				
33,950	67,900	25	28				
82,250	137,050	28	31				
171,550	208,850	33	36				
372,950	372,950	35	39.6				

RELATED OPTIONS: Revenue Options 2, 3, 4, and 5

RELATED CBO PUBLICATIONS: Historical Effective Federal Tax Rates: 1979 to 2006, April 2009; Analyzing the Economic and Budgetary Effects of a 10 Percent Cut in Income Tax Rates, Issue Brief, December 1, 2005; The Alternative Minimum Tax, Issue Brief, April 15, 2004; and How CBO Analyzed the Macroeconomic Effects of the President's Budget, July 2003

### Permanently Extend the Individual Income Tax Provisions of EGTRRA

						Total	
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
Statutory rate changes	0	-35.0	-52.6	-56.5	-60.5	-204.6	-550.4
10 percent bracket	0	-31.4	-45.8	-46.9	-47.7	-171.8	-412.7
Expanded child tax credit	0	-7.1	-35.7	-36.2	-36.7	-115.7	-304.6
Marriage penalty relief	0	-6.1	-13.1	-13.3	-13.3	-45.8	-109.5
AMT relief	-6.7	-69.0	-30.6	-33.9	-37.2	-177.4	-447.2
Other, interactions	0	-18.9	-57.8	-63.3	-69.2	-209.2	-658.5
Total	-6.7	-167.5	-235.6	-250.1	-264.6	-924.5	-2,483.3

Source: Joint Committee on Taxation.

Notes: AMT = alternative minimum tax.

These estimates represent the change in the overall budget balance resulting from the sum of changes to revenues and outlays. Estimates of subcomponents are for each subcomponent alone and contain no interactions with other provisions unless stated.

Several laws enacted since 2001 substantially altered the individual income tax system. The Economic Growth and Tax Relief Reconciliation Act of 2001 (EGTRRA) reduced tax rates, created a 10 percent tax bracket, increased the value of the child tax credit, provided relief from the marriage penalty and the alternative minimum tax (AMT), and made many smaller changes to the tax code. EGTRRA's main provisions originally were scheduled to be phased in gradually between 2001 and 2010, and the entire law was slated to expire in 2011. Subsequent legislation accelerated the phasing in of some provisions, extended others through 2010, and made some permanent. It also reduced the tax rate on income from capital gains and certain dividends.

This option would make permanent nearly all of those changes to the individual income tax. (An exception would be the reduced tax rates on capital gains and dividends, which are discussed in Revenue Option 3.) Provisions of EGTRRA that are set to expire in 2011 would instead continue as specified for 2010; provisions that are due to expire earlier would remain as specified for the final year before they would otherwise have reverted to the 2001 level. The AMT would be indexed for inflation, as discussed in Revenue Option 5. Together, those changes would reduce revenues and increase outlays by a total of \$925 billion between 2010 and 2014. The President's 2010 budget recommends making most of those provisions permanent—the 10 percent bracket, the expanded child tax credit, and marriage penalty relief—and permanently indexing the AMT exemption. The Administration would not keep all of the statutory rate reductions, however; the rates for the two highest brackets would rise as currently scheduled.

Extending EGTRRA's provisions would have various effects on the economy's efficiency, depending in part on how the extensions were financed. One important channel for those economic effects is in the lower marginal tax rate (which applies to a taxpayer's last dollar of income) that would be associated with extending the provisions. Higher marginal tax rates can, for example, encourage people to shift income from taxable to nontaxable forms (which could be accomplished by substituting tax-exempt bonds for other investments or tax-free fringe benefits for cash compensation). Higher rates also can motivate people to spend more on tax-deductible items, such as home mortgage interest. Lower tax rates can reduce those distortions in decisionmaking and encourage people to allocate investments to whatever use has the highest economic return, thus leaving people better off. Lower marginal tax rates can encourage people to work and save more (unlike lower average tax rates, which can encourage people to work and save less).

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The broader economic consequences of lower tax rates, however, depend on how the rate reductions are financed. Financing tax cuts through higher budget deficits, for example, would reduce national saving, which would impair long-term economic growth and could offset any positive economic effects of the lower tax rates.

Permanently extending EGTRRA's individual income tax provisions would have mixed effects on the complexity of the tax system, which some people advocate simplifying. Some provisions, such as relief from the AMT, simplify the tax code for some taxpayers. Other provisions, such as expanding tax-favored accounts for education savings, complicate the tax code. In addition to the effects on economic efficiency and the complexity of the tax code, equity (fairness) is another key consideration in assessing tax policy. Although the various provisions of EGTRRA distribute benefits differently, EGTRRA's individual income tax provisions as a whole reduce income taxes by a larger share of previous after-tax income for higher-income households than for lower-income households. And although the reductions relative to income would be greater for higher-income households, extending EGTRRA's provisions would not significantly alter the shares of income taxes paid by different households at various income levels.

RELATED OPTIONS: Revenue Options 1, 3, 5, and 48

## Permanently Extend the Zero and 15 Percent Tax Rates for Capital Gains and Dividends

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	-1.8	-14.2	-20.3	-37.9	-40.8	-115.0	-347.7
Source: Joint Committee on Taxation							

The Jobs and Growth Tax Relief Reconciliation Act of 2003 (JGTRRA) reduced the special tax rates that apply to most long-term capital gains (gains on assets that are held for more than a year). The rate at which those gains are taxed depends on the income of the individual who realizes them. Gains realized by people whose income is in the top four tax brackets for ordinary income (25 percent, 28 percent, 33 percent, or 35 percent) are now taxed at a 15 percent rate, compared with 20 percent before JGTRRA. Gains realized by people whose income is in the two lowest brackets (10 percent or 15 percent) are now taxed at zero percent, down from the pre-JGTRRA rate of 8 percent or 10 percent. JGTRRA also extended the new tax rates on capital gains to dividends from U.S. and some foreign corporations. (Dividends had been taxed at the higher rates on ordinary income.)

JGTRRA's rates on capital gains and dividends were scheduled to last through 2008. However, the zero and 15 percent rates were extended through 2010 in the Tax Increase Prevention and Reconciliation Act of 2005. Starting in 2011, rates on capital gains are scheduled to revert to 10 percent or 20 percent for gains that are held between one and five years and to 8 percent or 18 percent for many gains held for longer periods. Tax rates on dividends are scheduled to return to the rates on ordinary income, which would range from 15 percent to 39.6 percent at that point.

This option would permanently extend the zero and 15 percent tax rates on capital gains and dividends. Such a change would reduce revenues by \$115 billion between 2010 and 2014 and by \$348 billion between 2010 and 2019. The reduction in revenues over 10 years would be more than double the drop during the first five years, in part because the option would not affect current-law tax rates until January 1, 2011. The President's 2010 budget proposes extending the zero and 15 percent rates but would add a 20 percent rate for taxpayers confronting tax rates of 36 percent and 39.6 percent on ordinary income.

The main rationale for reducing tax rates on capital gains and dividends is that those lower rates curtail the extra tax burden that the law previously placed on equity invested in C corporations (companies that are subject to the corporate income tax). Most large companies and some small businesses are organized as C corporations. The return on the equity invested in such companies is corporate profits. Once a company has paid corporate income tax (typically 35 percent) on those profits, it can either distribute the remaining profits to shareholders as dividends (which are then taxed at the individual level), or it can retain the profits and reinvest them. Reinvested earnings presumably increase a corporation's value (by roughly the amount invested), so they also raise the value of the company's stock. When individual shareholders sell that stock, they pay capital gains taxes on the reinvested earnings. Thus, the return on equity invested in C corporations is often taxed twice: once as corporate profits and a second time as dividends or capital gains. By reducing tax rates on the latter types of income, current law lessens-but does not eliminate-the extra tax burden.

Those extra taxes on corporate profits distort investment to some degree. They prompt some investment to be shifted from C corporations to other types of businesses—such as S corporations, partnerships, sole proprietorships, or limited liability companies—and to owneroccupied housing. The additional taxes also encourage C corporations to finance more of their investments by selling bonds instead of stock (because corporations can deduct interest payments on bonds) and by retaining earnings rather than paying dividends (because individual taxpayers normally pay lower tax rates on capital gains and can defer realizing the gains). Those distortions interfere with the allocation of investments to whatever use has the highest economic return. Consequently, they reduce economic efficiency and leave people less well off.

Current law mitigates those distortions by lessening the extra tax burden—but only for a short period. Because the lower rates on dividends and capital gains expire at the end of 2010, people who make investments after that will not benefit from the lower rates. In addition, many people who make investments before that time will benefit only partially from the lower tax rates because some of the returns will not be earned until after 2010. Hence, many of the gains in economic efficiency that could result from the lower rates will not be realized unless those rates are perceived to be permanent.

Other possibilities for reducing the extra tax burden on corporate equity have been widely discussed. Under one alternative, dividends and capital gains paid from profits that had been fully taxed at the corporate level would themselves be exempt from taxation at the individual level. Another approach would end the practice of allowing businesses to deduct interest costs from their taxable income and would tax other types of businesses at the same rate as C corporations.

Compared with those other alternatives, the lower rates provided under current law are less complete and less targeted, although they are simpler. They remove less of the extra burden from the return on corporate equity than the other alternatives would. The rates under current law also apply more broadly because they are not limited to dividends and gains from fully taxed corporate profits. Corporations (like individuals) receive extra tax deductions and credits for certain investments; thus, the return on those investments is less burdened under current law than is the return on fully taxed profits. People also realize capital gains from investments in unincorporated businesses and individually owned property; neither type of investment is subject to the tax on corporate profits. Such imprecise targeting reduces the effectiveness of current tax rates on capital gains and dividends because it fails to lessen the burden on fully taxed corporate earnings relative to all other returns on investments. Complete and targeted leveling of the tax burden would be more complicated to administer, and policymakers in the United States have never tried it. Targeting could be improved, however, with little additional complication by limiting the lower capital gains tax rates to gains on shares of C corporations.

The main argument against extending the lower tax rates on dividends is that the previous rates might not have distorted the allocation of investment. Some analysts believe that the tax on dividends affects returns to stock owners but not corporations' decisions to invest. In that view, reducing the tax rate on dividends to no more than 15 percent provided a windfall to shareholders. Economists are investigating the degree to which the tax on dividends distorts investment. (Most analysts agree, however, that the tax on capital gains distorts investment decisions by C corporations, so the rationale for taxing capital gains on corporate stocks at a lower rate is not subject to the same question.)

The taxation of capital gains is among the more complex parts of the individual income tax, and permanently extending the zero and 15 percent tax rates would reduce some of that complexity. It would preserve other sources of complexity, however, such as the rules that are needed to limit taxpayers' ability to convert ordinary income into capital gains and the different tax rates that apply to gains from the sale of specific types of assets. (Greater simplicity is discussed in Revenue Option 4.)

RELATED OPTIONS: Revenue Options 4 and 30

RELATED CBO PUBLICATION: Capital Gains Taxes and Federal Revenues, Issue Brief, October 9, 2002

## **Replace Multiple Tax Rates on Long-Term Capital Gains with a Deduction of 45 Percent of Net Realized Gains**

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	-1.3	-5.5	8.3	-5.6	-6.3	-10.4	-47.8
Source: Joint Committee on Taxation	on.						

When an asset is sold for more than the price at which it was purchased, the seller realizes a capital gain, which generally is subject to taxation. Long-term capital gains those on assets held for more than a year—are taxed at various rates, many of them below those for ordinary income. The tax rate depends on the year in which the gain is realized, the type of asset, how long the asset was held, and the taxpayer's other income—a set of circumstances that requires taxpayers to make numerous calculations to determine tax liability.

This option would allow taxpayers to deduct from their taxable income 45 percent of net realizations of longterm capital gains-whether or not other deductions are itemized. The remaining 55 percent of the gains would be taxed as ordinary income. With the deduction, a taxpayer's actual rate on capital gains would be 55 percent of the marginal rate on ordinary income (the rate on the last dollar of income). In 2010, someone in the 25 percent tax bracket for ordinary income would face a rate of 13.75 percent on capital gains; someone in the 35 percent bracket would face a rate of 19.25 percent. (Taxpayers subject to the alternative minimum tax would adjust for its lower rate structure by treating 31 percent of the deduction as income taxable under the alternative tax.) This option is a variant of the exclusion that applied to capital gains before 1987.

This option is designed to simplify the tax treatment of capital gains. Nonetheless, with a 45 percent deduction, it would reduce revenues in all but one year and by a total of \$10 billion over the next five years. The option could be made revenue neutral by selecting a lower deduction rate.

The tax rates that apply to long-term capital gains under current law are complex. For example, through 2010, a taxpayer in a tax bracket of 25 percent or above who sells corporate stock owned for more than a year will pay

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15 percent in taxes on the realized gains. Starting in 2011, however, that rate is scheduled to be 20 percentunless the stock was purchased in 2001 or later and held for at least five years. In that case, the applicable rate is scheduled to be 18 percent. Taxpayers in the 10 percent or 15 percent bracket face no tax on capital gains through 2010. Beginning in 2011, rates of 10 percent would be applied to gains from assets held for up to five years, and 8 percent would be paid on gains from assets held for more than five years. There is an exception to all of those rates for gains on original issues of stock from certain start-up businesses that are held for more than five years. The American Recovery and Reinvestment Act of 2009 (Public Law 111-5) allows 75 percent of those gains for 2009 and 2010 to be excluded; the remainder is taxed at ordinary rates up to 28 percent. The exclusion makes the effective top tax rate 7.5 percent. Starting in 2011, the exclusion is scheduled to be 50 percent, and the effective top rate will increase to 14 percent.

The tax rate on gains from many other assets is the same as that for corporate stock, with some exceptions. Some unrecaptured depreciation on real estate is classified as a capital gain and taxed at ordinary income tax rates, up to a maximum of 25 percent. Gains from gold, art, or other collectible objects are taxed at ordinary rates, but up to a maximum of 28 percent. Taxpayers who are subject to the alternative minimum tax face different rates on gains from collectibles or the original stock issues of certain start-up companies.

The variety of rates forces taxpayers with long-term gains to make many calculations to determine their tax. On 2008 returns, for example, taxpayers with gains from most sales of assets or with qualifying dividends were required to figure their tax by completing an 18-line-long worksheet. If there was a gain on a qualifying start-up business or a collectible, the taxpayer had to instead complete one 7-line worksheet and then another with

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36 lines. Other situations required still other worksheets. Beginning in 2011, the forms will become more complicated: Different rates are scheduled to be applied to most gains on assets held for at least five years.

The main advantage of this option is that it would substantially simplify calculations by replacing the current worksheets with just three or four lines on the schedule for reporting capital gains. The new calculation would be similar to those that taxpayers made from 1942 until 1986, when the tax code excluded a portion of capital gains from adjusted gross income. Unlike that exclusion, however, this approach would not understate the income of taxpayers with gains when determining eligibility for tax credits or other advantages intended for lower-income people.

The main disadvantage of this option is that it would overturn special treatment of some assets that policymakers, for various reasons, have decided are desirable. In particular, the option would eliminate separate capital gains rates for collectibles or for assets held for more than five years (whether issued by a start-up business or not). Furthermore, all deductions for depreciation would be recaptured at ordinary tax rates (some depreciation now benefits from rates that are capped at 25 percent). The purposes for those provisions should be weighed against the benefits of simplification.

In 2003, tax rates on dividends were reduced to equal the rates on capital gains in order to offset some of the extra burden borne by dividends and capital gains on corporate stock because of the corporate income tax (see Revenue Option 3). Under current law, that parallel treatment will continue through 2010, and it could be retained in this option by extending the same 45 percent deduction to qualifying dividends. (The President's 2010 budget request proposes to extend with modifications the rate structure of recent years.) An additional step to reflect the unique tax burden on corporate stock would be to allow the deduction only for dividends and gains on corporate stock and to tax gains on other assets as ordinary income. (Revenue Option 30 addresses the integration of corporate and individual income taxes more completely.)

RELATED OPTIONS: Revenue Options 1, 3, and 30 RELATED CBO PUBLICATION: *Capital Gains Taxes and Federal Revenues*, Issue Brief, October 9, 2002

						Tot	al
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
Make the current exemption amounts permanent and index the AMT for inflation	-6.7	-69.0	-30.6	-33.9	-37.2	-177.4	-447.2
Apply some regular deductions and exemptions to the AMT	-9.1	-93.0	-37.5	-41.0	-44.4	-225.0	-531.9
Eliminate the AMT	-10.5	-108.1	-45.2	-49.2	-53.2	-266.2	-625.8
Source: Joint Committee on Taxatio Note: AMT = alternative minimum t							

## Provide Relief from the Individual Alternative Minimum Tax

The individual alternative minimum tax (AMT) is an alternate method of computing individual income tax liability. A minimum tax was first enacted in 1969 to address concerns that wealthy taxpayers were using preferences to greatly reduce their tax liability—in some cases, to zero. The current AMT, established by the Tax Reform Act of 1986, has been modified several times.

In recent years, lawmakers have enacted temporary measures to stem the growth in the number of people subject to the tax, which is not indexed for inflation. This option would make some of those measures permanent, make further changes to limit the scope of the AMT, or eliminate the AMT altogether. Its alternatives would reduce federal revenues by as much as \$11 billion in 2010 and by \$266 billion over five years.

As they compute their liability under the AMT, taxpayers cannot deduct some items from income that are deductible under the standard income tax: Deductions for state and local taxes, personal exemptions, and the standard deduction do not apply. Also disallowed under the AMT are some tax preferences that apply only to taxpayers with complex financial circumstances, such as the deduction for some intangible costs associated with drilling for oil and gas. Under the AMT, all those adjustments are replaced with a single exemption that phases out at higher incomes. Taxpayers subtract the exemption from their income to determine their taxable income, which is taxed at 26 percent for the first \$175,000 and 28 percent for the remainder. Taxpayers must pay the AMT or the individual income tax, whichever is higher. The AMT exemptions were temporarily increased by the Economic Growth and Tax Relief Reconciliation Act of 2001 (EGTRRA). Several times since, the amounts have been extended for a year or two and increased, most recently by the American Recovery and Reinvestment Act of 2009 (ARRA, Public Law 111-5), to hold down the number of taxpayers affected. Before 2001, the exemptions were \$33,750 for single filers and \$45,000 for joint filers. ARRA raised them to \$46,700 and \$70,950 for 2009. Under current law, the exemptions revert to their pre-EGTRRA amounts in 2010.

Unlike the tax brackets and exemptions for the individual income tax, those for the AMT are not indexed for inflation. At any given level of nominal income, taxpayers will see their liability under the individual income tax decline over time as the values of the standard deduction and personal exemptions rise with inflation. Moreover, as the size of the lower tax brackets grows, more income is taxed at lower rates. Because the AMT is not indexed, liability at a given nominal income is constant. Therefore, as nominal income grows with inflation, more taxpayers will be subject to the AMT.

Policymakers could reduce the number of taxpayers subject to the AMT in several ways: The ARRA exemption amounts could be made permanent and indexed, along with the AMT brackets, for inflation after 2009. Under that approach 5 million taxpayers would pay the AMT in 2010—rather than the 28 million under current law— and revenues would be \$177 billion lower from 2010 to 2014 than they would be otherwise. (That alternative is

consistent with the proposal implicit in the current policy baseline presented in the President's budget for 2010.) A second alternative would allow taxpayers to use the standard deduction, personal exemptions, and deductions for state and local taxes as they are used under the regular tax when computing tax liability under the AMT. That change would reduce the number of people affected by the AMT to 2 million in 2010 and cut revenues by \$225 billion over the 2010–2014 period. A third possibility, included in the 2005 report of the President's Advisory Panel on Federal Tax Reform, would eliminate the AMT altogether. About 28 million taxpayers who would be subject to the AMT in 2010 would revert to paying the individual income tax, at a revenue cost of \$266 billion over five years.

A benefit of all three approaches for this option would be simplification. Taxpayers who now pay the AMT or who are potentially affected by the AMT must calculate their tax liability twice. As that group expands, many more people will be required to make complex calculations in preparing their tax returns. Many taxpayers will join the AMT's ranks not because they are sheltering income but because they have dependents or face high state and local taxes. This option would simplify the tax system by making fewer taxpayers subject to the AMT. Another rationale for this option would be the mitigation of the perhaps unintended consequences an unindexed AMT would have on some parts of the tax system. For example, if unmodified, the AMT will begin to limit the value of the standard deduction and personal exemption under the regular income tax. That process alone will make some taxpayers subject to the AMT, beyond those whom the tax was originally intended to target, and will increase their tax liability over time.

This option would result in lower revenues, and it would raise issues of fairness and economic effects. It would benefit higher-income taxpayers primarily, and the changes would affect people's incentives to work and save. Relief from the AMT would alter the marginal tax rate (the rate that applies to the last dollar of income) faced by taxpayers who currently are subject to the alternative tax. Some taxpayers would see their marginal rates increase, but more would see their marginal rates decline. AMT relief would reduce some people's tax liability, allowing them to achieve the same amount of after-tax income with less income before taxes, and might affect their work behavior. On balance, it is not clear how the changes in this option would influence incentives to work and save; the overall effect would depend on taxpayers' responsiveness to those incentives.

#### **RELATED OPTION: Revenue Option 2**

RELATED CBO PUBLICATIONS: A Preliminary Analysis of the President's Budget and an Update of CBO's Budget and Economic Outlook, March 2009; Statement of Douglas Holtz-Eakin, Congressional Budget Office, before the Subcommittee on Taxation and IRS Oversight, Senate Committee on Finance, *The Individual Alternative Minimum Tax*, May 23, 2005; and *The Alternative Minimum Tax*, Issue Brief, April 15, 2004

## Use an Alternative Measure of Inflation to Index Some Portions of the Tax Code

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	0.8	2.5	3.9	6.2	8.1	21.5	89.6

Source: Joint Committee on Taxation.

Note: These estimates represent the change in the overall budget balance that results from the sum of changes to revenues and outlays.

Several items in the tax code change with prices for goods and services, as measured by the consumer price index for all urban consumers (CPI-U). That group includes the amounts of personal and dependent exemptions; the size of the standard deductions; the income thresholds that divide the rate brackets for the individual income tax; the amount of annual gifts exempt from the gift tax; and the thresholds and phase-out boundaries for the earned income tax credit, the child tax credit, and several other credits. Indexing is intended to keep those amounts relatively stable in real (inflation-adjusted) terms.

Indexing is accomplished by adjusting each amount from its value in a base year by the percentage change observed in the CPI-U from that base to the most recent year for which information is available. The period used is not a calendar year but the 12 months that elapse from September to August. The August value of the CPI-U becomes available in September, which allows enough time to index the amounts and prepare the necessary forms for the coming year. So, for example, in the base year of 1987, the standard deduction for a single tax filer was \$3,000. From that time until August 2008, the CPI-U rose by 190.7 percent; correspondingly, the standard deduction (rounded to the lowest \$50 increment) increased to \$5,700 for 2009.

This option would use the chained CPI-U (an alternative measure of inflation) instead of the standard CPI-U to adjust various portions of the tax code for inflation. (Both measures are calculated by the Bureau of Labor Statistics, or BLS.) The Congressional Budget Office estimates that the chained CPI-U is likely to grow 0.3 percentage points more slowly than the standard CPI-U over the next decade, so applying the chained CPI-U would increase the amount of income subject to taxation and result in higher tax revenues over time. The net revenue increase would be about \$800 million in 2010 but would reach \$8 billion in

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2014 and total \$22 billion over the five years from 2010 to 2014. If the chained CPI-U were used for all federal benefit programs that are indexed, spending would be reduced by \$20 billion between 2010 and 2014.

An argument in favor of this option is that the standard CPI-U overstates changes in the cost of living by not fully accounting for the extent to which households maintain a standard of living by substituting one product for another when the price of the product changes relative to the prices of all other products. BLS created the chained CPI-U to explicitly address that "substitution bias" in the standard index. The chained CPI-U incorporates adjustments people make from one month to the next in the types of products they buy; the standard CPI-U uses a basket of products from consumption patterns that are as much as two years old.

An argument against this option points out that it is more complicated and time-consuming to compute the chained CPI-U than it is to compute the standard index; only an initial estimate of the chained CPI-U is available monthly. At the start of the next year, all of the initial estimates for the year just past are revised, and one year later they are made final. Because of those delays, initial and interim estimates, which typically contain errors, would be used to index items in the tax code. (Since the chained CPI-U was first produced in 2002, however, the errors have been small and they have not been consistently high or low.) If the adjustment for each year is tied to the cumulative index value from a base year several years prior, those small errors would not accumulate beyond the current year. Furthermore, the initial and interim estimates of the chained CPI-U have been closer to the final version of the chained CPI-U than the existing CPI-U has been, so those estimates still reflect the basic improvement attributable to the chained CPI-U.

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
Reduce gradually the maximum mortgage on which interest can be deducted from \$1.1 million to \$500,000	0	0	0	0.4	1.9	2.3	41.4
Convert the mortgage interest deduction to a credit	0	0	0	12.7	51.6	64.3	387.6

## Reduce the Mortgage Interest Deduction or Replace It with a Tax Credit

The tax code treats investments in owner-occupied housing more favorably than other investments. For example, the owner of a rental house pays taxes on the rental income (net of expenses such as mortgage interest, property taxes, depreciation, and maintenance) and must pay tax on any capital gain when the house is sold. A homeowner who occupies a house, and therefore does not collect any rent, is not required to report the rental value of the home as gross income. Yet homeowners can deduct mortgage interest and property taxes from their other income when they compute income tax liability. A homeowner also can exclude from taxation as much as \$250,000 of any capital gain (\$500,000 for a joint return) when a home is sold.

In part, the rental value of housing services is excluded from income because it is difficult to determine that value when no rent changes hands. It is simple, however, to exclude expenses in calculating taxable income. In fact, housing-related expenses other than mortgage interest and property taxes cannot be deducted from a homeowner's income. Moreover, current law limits the amount of interest that can be deducted to the interest on \$1 million in debt that a homeowner has incurred to buy, build, or improve a first or second home along with the interest on as much as \$100,000 in other loans (such as home-equity loans) that the owner has secured with the home, regardless of those loans' purposes. Thus, \$1.1 million is the total amount of mortgage debt that can be included in the calculation of an interest deduction. Moreover, because the Internal Revenue Service has limited ways to enforce the separate limits, the practical limit on the deduction is \$1.1 million of mortgage debt for any purpose.

This option, which would not take effect until 2013 (when the housing markets are expected to have recovered from their current turmoil), would further restrict the mortgage interest deduction in one of two ways. The first alternative would reduce the maximum mortgage eligible for the interest deduction from \$1.1 million in 2012 to \$500,000 in 2018 by annual decrements of \$100,000 each. That change would boost revenues by only \$400 million in 2013 but by \$41 billion over 10 years. The \$500,000 cap would affect more homeowners in later years as incomes increase and housing prices rise.

The second alternative would replace the deduction with a 15 percent tax credit for interest on mortgages below the declining limits in the first alternative. (In 2005, the President's Advisory Panel on Federal Tax Reform proposed a variant of that approach.) The change would reduce taxes for some owners and raise them for others, with a net increase of \$13 billion in 2013 and \$388 billion over the period from 2013 to 2019.

Supporters of curtailing the mortgage interest deduction believe that change will improve the efficiency of the economy. The current deduction encourages people to invest more in owner-occupied housing than they would if all investments were taxed equally. As a result, a taxpayer's return on additional investment in owneroccupied housing, aside from the tax advantages, is likely to be lower than are the returns on additional investment in businesses, for example. Reducing the maximum mortgage on which interest could be deducted should make affected homeowners less willing to invest in housing rather than in stocks, bonds, savings accounts, or their own businesses. Between 1981 and 2007, about 38 percent of net private domestic investment went into owner-occupied housing. That share is large enough that a reduction in investment in owner-occupied housing—even if only for homes purchased with large mortgages—could eventually boost the amount of capital available to other sectors of the economy and increase total economic output.

Another advantage of this option is that limiting the mortgage interest deduction would curtail the tax advantage for homeowners who borrow against their homes to buy other goods or to fund tax-favored retirement savings accounts, such as 401(k) plans and individual retirement accounts. Allowing homeowners to deduct interest for loans on other consumption distorts people's choices between saving and consuming and reduces national saving. Renters cannot deduct interest on normal consumer loans or credit card debt for cars, vacations, and the like. Allowing homeowners to deduct interest on mortgage loans at the same time that they contribute to tax-favored savings plans allows homeowners to take advantage of tax savings on both transactions. It thus provides an incentive for people to pay down mortgage debt more slowly and contribute more to retirement accounts than they would if mortgage interest were not deductible. Such transactions reduce revenue without increasing net saving, because the higher retirement contributions are offset by larger amounts of outstanding mortgage debt.

A drawback of limiting the deductibility of mortgage interest suddenly and deeply is that home values, home construction, and home mortgage lending would probably decline precipitously, particularly for larger houses. The rapid declines would create new hardships, in addition to those already plaguing the housing market, for people who own those homes, for builders, and for lenders. Lowering the cap gradually and with substantial warning would greatly mitigate the consequences of the change. Nonetheless, over the long run, the shift of investment from housing to other pursuits would mean less home construction and smaller increases in the value of homes than is likely to occur under current law.

Another drawback is that this option might reduce the rate of home ownership. Some observers believe that widespread home ownership contributes to social and political stability because it bolsters people's stake in their communities and government. Moreover, because it motivates people to maintain their property it also could strengthen neighborhoods by promoting long-term commitment. People typically do not consider those benefits to the community when they are deciding whether to rent or own a home, so a subsidy to promote home ownership might tilt decisionmaking in the direction of the community's benefit. That tilt, however, might not be helpful for people who would have difficulty dealing with the risks of ownership or mortgage debt. As recent experience illustrates, when house prices plunge and adjustable interest rates reset upward, homeowners can face negative equity, squeezed budgets, and the prospect of defaulting on their loans.

The mortgage interest deduction could be an ineffective way to help low-income renters become homeowners. Despite the tax treatment for mortgage interest in the United States, the rate of home ownership is the same here and in Canada, the United Kingdom, and Australia-and none of those other countries offers a tax deduction for mortgage interest. The deduction's effect on home buying may be small because people in lowerincome households-who confront other barriers to home ownership-benefit less from the deduction than higher-income households do. There are at least two reasons for the disparity: The first is that the deduction has value only if a taxpayer's total deductions exceed the standard deduction, thereby giving the taxpayer a reason to itemize. Another is that the entire mortgage interest deduction can be used to reduce taxes only for people whose other deductions combined exceed the standard deduction. Lower-income people are not as likely to fit into either category of taxpayer. Finally, the tax savings for homeowners who itemize increase with income tax rate and with the amount of the mortgage. Thus, an owner in the 15 percent tax bracket saves 15 cents per dollar of mortgage interest deducted, and an owner in the 35 percent bracket saves 35 cents. That larger saving per dollar deducted is magnified for higher-income households because they tend to have larger mortgages.

The second approach in this option—replacing the mortgage interest deduction with a tax credit—would redirect the tax advantages of home ownership to lower-income taxpayers, many of whom currently cannot take advantage of the deduction for mortgage interest. According to a 2005 report of the President's Advisory Panel on Federal Tax Reform, only 54 percent of taxpayers who pay mortgage interest receive a tax benefit. Converting the mortgage interest deduction to a 15 percent credit would equalize the interest rate subsidy to borrowers, regardless of tax bracket or whether deductions are

#### CHAPTER THREE

itemized. Thus, in ways that itemized deductions cannot, the mortgage credit is designed to encourage home ownership among people with lower incomes. Lower-income people, however, are more likely to have trouble weathering the difficulties of home ownership, as seen during the recent downturn in the housing market.

Both the mortgage interest deduction and the tax credit for interest paid encourage people to buy houses by reducing the monthly cost of ownership. An alternative is the recently enacted tax credit provided to first-time home buyers. That plan, which expires at the end of November 2009, offers a one-time credit of up to \$8,000, equal to 10 percent of the purchase price of a home. The new credit is more narrowly focused than is either the mortgage interest deduction or the interest credit. It is paid out only to first-time buyers when they buy a home, and for most taxpayers the new credit would provide a smaller tax benefit in total than either the deduction or the credit for interest paid. Per dollar of revenue lost, however, either credit probably would be more effective than the current deduction at encouraging home ownership, although it is unclear which credit would do so more effectively.

**RELATED OPTION: Revenue Option 9** 

RELATED CBO PUBLICATION: Taxing Capital Income: Effective Rates and Approaches to Reform, October 2005

						Total		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues								
End the current itemized deduction	11.7	56.9	88.3	91.2	94.5	342.6	861.9	
Cap the deduction at 2 percent of adjusted gross income	7.8	39.7	65.1	66.9	69.1	248.6	625.7	
Gource: Joint Committee on Taxation.	7.0	57.7	05.1	00.9	09.1	240.0	023.7	

## Limit or Eliminate the Deduction for State and Local Taxes

In determining their taxable income, taxpayers may choose the standard deduction or they may itemize and deduct expenses (including state and local taxes on income, real estate, and personal property) from their adjusted gross income (AGI). Under the American Jobs Creation Act of 2004, taxpayers who itemized in 2004 and 2005 also were allowed to deduct state and local sales taxes, which previously had not been deductible, instead of state and local income taxes. That provision was extended through 2009. (In 2008 and 2009, taxpayers who do not itemize also may deduct some property taxes, up to \$500 for single filers and \$1,000 for joint filers. This option excludes the effects of eliminating that provision.)

This option would change the deductibility of state and local tax payments, either by eliminating the deduction or by restricting the deduction to an amount equal to or less than 2 percent of AGI. Eliminating the deduction would increase federal revenues by \$343 billion between 2010 and 2014. Capping the deduction at 2 percent of AGI would increase revenues by \$249 billion over five years.

Those revenue estimates assume that the alternative minimum tax (AMT) is set according to current law. (The AMT computes federal tax liability differently from the regular income tax; it requires the taxpayer to add several items back into taxable income that are not regularly included in it.) Because the exemption amounts and brackets for the AMT are not indexed for inflation, in the absence of legislative changes, the number of taxpayers who pay the AMT would grow each year. Policymakers have routinely changed the requirements to limit the number of taxpayers affected by the AMT. Because the deduction for state and local taxes is the largest item that must be added back into income under the AMT, assumptions regarding the AMT have a substantial effect on the revenue estimates for this option. If legislation that limited AMT liability were already in place, more taxpayers would receive the benefit of the deduction for state and local taxes, and the revenue gain from eliminating the deduction would be larger.

The federal deduction for state and local taxes is effectively a federal subsidy to state and local governments. As such, it indirectly finances spending by those governments at the expense of other uses of federal revenues. Either variation of this option would substantially reduce the incentive that the current subsidy provides for state and local government spending, although there is research to indicate that total state and local spending is not sensitive to that incentive.

Some proponents of curtailing the deduction argue that the federal government should not subsidize state and local governments through the tax deduction because state and local taxes are largely paid in return for services provided to the public. If that is the case, such taxes are analogous to spending on other types of consumption, which are nondeductible. Other proponents argue that the deduction largely benefits wealthier localities, where many taxpayers itemize, are in the upper tax brackets, and enjoy more abundant state and local government services. Because the value of an additional dollar of itemized deductions increases with the marginal tax rate (the rate on the last dollar of income), the deductions are worth more to taxpayers in higher income tax brackets than they are to those in lower brackets. Additionally, the deductibility of taxes could deter states and localities from financing services with nondeductible fees, which could be more efficient.

#### CHAPTER THREE

One argument against eliminating or restricting the current deduction involves the equity of the tax system. A person who must pay relatively high state and local taxes has less money with which to pay federal taxes than does someone with the same total income and a smaller state and local tax bill. The validity of that argument depends at least in part on whether people who pay higher state and local taxes also benefit more from goods and services provided by the public sector.

**RELATED OPTION: Revenue Option 9** 

RELATED CBO PUBLICATION: The Deductibility of State and Local Taxes, February 2008

Limit the Tax Benefit of Itemized Deductions to 15 Percent											
						Tot	al				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Revenues	28.2	91.1	128.7	134.7	141.5	524.2	1,320.7				
Source: Joint Committee on Ta	axation.										

#### Under current law, taxpayers may choose to deduct various expenses, including state and local taxes, mortgage interest, charitable contributions, and some medical expenses, from taxable income. Taxpayers benefit when their itemized deductions exceed the value of the standard deduction. Some deductions (such as those for medical expenses) must total more than a given percentage of the taxpayer's adjusted gross income. Beginning in 2011, with the expiration of the Economic Growth and Tax Relief Reconciliation Act, the tax code specifies a gradual reduction in the amount higher-income taxpayers will be per-

mitted to subtract from their income. As with any deduction, the benefit of itemizing improves with a taxpayer's marginal tax bracket (the bracket that applies to the last dollar of income). So \$10,000 in deductions reduces liability by \$1,500 for someone in the 15

percent bracket but by \$3,500 for someone in the 35 percent bracket.

This option would limit the benefit of itemizing deductions to 15 percent, thus increasing revenues by \$28 billion in 2010 and by \$524 billion over five years. It would raise taxes for people in marginal tax brackets above 15 percent who itemize deductions. Those taxpayers account for about 40 percent of the roughly one-third of all taxpayers who itemize deductions. (In 2009, those taxpayers would be single filers with taxable income of at least \$33,950 and joint filers with income of at least \$67,900.) The President's 2010 budget proposes limiting the value of itemized deductions to 28 percent for people making over \$250,000.

Some deductions are to subsidize socially beneficial activities (such as home ownership and the work of charitable organizations). To the extent that the current subsidy is too large, curtailing the benefit will improve the allocation of society's resources. But if the existing subsidy is too small, curtailing it would worsen resource allocation. By weakening the link between a deduction and a household's marginal tax bracket, this option would provide a more equal subsidy rate (the size of the deduction per dollar of activity) across households. In general, a system of uniform subsidies distorts taxpayer behavior by less than does a system in which subsidies vary from one household to another. However, in cases in which higher-income taxpayers are more sensitive to a subsidy than lower-income taxpayers are, eliminating the link between a deduction and a household's marginal tax bracket could worsen economic efficiency.

Some deductions are intended to more accurately measure a person's ability to pay taxes. For example, taxpayers with large medical expenses or casualty and theft losses may have fewer resources than taxpayers with similar income and smaller expenses. Under this option, taxpayers subject to the limitation would not have those expenses fully subtracted from their taxable income.

A rationale against this option is that it, like other restrictions on itemized deductions, could create incentives for taxpayers to reduce their income. Taxpayers might liquidate their assets to pay a mortgage, for example, thereby reducing both their income from those assets and their mortgage payments. Or they might donate time or services rather than cash to charities.

This option also would alter relative tax burdens. Reducing the benefit from itemized deductions would raise average tax rates disproportionately among upper-income taxpayers, and it would cause people who incurred large deductible expenses (like medical costs) to bear tax burdens that are greater than those borne by people with smaller expenses but similar income net of deductions. That outcome might be viewed as more problematic for deductions that are intended to defray involuntary costs and to better measure underlying ability to pay taxes, such as those for casualty losses or business expenses.

Rev

Curtail the Deduction for Charitable Giving												
						То	tal					
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019					
Change in Revenues	7.3	19.0	20.4	21.5	22.6	90.8	221.5					
Source: Joint Committee on Taxation.												

Current law allows taxpayers who itemize deductions to deduct the value of their contributions to qualifying charitable organizations. By lowering the after-tax cost of donating to charities, the deduction provides an added incentive to donate. In 2006 (the most recent year for which data are available), taxpayers claimed \$187 billion in charitable contributions on 41.4 million tax returns.

The deduction is restricted in two ways. First, charitable contributions may not exceed 50 percent of a taxpayer's adjusted gross income (AGI) in any one year. Second, after a hiatus in 2010, the annual total of charitable contributions and certain other itemized deductions will be reduced for taxpayers whose AGI is above a threshold (\$166,800 in 2009). For most affected taxpayers, the reduction in their total will be 3 percent of their AGI in excess of the threshold.

This option would further curtail the deduction for charitable donations while preserving a tax incentive for donating. Only contributions in excess of 2 percent of AGI would be deductible for a taxpayer who itemizes. That amount still would be subject to the additional reduction described above for higher-income taxpayers in 2011 and later. Limiting the deduction to contributions in excess of 2 percent of AGI would match the treatment that now applies to unreimbursed employee expenses, such as job travel costs and union dues, and it would increase revenues by \$7 billion in 2010 and by a total of \$91 billion between 2010 and 2014.

An argument in favor of this option is that, even without a deduction, a significant share of charitable donations would still be made. Therefore, allowing taxpayers to deduct contributions is economically inefficient because it results in a large subsidy (a loss in federal revenue) for a very small increase in charitable giving. For taxpayers who contribute more than 2 percent of their AGI to charity, this option would maintain the current marginal incentive to donate but at much less cost to the federal government. People who make large donations often are more responsive to that tax incentive than are people who make small contributions. Moreover, smaller contributions are apt to be a source of abuse among taxpayers, some of whom overstate their donations in the belief that the government is unwilling to incur the costs of determining the legitimacy of small contributions.

A potential disadvantage of this option is that total charitable giving would decline. People who contribute less than 2 percent of their AGI would no longer have a tax incentive to donate, and many of them could reduce their contributions. Although larger donors would still have an incentive to give, they would have slightly lower after-tax income because of the smaller deduction and thus might reduce their contributions as well (although by a lesser percentage than among smaller donors). Another effect of creating the 2 percent floor is that it would encourage taxpayers who had planned to make gifts over several years to combine donations into a single tax year to qualify for the deduction.

The President's 2010 budget proposes another approach to limiting the tax benefit of charitable giving and other itemized deductions for people with incomes over \$250,000.

**RELATED OPTION: Revenue Option 12** 

RELATED CBO PUBLICATIONS: *The Estate Tax and Charitable Giving*, July 2004; and *Effects of Allowing Nonitemizers to Deduct Charitable Contributions*, December 2002

			11					
						Total		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues	0.7	1.5	1.7	2.0	2.3	8.2	22.5	
Source: Joint Committee on Taxation.								

Limit Deductions for Charitable Gifts of Appreciated Assets to the Gifts' Tax Basis

#### **Option 11**

The tax code's system of personal income tax deductions encourages charitable giving by allowing taxpayers who itemize to deduct qualifying donations up to a maximum of 50 percent of their contribution base, which is adjusted gross income (AGI) computed without regard to any net operating loss carryback. Taxpayers may deduct cash or such assets as stocks, real estate, automobiles, works of art, or other objects of value.

Special treatment is given to contributions that would produce taxable capital gains if sold. As a rule, the asset's fair market value at the time of the donation is deductible if the asset is something an organization can use for its charitable purposes and if the taxpayer has held the asset for more than 12 months. The same rules apply to publicly traded stocks. The deduction for such a donation cannot exceed 30 percent of the taxpayer's AGI. Donations that exceed the annual limits of 50 percent, or 30 percent of contribution base, may be apportioned over the next five years.

This option would restrict the deduction for any appreciated asset to its tax basis, which is computed as the initial cost of the asset, plus the cost of any subsequent improvements, minus any deductions for depreciation. If the fair market value is less than the tax basis, the deduction is limited to the fair market value. This option would increase federal revenues by \$0.7 billion in 2010 and by \$8 billion over the period from 2010 to 2014.

One rationale for this option concerns fairness: It would give taxpayers the same advantage for donating cash that they now receive for donating assets. Taxpayers can deduct the fair market value of assets even when appreciated value is not included in taxable income. By contrast, cash donations generally come from a taxpayer's wages or other taxable income. (If the tax code were to apply the same rules for cash donations that apply to donations of assets, a tax deduction could be larger than the donation.) This option also would relieve the Internal Revenue Service from having to verify appraisals of assets donated for specific use by the recipient. (Current law restricts deductions for property that will be sold, such as cars or boats, rather than used for a recipient organization's charitable purpose.) Proof of appraisal is required for large deductions, but the accuracy of appraisals can be difficult to verify. Identifying an asset's tax basis is more straightforward: Typically, the cost of the asset is calculated from receipts, and depreciation is calculated according to fixed schedules. In many cases, taxpayers would be expected to have that information already because the asset is used in a business or could be sold at a profit and subject to the capital gains tax.

Opponents of this option point out that the additional tax benefit for donating appreciated assets provides extra incentive for charitable giving. For example, a potential donor has more reason to donate a work of art than to sell it or hold it until the taxpayer's death, at which time the capital gains tax on the appreciated value would be forgiven. Museums report that the tax benefit helps them acquire art that might otherwise remain in private hands. In recent years, policymakers have expressed support for the tax benefit by liberalizing it. To encourage preservation of open space and historic buildings, for example, deductions of some kinds of appreciated property may exceed the 30 percent limit of adjusted gross income and the five-year recovery period.

RELATED OPTIONS: Revenue Options 4, 9, 10, and 12

Rev

RELATED CBO PUBLICATION: Effects of Allowing Nonitemizers to Deduct Charitable Contributions, December 2002

						6	
						Тс	otal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
Allow nonitemizers to deduct charitable donations up to \$100 (\$200 for joint filers)	-0.3	-0.8	-0.8	-0.9	-0.9	-3.7	-8.2
Allow nonitemizers to deduct charitable donations of more than \$250 (\$500 for joint filers)	-0.8	-2.4	-3.1	-3.3	-3.4	-13.0	-31.3
Source: Joint Committee on Taxatio		2.1	0.1	0.0	0.1	1010	0110
	II.						

## Create an Above-the-Line Deduction for Charitable Giving

Current law encourages charitable giving by allowing donors who itemize their deductions to deduct the value of their contributions (up to 50 percent of their adjusted gross income). In 2006, 41.4 million tax returns claimed \$187 billion in itemized charitable deductions. Although nonitemizers cannot deduct contributions, in 2005, those taxpayers nevertheless donated an estimated \$23 billion to charities.

This option would expand the charitable deduction to nonitemizers in the form of an "above-the-line" deduction—in addition to the standard deduction—for some gifts to qualified charities. The deduction could take one of various forms. One alternative would allow single nonitemizers to deduct up to \$100 (the limit would be \$200 for joint filers). That approach would decrease revenues by \$0.3 billion in 2010 and by \$4 billion between 2010 and 2014. Another alternative would allow nonitemizers to deduct total contributions in excess of \$250 for single filers or \$500 for joint filers. That change would have a larger effect, reducing revenues by \$0.8 billion in 2010 and by \$13 billion over five years.

Either approach would reduce the after-tax cost of charitable giving for some nonitemizers, thus encouraging them to increase their donations. Under the first alternative, taxpayers whose annual donations would otherwise have been less than \$100 would have an additional incentive to donate up to the limit. Under the second approach, all taxpayers with taxable income of more than \$250 and adjusted gross income of more than \$500 would have an incentive to contribute at least \$250 a year, and those who already donate that much would have a greater incentive to give more. The main argument in favor of this option is that it would support philanthropy by encouraging taxpayers to increase their charitable contributions. The first approach would give more taxpayers a tax reduction to offset the cost of their donations, but the second might be more effective at boosting charitable donations because it would reduce the after-tax cost of additional giving for the many nonitemizing taxpayers who already contribute more than \$250 to charity. Another advantage is that either approach would be a step toward equalizing the tax treatment of itemizers and nonitemizers who make charitable contributions.

Creating an above-the-line charitable deduction would have at least three drawbacks, however. First, it would be a costly way—in terms of forgone revenue—to expand charitable contributions. Many nonitemizers who already make such contributions would receive a tax benefit even if they did not increase their donations. Overall, any increase in donations would most likely be small relative to the lost tax revenue, because the after-tax cost of giving could have a larger influence on decisionmaking among itemizers than among nonitemizers. Moreover, especially under the first alternative, the after-tax cost of giving an additional dollar to charity would not change for the many taxpayers who currently donate more than \$100 a year.

Second, to the extent that the standard deduction incorporates an implicit allowance for charitable contributions, nonitemizers already effectively deduct their donations. Because nonitemizers could itemize deductions, their decision not to do so suggests a particular advantage in claiming the standard deduction. This

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option would allow nonitemizers to explicitly deduct some contributions but still benefit from the allowance implicit in the standard deduction. Third, by substantially increasing the number of tax returns with charitable deductions, this option would significantly increase either the costs of tax enforcement or the abuse by taxpayers who overstate donations.

#### **RELATED OPTION: Revenue Option 10**

RELATED CBO PUBLICATIONS: The Estate Tax and Charitable Giving, July 2004; and Effects of Allowing Nonitemizers to Deduct Charitable Contributions, December 2002

Eliminate Tax Subsidies for Child and Dependent Care											
						Total					
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Revenues	1.2	2.7	2.5	2.6	2.5	11.5	23.6				
Source: Joint Committee on Ta	axation.										

#### The tax system uses income exclusions and tax credits to help employed taxpayers meet the cost of caring for children under age 13 or for disabled dependents. The exclusion removes the cost of such expenses that are paid by employers from employees' taxable income. The tax credit is given in an amount that is equal to a percentage of a taxpayer's expenses for child or dependent care. The same expenses cannot be claimed both for the exclusion and the credit, although in some cases taxpayers benefit from both provisions.

This option would eliminate both types of subsidy beginning in 2010. That change would add \$1 billion to federal revenues in 2010 and a total of \$12 billion through 2014. (In the case of the exclusion, adding employers' contributions for child or dependent care to taxable income—and thus increasing the wage base from which Social Security benefits are calculated—would increase federal spending for Social Security over the long run.)

Taxpayers are eligible for the exclusion if employers provide child or dependent care directly or offer a qualified plan that provides it. As much as \$5,000 in child and dependent care expenses may be excluded from the taxable wages of employees. However, the amount excluded may not exceed the employee's earnings or, in the case of married taxpayers, the wages of the lower-earning spouse.

Taxpayers can claim a nonrefundable credit against their income tax equal to a percentage of child or dependent care costs. Qualifying expenses are limited to \$3,000 for one dependent or \$6,000 for two or more, and, as with the exclusion, may not exceed the earnings of the taxpayer or a lower-earning spouse. For taxpayers with adjusted gross income of \$15,000 or less, the credit equals 35 percent of qualifying expenses; that rate phases down to 20 percent for taxpayers whose adjusted gross income is at least \$43,000. The 20 percent rate, which applies to most taxpayers, results in a maximum credit of \$600 for one dependent or \$1,200 for two or more. (The current amount was set by the Economic Growth and Tax Relief Reconciliation Act of 2001. If that law expires as scheduled in 2011, both the amount of allowable expenses and the rate structure of the credit will revert to their previous, lower levels. The President's 2010 budget proposes making permanent the current amount.)

Although the credit and the exclusion subsidize the same activities, they provide significantly different benefits. For example, a high-income taxpayer with one child could see his or her income taxes reduced by as much as \$1,750 under the employment-based exclusion but by only \$600 under the credit. In addition, by lowering wage income, the exclusion reduces an employee's payroll taxes, whereas the credit does not.

One rationale for eliminating both the exclusion and the credit is to simplify the way income taxes are calculated. Moreover, other tax provisions—personal exemptions, the child tax credit, and the earned income tax credit—reduce taxes for families with children. Another argument involves fairness: Taxpayers who are alike in other respects face unequal tax burdens depending on their use of paid or unpaid child care (provided by a stay-at-home parent, for example).

A rationale against this option is that employment-based dependent care could be considered part of the cost of employment. The tax code permits other employmentrelated expenses (such as the costs of moving to a new job or purchases of supplies and equipment in excess of 2 percent of income) to be subtracted from taxable income. Also, there is evidence that, among married people, the extent to which the lower-earning spouse works is particularly sensitive to tax rates. Both the exclusion and the credit reduce the cost of working for taxpayers who pay for dependent care. In the absence of tax subsidies, a lower-earning spouse could stop working to care for dependents rather than purchase the service. Consequently, eliminating the subsidies might lessen the labor force participation of those spouses.

Rev

Eliminate the Additional Standard Deduction for Elderly and Blind Taxpayers									
						Total			
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Revenues	0.8	1.1	1.2	1.3	1.3	5.7	12.5		
Source: Joint Committee on Ta	xation.								

Any taxpayer who does not itemize tax deductions is eligible to take the standard deduction, which reduces by a specific amount the filer's income that is subject to taxation. For the 2009 tax year, the standard deduction ranges from \$5,700 for a single person to \$11,400 for a married couple filing jointly (the deduction is adjusted each year to account for inflation). Current law allows single taxpayers who are blind or elderly (over the age of 64) to take what amounts to an additional standard deduction of \$1,400; for blind or elderly married filers the additional deduction is \$1,100. Taxpayers who are both blind and elderly may double the deduction, so if both members of a married couple are blind and elderly, their additional deduction totals \$4,400. In 2006, the filers of 11.3 million tax returns took at least one such deduction.

This option would eliminate the additional deductions for blind and elderly people, thus raising the amount of income subject to taxation for taxpayers in those categories who do not itemize deductions. By broadening the tax base, this option would increase revenues by \$0.8 billion in 2010 and by a total of \$6 billion over the period from 2010 to 2014.

The main rationale for eliminating the additional deductions is fairness. The preferential treatment for elderly taxpayers began after World War II, when elderly people constituted the most impoverished of any age group, and fixed-income pensions made many retirees particularly vulnerable to rising costs of living. However, the adjustment of Social Security benefits for inflation and the introduction of Medicare have helped mitigate those problems. The poverty rate among elderly people is now lower than that found in other age groups. And although blind people face challenges in earning income (for example, they often bear the added expense of hiring readers or keeping guide dogs), no analogous relief is provided to deaf people or to those with other disabilities who confront other, similar, expenses. This option would reduce the inequitable tax treatment received by blind or elderly taxpayers relative to taxpayers who are not blind or elderly but have otherwise similar income and family circumstances.

This option addresses another issue of fairness: Although the justifications for the additional standard deductions generally are grounded in financial hardship, the benefits may not be targeted to those blind or elderly taxpayers with the greatest financial need. The Tax Reform Act of 1986 improved targeting by converting the provision from a personal exemption to its current form as an additional standard deduction. That change made the benefit unavailable to blind or elderly taxpayers who itemize deductions and who generally have higher incomes than nonitemizers do. However, the additional standard deductions do not benefit blind or elderly people who have no tax liability before the deductions-often those with the lowest incomes. Moreover, as with any deduction, the tax benefit of the additional standard deduction increases with the taxpayer's marginal tax bracket (the bracket that applies to the last dollar of income). So the \$1,400 deduction reduces tax liability by \$210 for a single taxpayer in the 15 percent bracket but by \$490 for a taxpayer in the 35 percent bracket.

The main disadvantage of this option is its potential to reduce the overall progressive nature of the income tax system—the greatest benefit of the additional deductions goes to taxpayers with income under \$50,000. Furthermore, despite the issues of fairness and imperfect targeting that are raised by the additional standard deductions, they do benefit many low- and moderate-income blind or elderly taxpayers.

## Include Employer-Paid Premiums for Income-Replacement Insurance in Employees' Taxable Income

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	8.2	20.5	21.8	22.5	23.1	96.1	225.9
Source: Joint Committee on Taxation.							

Current tax law treats benefits that replace income for unemployed, injured, or disabled people in different ways. Unemployment benefits are fully taxable, whereas benefits paid under workers' compensation programs (for work-related injuries or illnesses) are exempt from taxation. Disability benefits (for non-work-related injuries) may be taxable or not, depending on who paid the premiums for the disability insurance. If the premiums were paid by an employer, the benefits are taxable (although the recipient's tax liability can be offset partly by special income tax credits for elderly or disabled people). If the employee paid the premiums for disability insurance out of after-tax income, the benefits are not taxed.

This option would eliminate existing taxes on incomereplacement benefits, but it would include in employees' taxable income several employer-paid taxes, premiums, and other contributions. Specifically, taxes paid under the Federal Unemployment Tax Act and the various state unemployment programs, 60 percent of premiums for workers' compensation (that is, excluding the part that covers medical expenses), and the portion of insurance premiums or contributions to pension plans that funds disability benefits would all become taxable under the individual income tax. Together, those changes would increase revenues by \$8 billion in 2010 and by \$96 billion through 2014. Over the long term, the revenue gain would result almost entirely from adding workers' compensation premiums to taxable income. (Including those various items in employees' taxable income, and thus in

**RELATED OPTION: Revenue Option 16** 

the wage base from which Social Security benefits are calculated, also would increase federal spending for Social Security over the long run.)

Treating different kinds of income-replacement insurance similarly would eliminate the current somewhat arbitrary discrepancies that exist in the taxation of various incomereplacement benefits. For example, people who are unable to work because of injury would not be taxed differently depending on whether the injury was related to a previous job. Furthermore, this option would spread the tax burden among all workers covered by such insurance rather than placing the burden solely on those who need the benefits, as is currently the case with unemployment insurance and employer-paid disability insurance.

This option would not eliminate all disparities in the treatment of income-replacement benefits, however. For example, the income-replacement portion of adjudicated awards and out-of-court settlements for injuries not related to work and not covered by insurance would remain entirely exempt from taxation. Also, recipients of the supplemental unemployment benefits that lawmakers occasionally appropriate during economic downturns would receive those benefits tax-free, even though no employer-paid taxes had been included in their taxable income. Another disadvantage of this option is that exempting unemployment benefits from taxation would reduce the incentive for unemployed people to accept available work.

Emminate the Tax Exclus	51011 10	r Empi	oyment	-Daseu	LIIE III	Surance	
						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	1.6	2.4	2.5	2.5	2.6	11.6	25.2
Source: Joint Committee on Taxation							

Eliminate the Tax Evaluation for Employment Read Life Insurance

### **Option 16**

### Many workers receive some compensation as noncash, employer-paid benefits that are not subject to income or payroll taxes. Current law excludes from employees' taxable income the premiums that employers pay for group term life insurance, for example. The amount excluded is limited to the cost of premiums for the first \$50,000 of insurance. Employer-paid life insurance is the thirdlargest tax-exempt fringe benefit (after health insurance and pensions) as measured by lost federal revenues.

This option would eliminate that exclusion and count all premiums for employer-paid life insurance in employees' taxable income. The change would increase federal revenues by \$12 billion between 2010 and 2014; \$7 billion would come in individual income tax revenues, and \$4 billion would be in payroll tax revenues. (Including employers' contributions for life insurance in taxable income, and thus in the wage base from which Social Security benefits are calculated, also would increase federal spending for Social Security over the long run.)

The main arguments in favor of this option are that it would enhance the efficiency and equity of the tax system. Like the tax exclusions for other employment-based fringe benefits (such as child care), the exclusion for life insurance premiums creates an incentive for employees to buy more life insurance than they would if they paid the full cost themselves. The subsidy results in employees' receiving more compensation in the form of life insurance and less in cash, which is fully taxed. In terms of fairness, excluding premiums from taxation allows

RELATED OPTIONS: Revenue Options 13, 15, and 17

workers whose employers purchase life insurance for them to pay less in taxes than do workers who have the same total compensation but who buy their own insurance. Moreover, self-employed people are not permitted to exclude life insurance premiums from their taxable income. Finally, the exclusion links the size of the tax incentive to a household's marginal tax rate (the rate on the last dollar of income), which generally results in larger subsidies for taxpayers with higher income.

Another argument in favor of this option is that it would be relatively easy to implement. The value of employerpaid life insurance, unlike the value of some other noncash benefits, can be accurately measured, so employers could report the insurance premiums and compute withholding for those benefits by the same method that they use for wages. Indeed, employers already withhold taxes on the life insurance premiums they pay that exceed the \$50,000 limit.

Some opponents of this option argue that people systematically underestimate the financial hardship that a wageearner's death brings to a family and thus they purchase too little life insurance. If that view is correct, the incentive offered by the exclusion has benefits for society because people who bore the full cost of life insurance would purchase too little of it. (In that case, a more efficient method for encouraging people to buy life insurance would be to extend favorable tax treatment to all purchasers rather than only to workers whose premiums are paid by their employers.)

Include Investment	Income f	rom Lif	fe Insu	rance a	nd Annı	uities in Taxa	able Income
						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	11.7	24.8	26.6	27.1	27.7	117.9	265.0

Source: Joint Committee on Taxation.

Life insurance policies and annuities often combine features of insurance and tax-favored savings accounts. (An annuity is a contract with an insurance company under which, in exchange for premiums, the company agrees to make fixed or variable payments to a person at a future time, usually during retirement.) The investment income from the money paid into life insurance policies and annuities, which is sometimes called inside buildup, is not included in taxable income until it is paid out to the policyholder. If the accumulated income is left to the policyholder's estate or used to finance life insurance (as in the case of whole-life policies), it can escape inclusion and taxation entirely. The tax treatment of inside buildup is similar to the treatment of another type of investment income, capital gains.

Under this option, life insurance companies would inform policyholders annually of the investment income that had been realized on their accounts-just as mutual funds do now-and policyholders would include those amounts in their taxable income for that year. In turn, disbursements from life insurance policies and benefits from annuities would no longer be taxable when they were paid. That approach would make the tax treatment of investment income from life insurance and annuities match the treatment of income from bank accounts. taxable bonds, or mutual funds. (Taxes on investment income from annuities purchased as part of a qualified pension plan or qualified individual retirement account would still be deferred until benefits were paid.) Those changes in tax treatment would increase revenues by \$12 billion in 2010 and by a total of \$265 billion from 2010 to 2019.

By taxing the investment income from life insurance and annuities as it was realized, this option would eliminate a tax incentive to purchase such insurance. Whether that outcome would be a benefit or a drawback depends on whether the current incentive is considered beneficial. Encouraging the purchase of life insurance is useful if people buy too little because they have systematically underestimated the financial hardship that their death will impose on their families. Encouraging the purchase of annuities is helpful if people tend to underestimate their retirement spending or life span and thus buy too little annuity insurance to protect against outliving their assets. However, there is scant evidence about how successful the current tax treatment is in reducing underinsurance.

If some incentive to purchase life insurance is indeed considered a useful part of the tax system, an alternative approach would be to encourage such purchases directly by giving people a tax credit for their life insurance premiums or by allowing them to deduct part of those premiums from their taxable income. Either alternative would encourage people to purchase term insurance as well as whole-life policies. (Term insurance does not benefit from the favorable tax treatment of inside buildup. It provides coverage for a specified period and pays benefits only if the policyholder dies during the term. Otherwise, the policy expires without value.) Term insurance accounts for a large proportion of all life insurance policies.

A disadvantage of taxing inside buildup is that the people who would be affected would not have access to the buildup to pay the tax. People who had accumulated considerable savings from contributions to whole-life policies or annuities could owe substantial amounts of taxes relative to the cash income from which they would have to pay the taxes.

Include All Income Earned Abroad by U.S. Citizens in Taxable Income									
						То	tal		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Revenues	1.4	6.2	6.5	6.9	7.3	28.3	71.2		
Source: Joint Committee on Ta	axation.								

### United States citizens who live and earn income abroad must file tax returns each year. For calendar year 2009, current law allows those citizens to exclude from taxation up to \$91,400 of the income they earn in other countries. (That exclusion is indexed for inflation.) Because of that exclusion and others for foreign housing and the usual personal exemptions and deductions, U.S. citizens who reside abroad and earn close to \$100,000 may not incur any U.S. tax liability, even if they pay no taxes to their resident countries. If they do pay taxes to their resident countries, those citizens receive a credit, which also could eliminate their U.S. tax liability on the income. (The Tax Increase Prevention and Reconciliation Act of 2005, however, included several technical changes that made the tax exemption less generous overall.)

This option would retain the credit for taxes paid to foreign governments but would require U.S. citizens living overseas to include all of the income they earned abroad in their adjusted gross income. U.S. citizens who paid taxes to countries where tax rates are higher than in the United States generally would not owe U.S. taxes on their earned income; those living in countries with lower tax rates might have some U.S. tax liability. That change would increase revenues by \$1 billion in 2010 and by \$28 billion from 2010 to 2014. One rationale for eliminating the exclusion for foreign earnings is that U.S. citizens with similar income should incur similar tax liabilities, regardless of where they live or what services they receive from the government. That principle is violated if people can move to low-tax foreign countries and escape U.S. taxation while retaining their U.S. citizenship. In addition, the existing exclusion represents an implicit subsidy to corporations that employ U.S. citizens abroad, because those companies can pay their employees less than they would if the income were fully subject to U.S. taxes. Moreover, ending the exclusion for foreign-earned income would lessen some of the complexity of the tax code.

Opponents of this option argue that U.S. citizens who live in other countries should not face the same tax treatment as U.S. residents because they do not receive the same services from the U.S. government. Opponents also maintain that excluding foreign-earned income promotes exports by U.S. multinational firms by making it less expensive for those companies to hire U.S. employees to live and work abroad.

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Tax Carried Interest as Ordinary Income											
					То	tal					
2010	2011	2012	2013	2014	2010-2014	2010-2019					
2.0	3.5	3.2	2.5	2.1	13.3	24.5					
						2010 2011 2012 2013 2014 2010-2014					

Investment funds—such as private equity, real estate, and hedge funds—are typically organized as partnerships consisting of one or more general partners, who manage the fund. The partners determine investment strategy; solicit capital contributions; acquire, manage, and sell assets; arrange loans; and support all of those activities. Partnerships also can consist of limited partners, who contribute capital to the partnership but do not participate in management. General partners can invest their own financial capital in the partnership, but such investments usually represent a small share of the total funds invested.

General partners typically receive two types of compensation for managing the fund: a fee tied to some percentage of the fund's assets under management and a profit share, or "carried interest," tied to some percentage of the profits generated by the fund. A common compensation agreement gives general partners a 2 percent fee and 20 percent in carried interest. The fee, less expenses of the fund, is taxed as ordinary income (all income except that from capital gains). The taxation of the carried interest is deferred until profits are realized on the fund's underlying assets, and any resulting profits to the general partners are taxed at the capital gains tax rate to the extent that the firm's profits reflect capital gains.

This option would treat the net income partners receive for performing investment management services as ordinary income. Income the same partners receive on the basis of their capital contribution would not be affected. The change would produce \$2 billion in revenues in 2010 and \$13 billion between 2010 and 2014. The President's budget for 2010 proposes a similar change.

Many economists view at least part of carried interest, if not all of it, as performance-based compensation for management services rather than as a return on financial capital invested by that partner. Therefore, at least some component of the carried interest could be considered, and taxed, as ordinary income. And the treatment thus would match that for many other forms of performancebased compensation, such as bonuses.

Taxing carried interest at the same rate as ordinary income also would equalize the tax treatment of income that partners earn for performing investment management services with the treatment of income that executives earn for doing similar work. The managers of publicly traded mutual funds also invest in a variety of assets; executives of many corporations direct investment, arrange financing, purchase other companies, or spin off components of their enterprises.

One drawback of taxing all carried interest at ordinary rates is that it would treat the income of partners who provide investment management services differently from that earned by entrepreneurs who start new businesses and contribute labor services and capital. To the extent that the operation of a business generates income for its owners, that income is taxed at ordinary rates. When owners sell a business, however, profits from the sale generally are taxed as capital gains, even though some of those profits are a direct return on the specific labor services of the owners.

Another drawback of the option is that it would reduce the incentive for general partners to undertake risky investments that can lead to new products, innovations, and more efficient markets and businesses. It is not clear, however, how much a lower rate on capital gains contributes to such outcomes, or even whether promoting risky investment offers more economic advantages than disadvantages. Furthermore, the application of that broader motivation to carried interest in investment funds is not clear, because the financial capital that is gathered and invested in such funds is provided almost entirely by limited partners, not by general partners.

An alternative option would be to treat a portion of carried interest as ordinary income and the rest as capital income. In one suggestion, a general partner's carried interest would be considered an interest-free, nonrecourse loan from limited partners to the general partner in an amount equal to the general partner's share of profits (such as 20 percent of the partnership assets) and with the requirement that the loan's proceeds be reinvested in the fund. (A borrower is not personally liable for a nonrecourse loan, beyond the pledged collateral, which in this case is the general partner's claim on future profits.) Under current tax rules, the implicit interest on an interest-free loan would be taxed as ordinary income, and the interest rate would be set at the current rate on federal securities with the same duration as the loan. At the time the partnership sold its assets, any gain or loss to the general partner, after repayment of the loan, would be treated as a capital gain or loss. Under this alternative, the general partner would typically pay more in taxes than is assessed under current law but less than would be assessed if all carried interest was treated as ordinary income.

This alternative has the advantage of being more resistant to financial planning that is intended to avoid full taxation without changing the underlying economics of the partnership arrangement. It also reflects the view of some analysts that carried interest is neither entirely a return on capital nor entirely labor compensation. However, the approach is complex, and the extent of the complexity could make it particularly difficult to implement.

Much of the complexity associated with the taxation of carried interest arises from the difference between the capital gains tax rate and the tax rate on ordinary income. In 2010, for example, high-income taxpayers will be assessed a 35 percent marginal tax rate on ordinary income. For labor income, another 2.9 percent will be added in a payroll tax for Medicare. In contrast, longterm capital gains for such taxpayers typically will be taxed at 15 percent. That difference creates a strong incentive for such taxpayers to shift income into capital gains. Whether carried interest constituted compensation for services provided or a return on capital invested would be largely irrelevant if the tax rates on labor and capital income were the same.

RELATED CBO PUBLICATION: Statement of Peter R. Orszag, Congressional Budget Office, before the House Committee on Ways and Means, *The Taxation of Carried Interest*, September 6, 2007

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## Tax Social Security and Railroad Retirement Benefits Like Defined-Benefit Pensions

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	13.2	30.4	35.0	36.4	38.1	153.1	373.2
Source: Joint Committee on Taxation	).						

Under current law, roughly three-quarters of the total benefits paid by the Social Security and Railroad Retirement programs are not subject to income taxation. Recipients pay tax only if the sum of their adjusted gross income, their nontaxable interest income, and one-half of their Social Security and Tier I Railroad Retirement benefits exceeds a threshold. If that total is more than \$25,000 for a single taxpayer or \$32,000 for a couple filing jointly, up to 50 percent of the benefits are taxed. Above a second set of thresholds—\$34,000 for single filers and \$44,000 for joint filers—as much as 85 percent of the benefits are taxed. Together, those thresholds constitute a three-tiered structure for taxing Social Security and Railroad Retirement benefits. However, most recipients fall in the first tier, so their benefits are not taxed.

Distributions from defined-benefit pension plans, by contrast, are taxable unless those payments represent the recovery of an employee's "basis," or after-tax contributions to the plan. Each year, a certain percentage of a recipient's distribution is deemed to be nontaxable basis recovery. That percentage (determined in the year distributions begin) is based on the recipient's life expectancy and cumulative amount of after-tax contributions. Once the recipient has recovered his or her entire basis tax-free, all subsequent pension distributions are fully taxed. Until recently, distributions from defined-contribution plans and individual retirement accounts (IRAs) that received after-tax contributions were taxed similarly to those from defined-benefit plans. Now, however, most workers can make after-tax contributions to so-called Roth plans; distributions from those plans are entirely tax-exempt-a more favorable treatment than the tax-free recovery of basis only.

This option would define a basis in Social Security and Railroad Retirement benefits and would tax only benefits in excess of that basis, in the same manner as with defined-benefit pensions. The basis would be the payroll taxes that employees pay out of after-tax income to support those programs (as opposed to the equal amount that employers pay on their workers' behalf). For selfemployed people, the basis would be half of the payroll taxes they cannot deduct from the income taxes on their tax returns. Under such an approach, benefits subject to income taxation would, for most recipients, exceed 85 percent of benefits received. Revenues would increase by \$13.2 billion in 2010 and by \$153 billion between 2010 and 2014.

Taxing Social Security and Railroad Retirement benefits like defined-benefit pensions would make the tax system more equitable in at least two ways. First, it would eliminate the preferential treatment given to Social Security benefits but not to pension benefits; a preference that is minimal for higher-income taxpayers but much larger for low- and middle-income taxpayers. Second, it would treat elderly and nonelderly taxpayers with comparable income the same way. The option also could simplify preparation of tax returns for elderly people.

This option also has drawbacks. More elderly people would have to file tax returns than do so now. Some retirees might believe that raising taxes on Social Security and Railroad Retirement benefits would violate the implicit promises of those programs. Calculating the percentage of each recipient's benefits that would be excluded from taxation would impose an additional burden on the Social Security Administration. Finally, this option would not provide the same tax benefits as the Roth option for defined-contribution plans and IRAs. (The equivalent of Roth treatment would be to tax only the half of benefits attributable to employers' contributions.)

RELATED OPTIONS: Revenue Options 17 and 21

RELATED CBO PUBLICATION: Social Security: A Primer, September 2001

## Consolidate and Simplify Different Types of Defined-Contribution Retirement Plans

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	-0.5	-0.6	-0.5	-0.4	-0.3	-2.3	1.2
Source: Joint Committee on Taxati	on.						

Current law provides for a variety of tax-preferred defined-contribution plans that employers can establish for their employees' retirement. The most common are 401(k) plans, to which employees may contribute up to \$16,500 in 2009 (\$22,000 for those age 50 and above). But other plans-for employees of state and local governments, nonprofit organizations, and small businesses, for example-can have different contribution limits, and all have different administrative rules. Standard 401(k) plans, for instance, must perform "nondiscrimination tests" to ensure that benefits are not skewed disproportionately toward highly compensated employees. Other 401(k) plans, called savings incentive match plans for employees (or SIMPLEs) have less complicated tests. But SIMPLEs are available only to small businesses, and in 2009 their contribution limit is set at \$11,500 per employee (\$14,000 for those age 50 and above).

This option, which is similar to a proposal presented in the November 2005 report of President Bush's Advisory Panel on Federal Tax Reform, would consolidate all employer-sponsored defined-contribution plans that accept voluntary employee contributions. The new plan would have the same contribution limit as a standard 401(k) plan, but it would have significantly simpler administrative rules, particularly for nondiscrimination testing. Plans that do not accept employee contributions would not be affected. The option would reduce revenue by \$0.5 billion in 2010, and by \$2.3 billion between 2010 and 2014. In years after 2014, however, the option would increase revenues.

The President's advisory panel proposed this change to encourage more employers to offer retirement plans to which their employees could contribute. It feared that the multiplicity of plan types is so confusing that some employers might be unable to select an appropriate plan. Furthermore, it surmised that the complexity of the nondiscrimination rules might deter some employers from offering any plan at all.

Another argument for this option is that it would reduce compliance costs for employers that already offer retirement plans. Furthermore, it would end the practice of allowing some types of employees (primarily public school teachers) to contribute the maximum amount to two different types of plan.

Opponents of this option argue that current participants in the different plans have been well served and should not be forced to accept a new type of retirement plan. Others fear that simplifying the rules against discrimination would make it easier for employers to direct a disproportionate share of benefits to corporate officers or other highly compensated employees.

### RELATED OPTIONS: Revenue Options 17, 20, and 22

CBO PUBLICATION: Utilization of Tax Incentives for Retirement Saving: Update to 2003, Background Paper, March 2007

## End the Preferential Treatment of Dividends Paid on Stock Held in Employee Stock Ownership Plans

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	0.6	0.8	1.0	1.2	1.3	4.9	13.3
Source: Joint Committee on Taxation							

Employee stock ownership plans (ESOPs) are a type of retirement plan designed to encourage companies and their shareholders to contribute or sell stock to their employees. Because they meet certain requirements relating to employee ownership, ESOPs are granted more tax advantages than is the case for other qualified retirement plans. Corporations that sponsor ESOPs typically contribute their own stock rather than cash to the plan on their workers' behalf. Those contributions, like employers' contributions to other qualified retirement plans, can be deducted from the company's taxable income. But employers with ESOPs gain an additional tax advantage: They can deduct the dividends paid on stock held in an ESOP if those dividends are paid directly to the plan's participants or are paid to the plan and either reinvested in additional company stock, used to repay loans with which the stock was originally purchased, or distributed to participants within 90 days of the end of the plan year.

Another tax advantage goes to shareholders: Under certain circumstances, they can defer paying capital gains taxes on the proceeds of sales of the company's stock to its ESOP. For that to obtain, the company must be a C corporation and thus subject to the corporate income tax, the stock cannot be traded publicly, and the proceeds from the sale of the stock to the ESOP must be invested in the stock of another U.S. company.

This option would eliminate ESOPs' tax advantages, effectively rendering ESOPs indistinguishable from other qualified retirement plans. The change would increase revenues by \$0.6 billion in 2010 and by \$4.9 billion between 2010 and 2014.

Several arguments can be made against giving preferential tax treatment to ESOPs. First, the current treatment causes similar dividend payments to have different tax consequences for different companies. Second, it hampers diversification of employees' retirement portfolios because the assets of an ESOP, by design, consist primarily of shares of the employer's stock. If the price of that stock drops, employees may have much less wealth in retirement than they would have had if they had been allowed to diversify their investments, as participants in a typical 401(k) plan can. A third argument for eliminating preferential tax treatment is that ESOPs occasionally have been used for purposes for which they were not intended, such as to ward off hostile takeovers by placing large numbers of shares in friendly hands.

The main rationale for retaining the tax advantages of ESOPs is that having employees own a company's stock directly links their financial interests to their productivity. Then, greater productivity would translate into higher profits for the company and thereby increase the value of the employees' stock. To the extent that the incentive of stock ownership works as intended, ESOPs help promote increased productivity among workers. However, studies linking employee ownership to productivity have exhibited mixed results, and some of those that report such a link suggest that factors not addressed by the tax incentive, such as employees' participation in management, also are important.

Rev

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
Eliminate the EITC for people who do not live with children	0.2	1.7	1.6	1.6	1.6	6.7	15.1
Expand the EITC for people who do not live with children	-0.3	-3.6	-3.4	-3.4	-3.5	-14.2	-31.9

## Modify the EITC for People Who Do Not Live with Children

Source: Joint Committee on Taxation.

Notes: EITC = earned income tax credit.

These estimates represent the change in the overall budget balance resulting from the sum of changes to revenues and outlays.

The earned income tax credit (EITC) was added to the tax code in 1975 to supplement the wages of low-income families. This refundable credit, originally created to off-set the work disincentives associated with welfare programs, was available only to families with at least one child. Then, in 1994, lawmakers created a small credit for low-income people at least 25 years old and under 65 who do not live with children. (There is no age exclusion for people who live with children.)

For 2010, the tax credit for people who do not live with children is scheduled to phase in at a rate of 7.65 percent-the payroll tax rate for employees-over the first \$5,940 of earnings, yielding a maximum credit of \$454. (As an example, a qualifying individual with earnings of \$2,000 would receive a credit of \$153.) The EITC then phases out at the same rate for the greater of earnings or adjusted gross income above \$12,430 for married couples filing jointly and above \$7,430 for all others. The higher threshold for married couples filing jointly was established in the American Recovery and Reinvestment Act of 2009 (Public Law 111-5). If that provision expires as scheduled after 2010, the credit will begin phasing out at the lower income amount for all filers, without regard to marital status. The phase-out range for EITC recipients who do not live with children begins at substantially lower income thresholds than for families with children, thus limiting the number of eligible taxpayers. In 2006, 4.8 million people received credits averaging \$240. Nearly 600,000 people received the full credit. About 2 million recipients had income within the phase-in range, and roughly 2.2 million were in the phase-out range.

This option proposes two possibilities for modifying the EITC for people who do not live with children. The first would eliminate the EITC for that group, raising \$6.7 billion in revenues between 2010 and 2014. The second would expand the credit, reducing revenues by \$14.2 billion over the same period.

Under the second approach, the phase-in rate would double, from 7.65 percent to 15.3 percent, to equal the combined employer–employee payroll tax rate. That alternative would increase the phase-out rate to 15.3 percent and raise the threshold at which the credit begins to phase out to \$16,820 for married couples filing jointly and to \$11,820 for all other filers. Those thresholds would be indexed for inflation, although after 2010, the threshold for joint filers would be reduced to the threshold for all other filers.

A rationale for raising revenues by eliminating the EITC for workers without children is that doing so would preserve the credit for parents or other people who incur additional expenses associated with caring for children at the same time they themselves are working. Also, the EITC provides only a small benefit for workers without children, but it creates significant administrative costs for tax filers who claim it. Because the instructions are complicated, most claimants without children pay preparers to help them compute what amounts to a relatively small credit.

One argument in favor of expanding the credit is that it would help offset the tax burdens borne by workers with very low income. In 2005, childless nonelderly households in the bottom quintile (income below \$18,000)

### CHAPTER THREE

were subject, on average, to an effective marginal tax rate of 10 percent. That rate includes the employer portion of payroll taxes, which businesses pass on to workers in the form of reduced compensation. In contrast, households in the lowest quintile that did have children received tax credits that—in the aggregate—nearly offset the combined burden of the income, payroll, and excise taxes.

Expanding the EITC for people who do not reside with children also could be justified by the argument that the credit provides crucial assistance to low-income workers, including many noncustodial parents who help support

**RELATED OPTION: Revenue Option 24** 

their children. Expanding the program would increase government assistance to society's most financially needy people. Research findings show that past expansions of the EITC have contributed to increased labor force participation among low-income single mothers and suggest that similar expansions of the credit could have similar effects among people who do not live with children. An argument against expanding the credit is that, under some circumstances, marriage penalties could increase (that is, an unmarried couple could receive a larger combined EITC by choosing not to marry).

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rity Benel	tits in (		ting the	Phase-	Out of the E	IIC
					То	tal
2010	2011	2012	2013	2014	2010-2014	2010-2019
0.1	0.9	0.8	0.8	0.8	3.4	7.9
	2010	2010 2011	2010 2011 2012	2010 2011 2012 2013	2010 2011 2012 2013 2014	2010 2011 2012 2013 2014 2010-2014

Source: Joint Committee on Taxation.

Note: These estimates represent the change in the overall budget balance that results from the sum of changes to revenues and outlays.

The refundable earned income tax credit (EITC), which is designed to help low-income workers and their families, phases out as a taxpayer's earned income or adjusted gross income (AGI), whichever is larger, exceeds a threshold. Under the tax code, AGI does not include some income from government transfer programs, such as Social Security. Consequently, low-income families that receive sizable transfer payments may qualify for a larger EITC than otherwise comparable families with the same total income whose income stems entirely from sources included in AGI.

In the case of Social Security, the tax code requires single filers with income above \$25,000 and joint filers with income above \$32,000 to count up to 85 percent of their Social Security benefits in AGI. This option would extend that requirement by mandating that taxpayers who might be eligible for the EITC include all of their Social Security benefits in a modified AGI that would be used for phasing out the earned income tax credit. That change would increase federal revenues and decrease outlays for the EITC by a total of \$3.4 billion over the period from 2010 to 2014.

The main argument in favor of counting all Social Security benefits in calculating the phase-out of the EITC is that doing so would make the credit fairer with

**RELATED OPTION: Revenue Option 23** 

a minimum of administrative difficulty. Low-income taxpayers who receive Social Security benefits and those whose income is derived entirely from sources that are fully included in AGI would be treated the same way. Moreover, because the Internal Revenue Service already receives information about taxpayers' Social Security benefits, the option could be implemented with only minor procedural changes. (By comparison, a broader option that included income from other transfer programs in the modified AGI would be difficult to administer because not all of the necessary information is collected. Moreover, if all transfer payments were counted for phasing out the EITC, lawmakers would have to adjust other aspects of the credit if they wished to maintain the same level of subsidy for low-income workers.)

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A drawback of this option is that it would reduce the disposable income of low-income people with Social Security. Another drawback is that counting Social Security benefits in phasing out the EITC would make claiming the credit more complex. Potential EITC claimants with Social Security income would be required to compute a modified AGI in addition to their regular AGI, which would further complicate the already complex process for taxpayers. That result would run counter to recent efforts to simplify the procedures for claiming the earned income tax credit.

# Replace the Tax Exclusion for Interest Income on State and Local Bonds with a Tax Credit

						Tot	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	0	0.2	0.7	1.2	1.7	3.8	19.8
Source: Joint Committee on Taxatio	n.						

The tax code allows investors in state and local bonds to exclude from their adjusted gross income (AGI), and thus from taxation, the interest they earn on those bonds. State and local governments therefore can pay lower interest on that debt than would be paid on bonds of comparable risk whose interest was taxable. The revenue forgone by the federal government-more than \$36 billion per yeareffectively pays part of the costs that state and local governments incur when they borrow. The American Recoverv and Reinvestment Act of 2009 (ARRA, Public Law 111-5) allows state and local governments to replace the interest exclusion on their bonds with a federal tax credit equal to 35 percent of each interest payment made under bonds issued in 2009 and 2010. The credit may be paid directly either to the state or local issuer or to the holder of the bond (in that case it is included in the bondholder's AGI).

This option would, beginning in 2011, replace the exclusion for such interest income with a tax credit that would be included in the taxpayer's AGI. A bondholder would receive a taxable interest payment from the state or local government that issued the bond and a federal tax credit that would give the bondholder an after-tax return comparable with the return on a tax-exempt bond. The credit rate would be determined by the Secretary of the Treasury, and it would maintain the average interest subsidy to state and local issuers under pre-2009 law. This rate would probably be lower than the credit rate included in ARRA. That change would increase federal revenues by \$0.2 billion in 2011 and by \$3.8 billion between 2011 and 2014. (This option would retain restrictions, such as those on arbitrage earnings, that now apply to the issuance of tax-exempt bonds by state and local governments.)

Creating a tax credit for the interest paid on state and local debt could have several advantages. First, it could lower states' and localities' borrowing costs by about the same amount as the current tax exclusion but cause a smaller reduction in federal revenues. The reduction would be smaller because switching to the credit would prevent bondholders in higher tax brackets from receiving gains that exceeded the investment return necessary to induce them to buy the bonds. Second, the size of the tax credit could be varied to allow lawmakers to adjust the extent of the federal subsidy-on the basis of its perceived benefit to the public-for different categories of borrowing by state and local governments. (Even with a tax credit, however, the federal subsidy would remain akin to an entitlement; that is, it would not automatically be subject to annual Congressional scrutiny.)

Opponents of this option argue that it could raise the interest rates that state and local governments pay on borrowed funds. The credit rate would be set on the basis of information for the entire market for tax-exempt bonds, so the reduction in the interest rate from the credit could be lower than that under the current tax exemption for some issuers. In addition, the credit would reduce the after-tax returns on state and local bonds for people who are subject to high marginal tax rates (the rate on the last dollar of income) and thus could lead them to buy fewer of those bonds. If the drop in demand from those taxpayers was not offset by increased demand from other investors, state and local governments' borrowing costs would be reduced by a smaller percentage than they are now, and interest rates on state and local debt would rise. Paying higher rates for borrowing could in turn cause states and localities to reduce their spending on schools, roads, and other capital projects that often are financed by bonds.

**RELATED OPTIONS: Revenue Options 38 and 39** 

RELATED CBO PUBLICATIONS: Statement of Donald B. Marron, Congressional Budget Office, before the Subcommittee on Select Revenue Measures, House Committee on Ways and Means, *Economic Issues in the Use of Tax-Preferred Bond Financing*, March 16, 2006; and *Tax-Credit Bonds and the Federal Cost of Financing Public Expenditures*, July 2004

						Total		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues	0	0.5	2.0	2.0	2.1	6.6	16.4	

**Consolidate Tax Credits and Deductions for Education Expenses** 

### **Option 26**

### Federal support for postsecondary education through the tax system has grown more complex in recent years. In addition to the many tax-preferred savings vehicles, taxpayers benefit from several education-related credits and deductions:

- In 2008, the nonrefundable Hope tax credit was as much as \$1,800 for qualifying tuition and fees. (It subsidizes 100 percent of the first \$1,200 of education expenses and 50 percent of the next \$1,200. Those amounts are indexed for inflation.) The credit can be claimed for expenses in the first two years of a postsecondary degree or certificate program so long as the student is enrolled at least half-time. The American Recovery and Reinvestment Act of 2009 (ARRA, Public Law 111-5) renamed the program—it is now the American Opportunity Tax Credit (AOTC)-and expanded it in several ways. The AOTC now covers up to \$2,500 in educational expenses (100 percent of the first \$2,000 and then 25 percent of the next \$2,000), and it is available for all four years of postsecondary education. Up to 40 percent of the credit is refundable for lower-income households. Under ARRA, the new provisions will apply only for 2009 and 2010; the President's 2010 budget proposal would make the AOTC permanent.
- The nonrefundable Lifetime Learning tax credit is for up to \$2,000 for qualifying tuition and fees. (The credit subsidizes 20 percent of each dollar of qualifying expenses up to a maximum of \$10,000.) Only one Lifetime Learning credit may be claimed per tax return per year, but the expenses of more than one family member (a taxpayer, spouse, or dependent) are included in the calculation. Unlike the Hope credit, the Lifetime Learning credit can be used after the first two years of postsecondary education and by students who attend school less than half-time. However, taxpayers may not claim both credits for the same student in the same year.

■ Up to \$2,500 per year in interest on student loans may be taken as a tax deduction.

To qualify for those credits and deductions, taxpayers and students must meet various additional conditions. Furthermore, eligibility for those education-related tax credits and deductions is based on household income, and benefits phase out above specific income thresholds.

This option would combine the three programs into a single tax credit for expenses for higher education. The first \$10,000 of tuition and fees for students in the first two years of postsecondary education would qualify for a 20 percent nonrefundable subsidy. After that, and for students attending school less than half-time, the subsidy would be 15 percent. Although the interest deduction would be eliminated, the first \$2,500 of interest on students' loans would count as a tuition expense. The new credit could be claimed for each student in a household.

Under this option, the starting point of the credit's phaseout would be \$50,000 for single filers and \$100,000 for joint filers (indexed for inflation). Each additional dollar of modified adjusted gross income (AGI) would reduce the credit by 5 cents until the credit was completely phased out. (For most taxpayers, modified AGI and regular AGI are the same. Modified AGI begins with AGI as the base and then applies certain tax exclusions and deductions.) Thus, a \$2,000 credit for a single filer would be fully phased out at a modified AGI of \$90,000. The new credit would take effect in 2011, after the expansion of the HOPE credit expired, and would raise revenues by \$6.6 billion through 2014.

This option offers two main benefits: It would simplify the tax code's preferences for higher education, and it could provide higher average benefits than current law does to households with students.

Some taxpayers, however, would benefit less from the new credit than they do now. Like the Lifetime Learning

### CHAPTER THREE

credit, the new credit would subsidize 20 percent of qualifying education expenses, and benefits could be smaller for taxpayers with a marginal tax rate (the rate on the last dollar of income) above 20 percent. For example, someone with a marginal tax rate of 25 percent who paid \$1,000 in student loan interest would receive a benefit of \$150 under this option, compared with \$250 under current law. Furthermore, because this option is nonrefundable, it would be less generous for low-income households than the expansion of the Hope credit under ARRA.

RELATED CBO PUBLICATION: Private and Public Contributions to Financing College Education, January 2004

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Limit or Eliminate Eligibility for the Child Tax Credit											
						Total					
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Revenues											
Lower the age of dependent											
eligibility to 13	0	0.6	3.0	3.0	2.9	9.5	23.5				
Eliminate the child tax credit	0	2.9	14.5	14.4	14.2	46.0	113.7				

### Eliminate Elizibility for 41. . OL 11 T-

Source: Joint Committee on Taxation.

Note: These estimates represent the change in the overall budget balance that results from the sum of changes to revenues and outlays.

The child tax credit enacted in the Taxpayer Relief Act of 1997 allows taxpayers to claim a partially refundable credit against their federal income tax liability for each eligible child. To qualify, the child must be 17 or younger at the close of the year and be able to be claimed as a dependent by the taxpayer. The Economic Growth and Tax Relief Reconciliation Act of 2001 (EGTRRA) and other laws increased the credit from \$500 to \$1,000 per child and made it refundable for taxpayers with one or two children. More than 25 million taxpayers claimed the expanded credit in 2006 (the most recent year for which data are available). In 2011, the credit is scheduled to revert to its pre-EGTRRA form, with a credit amount of \$500 that is refundable only to families with three or more children.

Under current law, the largest refund most taxpayers can receive is equal to 15 percent of their earned income above a threshold. (Normally, that threshold is adjusted for inflation, but it has been reduced temporarily by legislation several times during the past few years. The American Recovery and Reinvestment Act of 2009 [Public Law 111-5] reduced it to \$3,000 for 2009 and 2010.) Families with three or more children may be eligible for a larger refundable amount. The credit phases out for single filers whose adjusted gross income is more than \$75,000 and for joint filers whose income is above \$110,000. The President's 2010 budget proposes making the credit permanent in its 2010 form, at \$1,000 per child with a refundability threshold of \$3,000.

Starting in 2011, this option would either lower the age limit for eligible children from 17 to 13 or eliminate the child tax credit altogether. The first approach would increase income tax revenues by \$9.5 billion through 2014; the second would raise revenues by \$46.0 billion over that period.

Supporters of curtailing or eliminating the child tax credit argue that other features of the individual income tax-such as the standard deduction, personal exemptions, dependent care tax credit, and earned income tax credit—already provide significant tax preferences to families with children, particularly those whose income is near the poverty line. Moreover, the credit does not benefit many of the poorest families because they have no income tax liability; a household's income must meet a minimum threshold to be eligible for the refundable portion of the credit. Another argument for reducing the credit is that having children represents a family's decision about how to spend its income-a choice that could be considered analogous to other decisions about spending.

Opponents of cutting the child tax credit argue that the other preferences in the tax code do not fully compensate families for the extra costs of raising children. Raising children is an investment that benefits all of society when those children become productive adults. With more resources, parents can invest more in child-rearing and benefit society as a whole.

Reduce the Top Corporate Income Tax Rate by 5 Percentage Points										
						Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	-22.0	-37.6	-45.3	-45.0	-43.7	-193.6	-417.3			

### Source: Joint Committee on Taxation.

U.S. tax law identifies two kinds of corporations:

C corporations and S corporations. Taxable income from C corporations is subject to the corporate income tax, and that income can be taxed again at the individual tax level after it is distributed to shareholders or investors. Income from S corporations generally is treated as personal income: It is subject only to the individual income tax, and it is taxed at the personal income tax rates of the businesses' owners. Businesses also can be established as partnerships or sole proprietorships (their income is generally taxed at the individual income tax rates of their owners).

This option would reduce the corporate tax rate to 30 percent for taxable income above \$75,000 earned by C corporations, reducing revenues by \$22 billion in 2010 and by \$194 billion over five years.

Under current law, C corporations pay taxes according to a progressive schedule of four statutory rates. The first \$50,000 of corporate taxable income is taxed at the rate of 15 percent; income from \$50,000 to \$75,000 is taxed at 25 percent; income from \$75,000 to \$10 million generally is taxed at 34 percent; and income above that is generally taxed at a rate of 35 percent. Most corporate income is taxed at a marginal rate of 35 percent, although the average effective tax rate on corporate income is lower because of allowable deductions.

To compute taxable income, C corporations deduct from gross income business expenses (such as employee compensation, state and local taxes, depreciation, and interest expense) but not dividends paid. Corporate income earned through a foreign branch is subject to taxation, but the earnings of a foreign subsidiary are not usually taxed until the subsidiary distributes the income to the parent corporation as a dividend. Subject to some restrictions, U.S. taxpayers are allowed a credit against U.S. taxes for foreign taxes paid.

Proponents of this option argue that cutting the corporate tax rate would reduce some of the investment distortions the tax creates. They assert that the corporate income tax reduces economic efficiency by distorting choices that companies make, such as whether to organize a business as a C corporation or as a "pass-through" entity and whether to finance investment by issuing debt or by issuing equity. In addition, taxing corporate income distorts investments by discouraging investment in the corporate relative to the noncorporate sector. Proponents of this option argue that reducing the tax would increase investment overall and spur the growth of the economy and that it would reduce international investment distortions and make U.S. corporations more competitive.

Opponents of this option assert that corporate ownership is concentrated among the wealthy. They argue that a corporate tax reduction would create a windfall for those investors and compromise the progressive nature of the tax system. Opponents argue that the corporate income tax safeguards the individual income tax; when corporate tax rates are lower than individual income tax rates, individuals might use corporations to avoid paying taxes.

**RELATED OPTIONS: Revenue Options 29 and 30** 

RELATED CBO PUBLICATIONS: Statement of Peter R. Orszag, Congressional Budget Office, before the House Committee on Ways and Means, *The Taxation of Carried Interest*, September 6, 2007; *Corporate Income Tax Rates: International Comparisons*, November 2005; and *Taxing the Untaxed Business Sector*, Background Paper, July 2005

Set the Corporate Tax Rate at 35 Percent for All Corporations										
						Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	1.8	3.3	3.3	3.3	3.2	14.9	30.5			
Source: Joint Committee on Ta	xation.									

Current law provides for progressive taxation of the income of C corporations (those subject to the corporate income tax). The first \$50,000 of taxable income is taxed at a rate of 15 percent; the rate for \$50,000 to \$75,000 is 25 percent; from \$75,000 to \$10 million the rate is 34 percent; and income above \$10 million is generally taxed at a rate of 35 percent.

This option would set a single statutory rate of 35 percent for all corporate taxable income, increasing revenues by \$1.8 billion in 2010 and by \$14.9 billion through 2014.

There are additional taxes on some amounts of corporate income. Income between \$100,000 and \$335,000 is subject to a further tax of 5 percent, and an additional 3 percent tax is levied on income between \$15 million and \$18.3 million. Those taxes effectively phase out the benefit of the three lower tax rates for corporations with income above certain amounts. For example, a company with taxable income of at least \$18.3 million pays an average tax rate of 35 percent, despite paying the lower rates on the first \$10 million. This option would not alter the taxes that those businesses pay, nor would it affect businesses that operate as S corporations or as limited liability companies. (Owners of those enterprises pay taxes on their total business income but at the rates of the individual income tax.)

The progressive rate schedule for the corporate income tax has the benefit of lessening the "double taxation" of corporate profits for companies with small to medium profits. Double taxation occurs when the government

RELATED OPTIONS: Revenue Options 30 and 35

taxes the earnings of C corporations once at the corporate level and again at the individual level. All but a few thousand of the 500,000 to 1 million corporations that typically owe corporate income taxes each year benefit from the reduced rates. (Because the companies that benefit earn only about 10 percent to 15 percent of all corporate taxable income, however, the reduced rates have a limited effect on tax revenues.)

One argument for creating a flat corporate income tax is that many of the companies that benefit from the current rate structure are not small or medium-sized. Under current law, large corporations can reduce their taxable income for certain years by sheltering some of it or by controlling when they earn income and incur expenses. The current system also allows individuals in small corporations to shelter income by retaining earnings rather than paying them out as dividends. (That benefit does not apply to owners of personal-services corporations such as physicians, attorneys, and consultants—whose companies are already taxed at a flat rate of 35 percent.)

Disadvantages of this option are that it would reduce the amount the affected companies would invest and distort the way in which those businesses finance their remaining investments. Investment capital would be more costly for businesses affected by the higher tax rates, and instead of issuing as much stock, those companies would either increase their use of debt financing because the interest is tax-deductible or decrease the amounts they invest. Carrying more debt would increase some companies' risk of default.

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# Integrate Corporate and Individual Income Taxes Using the Dividend-Exclusion Method

						Total	
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	-4.1	-16.9	-39.3	-48.1	-54.8	-163.2	-505.6
Source: Joint Committee on Taxatio	n.						

The way corporate income is taxed depends on the type of corporation and the form of the income. Some corporate income is taxed twice: once as profit under the corporate income tax and again as dividends and capital gains on corporate stock under the individual income tax. Other corporate income—such as interest on corporate bonds and the profits of companies that are not subject to the corporate tax (so-called S corporations, which generally are small and have few shareholders)—is subject only to the individual income tax. Still other corporate earnings are subject to taxation primarily under the corporate income tax and effectively have little or no tax imposed under the individual income tax. (Taxes on capital gains on stock can be deferred until the gains are realized when the stock is sold.) Because investors face those different effective tax rates depending on the form in which a business is organized and the type of income distributed, the corporate and individual income taxes are said to be "nonintegrated."

That lack of integration reduces economic efficiency (the relationship between total resources used and the social benefits they generate) by distorting various choices that companies make, including the following:

- Whether to organize a business as a C corporation, which is subject to the corporate income tax, or as an S corporation or noncorporate entity (such as a partnership or proprietorship), which are not subject to the corporate tax;
- Whether to finance investment by borrowing funds or by issuing stock (unlike stock dividends, interest paid on debt is deducted from a corporation's income and thus reduces the tax bill); and
- Whether to pay dividends to shareholders or reinvest earnings in the company (reinvested earnings increase the value of a corporation's stock, the gain from which is taxed only when the stock is sold).

The current nonintegrated system also increases the overall taxation of income from capital, which distorts the choice that people make between saving and conuming. That lack of integration impairs economic efficiency at a cost that has been estimated to equal about 0.25 percent to 0.75 percent of the value of total household consumption.

Corporate and individual income taxes could be integrated in various ways. All corporate earnings could be subject to the individual income tax (as are the earnings of S corporations); stock dividends and capital gains could be excluded from individual taxation; companies could be allowed to deduct dividends from corporate taxable income; or all business income could be taxed at the corporate level only, with no tax imposed on that income at the individual level. Another approach—simply eliminating the corporate income tax without making other changes to the tax system—would continue to impose significant efficiency costs because stockholders would defer (or in some cases avoid altogether) paying taxes on corporate earnings that were not distributed as dividends.

This option would integrate the two income tax systems by changing the treatment of some dividends and capital gains. Specifically, individual taxpayers could exclude from their taxable income any dividends or capital gains that had already been taxed as corporate profits—provided those dividends or gains resulted from earnings received by the corporation after this option took effect. (The change is identical to a proposal that was included in the President's budget for 2004.) In addition, the statutory tax rates on those dividends and capital gains that had not been taxed at the corporate level would immediately return to the rates that prevailed before they were reduced by the Jobs and Growth Tax Relief Reconciliation Act of 2003, or JGTRRA. (The current lower rates are scheduled to expire at the end of 2010.) Together, the changes produced by this option would reduce revenues by \$163 billion between 2010 and 2014. Unlike the rates on dividends and capital gains they would replace, the changes in this option would be permanent. (The resulting reduction in revenues would be different if the current lower rates were assumed to be permanent.)

This option's principal advantage is that it would improve the integration of the corporate and individual income taxes. Under the current system, with its reduced tax rates on dividends and capital gains, some corporate profits are still subjected to additional taxation under the individual income tax. Those tax rates apply whether or not any profits distributed as dividends or realized as capital gains are taxed at the corporate level. Because of special provisions of tax law, not all corporate profits are subject to the corporate tax. Moreover, the reduced capital gains rates that were enacted in JGTRRA apply to gains on corporate stock and on other assets. The effect of that broad scope is to exacerbate other distortions in the tax code-a situation this option would ameliorate. Furthermore, because JGTRRA's rate reductions are scheduled to expire after 2010, much of the potential gain in efficiency that

integration could bring by reallocating capital might not be realized under current law.

This option's main disadvantages are its complexity and the associated administrative costs. To limit the amount of forgone revenue and to target the incentives of lower tax rates toward new investment, this option would trim the list of eligible dividends and gains to those that resulted from earnings only after the option was enacted. Thus, business owners would be required to maintain accounts and inform shareholders of the amounts of dividends and gains that shareholders could exclude from their income. The bookkeeping could prove burdensome for businesses and for people when they sell stocks, and it would be difficult for the Internal Revenue Service to verify. Moreover, although the lower rates enacted in JGTRRA did not represent complete integration of the individual and corporate income taxes, they substantially reduced the differences that give rise to the distortions associated with the two taxes' lack of integration. Hence, simply making those lower rates permanent would improve efficiency almost as much as full integration would, but with less complexity. (Revenue Option 3 examines the costs of that approach.)

RELATED OPTIONS: Revenue Options 3, 4, 29, and 35

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Repeal the "Lower of Cost or Market" Inventory Valuation Method										
						Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	0.8	1.5	1.6	1.6	1.7	7.2	9.5			
Source: Joint Committee on Ta	ixation.									

### A business that uses the first-in, first-out approach to identifying inventory receives a tax advantage under current law because it can use the "lower of cost or market" (LCM) method of inventory valuation. It can deduct from its taxable income unrealized year-end losses on items in its inventory that have declined in value. (The losses are "unrealized" because the items in the inventory have not actually been sold.) Companies can defer taxes on unrealized gains for items with increased value until the year the items are sold. Similarly, goods that cannot be sold at normal prices because they are damaged or flawed, for example, qualify for the "subnormal goods" method of inventory valuation. That approach allows the company to immediately deduct the loss in value, even if it sells the goods later at a profit.

This option would repeal the LCM and subnormal-goods methods of inventory valuation over a period of four years and require all businesses to set inventory value according to cost. (Under the cost method, companies generally must include in taxable income the gains and the losses from any changes in the value of their inventory when goods are sold.) Those changes would increase revenues by \$0.8 billion in 2010 and by a total of \$7.2 billion from 2010 to 2014. The option would not affect taxpayers who use the last-in, first-out, or LIFO, method for identifying inventory. The President's 2010 budget proposes a similar change.

Inventory valuation is an integral part of determining taxable profit, which (in accounting terms) is the difference between receipts and the cost of goods sold. Most businesses with inventories must use the accrual method of accounting, calculating the cost of the goods by adding the value of the inventory at the beginning of the year to the cost of goods purchased or produced during the year and then subtracting from that total the year-end value of the inventory. Companies may now use either LCM or the cost method to set the value of inventory; the subnormal-goods method may be used, if applicable, regardless of which valuation approach is chosen. The rationale for replacing LCM with cost valuation is to eliminate the tax advantages LCM provides. LCM allows a business to compare the market value of each item in its inventory with the item's cost and then set the lower of the two as the item's value. The inventory thus will have a lower total value under LCM than under the cost method if the market value of any item in the inventory is less than its cost. The reverse is not true, however, because under the LCM approach, inventory items that appreciate during the year are pegged at their original cost. Thus, for a business that experiences gains and losses from its inventory, LCM provides a tax advantage over the cost method because it treats gains and losses asymmetrically (the business can recognize losses without counting comparable gains). A company may claim a deduction for certain losses in the value of its inventory even if, overall, the inventory's value has risen, and LCM can thus increase the portion of costs that are tax-deductible in a given year and reduce the company's taxable profits.

Two other features of the LCM method may offer unwarranted tax advantages. First, once a company has reduced the value of its inventory, current law does not require it to record an increase if the market value later rises. Second, market values under LCM are based on the replacement cost, not the resale value, of inventory items. Thus, LCM allows a business to reduce the value of items in its inventory if the items' replacement cost has declined—even though it may still be able to sell the items at a profit.

Companies that incur losses in inventory value without offsetting gains would see a disadvantage in repealing the LCM method. For those businesses, the method provides a cushion during economic downturns or periods of uncertainty created by shifts in markets. A business whose inventory has declined in value has incurred an economic loss. If that loss is deferred (not accounted for) until the inventory is subsequently sold, the company could be viewed as paying too much in taxes in the year of the loss and too little in the year the good is sold.

## Tax Large Credit Unions in the Same Way as Other Thrift Institutions

						Total	
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	0.7	1.1	1.2	1.3	1.3	5.6	12.6
Source: Joint Committee on Tax	ation						

Credit unions are nonprofit financial institutions that provide such services as accepting deposits and making loans. Originally, credit unions were cooperatives whose members shared a common bond (in many cases, the same employer or the same occupation). Partly as a result of that distinction, federal income tax law treats credit unions more favorably than it does competing thrift institutions—such as savings and loan associations and mutual savings banks—by not taxing retained earnings (the portion of net income a credit union keeps instead of paying out in dividends).

This option would tax the retained earnings of large credit unions—those with more than \$10 million in assets—in the same way that the retained earnings of other thrift institutions are taxed. Credit unions with less than \$10 million in assets, however, would continue to be tax-exempt. The change in the tax treatment of large credit unions would increase revenues by \$0.7 billion in 2010 and by a total of \$5.6 billion over five years.

Originally, the retained earnings of credit unions, savings and loan associations, and mutual savings banks were exempt from taxation. In 1951, however, lawmakers eliminated the exemptions for savings and loans and mutual savings banks on the grounds that those institutions were similar to profit-seeking corporations. Since then, large credit unions have come to resemble other thrift institutions. Beginning in 1982, regulators allowed credit unions to extend their services (with some limits) to members of organizations other than those for which they were founded. In addition, most credit unions permit members and their families to participate even after a member has left the sponsoring organization.

In part because of that relaxation of restrictions, total membership in credit unions has soared from about 5 million in 1950 to more than 90 million today. Large

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credit unions, like taxable thrift institutions, now serve the general public and provide many of the services offered by savings and loans and mutual savings banks including mortgages and car loans, access to automatic tellers, credit cards, individual retirement accounts, and discount brokerage services. They also resemble thrift institutions in that they retain some of their earnings.

One argument in favor of taxing the retained earnings of large credit unions like the earnings of other large thrift institutions is to improve economic efficiency. Taxing similar entities in a similar manner promotes competition and encourages them to provide services at the lowest cost. With their current tax advantage, credit unions can use their retained earnings to expand and thus displace the services of other thrift institutions, even though the latter may provide those services more efficiently.

Many small credit unions are more like cooperatives than they are like their larger counterparts, so their retained earnings could be treated similarly to those of other cooperatives. Like those entities, most small credit unions have members with a single common bond or association, and in some cases, their organizations are rudimentary: Member volunteers manage and staff the credit unions, which offer fewer services than would be available from traditional thrift institutions.

Allowing small credit unions to keep their tax exemption for retained earnings would affect about 40 percent of credit unions and about 1.5 percent of total assets in the credit union industry. However, a problem with taxing the assets of large credit unions while allowing the assets of small ones to remain tax-exempt is that some credit unions might sacrifice efficiency to stay below the limit. Some also could split into smaller operations and others might limit the range of services they offer.

End the Expensing of Exploration and Development Costs for	<b>Extractive Industries</b>
	Total

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	7.5	10.8	9.6	7.4	4.3	39.6	44.9
Source: Joint Committee on Taxation							

Current tax law treats the extractive industries that produce oil, natural gas, and minerals more favorably than it does most other industries. One incentive designed to encourage exploration for and development of oil, gas, and hard minerals allows producers to "expense" some of their costs rather than capitalize them; companies are allowed to fully deduct the costs of exploration and development from taxable income as they are incurred rather than waiting to deduct those costs over time as the income they produce is generated.

Other industries, by contrast, must deduct costs more slowly, according to prescribed rates of depreciation or depletion. The Tax Reform Act of 1986 established uniform capitalization rules that require certain direct and indirect costs related to property either to be deducted when the property is sold or to be depreciated over several years. In either case, the businesses involved must postpone those costs' deduction from their taxable income. Intangible costs (such as maintaining a working-capital fund) that are related to drilling and development and the costs for mine development and exploration are exempt from those rules. The ability to expense such costs gives extractive industries a tax advantage that other industries do not have.

The costs companies can expense include those for excavating mines, drilling wells, and prospecting for hard minerals. The rules do not apply across the board to producers of oil and natural gas, however. Although current law allows independent oil and gas producers and noncorporate mineral producers to fully expense their costs, expensing is limited to 70 percent of costs for "integrated" oil and gas producers (companies with substantial retailing or refining activity) and for corporate mineral producers. Those companies must deduct the remaining 30 percent of their costs over 60 months. This option would replace the expensing of exploration and development costs for oil, gas, and minerals with standard capitalization, increasing revenues by \$7.5 billion in 2010 and by a total of \$39.6 billion from 2010 to 2014. (Those amounts reflect the assumption that businesses could still expense some of their costs, including those associated with unproductive wells and mines.)

The primary rationale for this option is that expensing distorts the allocation of society's resources. First, it encourages the use of resources for drilling and mining that might be employed more productively elsewhere in the economy. Second, it could influence the way resources are allocated within the extractive industries. A company could decide what to produce not on the basis of factors related to economic productivity but on the basis of the size of the advantage that expensing provides (for example, the difference between the immediate deduction and the deduction over time, which reflects the true useful life of the capital involved). Such decisions also could rest on whether the producer must pay the alternative minimum tax, under which expensing is limited. Third, expensing encourages producers to extract more resources in a shorter time. That, in the short run, could make the United States less dependent on imported oil but in the long run could deplete the nation's store of oil for extraction and cause greater reliance on foreign producers.

The rationale for expensing the costs of exploration and development has shifted over time. Advocates of the incentive originally argued that those costs should be expensed because they were ordinary operating expenses. Today, supporters of expensing also argue that the tax advantage is necessary to encourage producers to continue to explore and develop the strategic resources that are essential to the nation's energy security.

RELATED OPTIONS: 300-5, 300-7, and Revenue Option 59 RELATED CBO PUBLICATION: *Reforming the Federal Royalty Program for Oil and Gas*, November 2000

Tax the Income Earned by Public Electric Utilities										
						Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	0.4	0.6	0.6	0.6	0.6	2.8	6.2			
Source: Joint Committee on Ta	axation.									

Some of the nation's electricity is provided by privately owned companies; some comes from public utilities that are owned by local governments. Unlike the income earned by investor-owned utilities, the income that governments earn from any public utility, including those that generate electricity, is exempt from federal income taxes.

This option would tax the income of public facilities that generate, transmit, or distribute electricity. The change would increase federal revenues by \$0.4 billion in 2010 and by a total of \$2.8 billion through 2014.

In the past, local monopolies had provided electricity in part to take advantage of economies of scale. Some of those suppliers were public utilities that provided power in places where sparser populations made the per-customer cost too great to be practical for private producers to generate and deliver electricity. Public utilities also developed in areas where residents—worried that a private provider might exploit its position as a monopoly—wanted to ensure that electricity would be available to all households at a reasonable cost. Now, however, states across the country are in varying stages of deregulating electricity generation, partly because advancing technology has lessened the importance of economies of scale and partly because electrical service is almost universal in the United States, even in remote areas.

The major argument in favor of taxing the income earned by public electric utilities is that the recent changes in the electricity market cast doubt on whether society benefits from the public sector's involvement in providing electricity. (The private sector already supplies about threequarters of the nation's electric power.) Advocates of this option argue that the competition that is resulting from the industry's restructuring will protect consumers from monopolistic pricing by private utilities, although California's experience in 2000 and 2001 suggests that some degree of government oversight of the market could still be needed. Ending the favorable tax treatment also could boost competition, encourage consumption of an economically efficient amount of publicly provided electricity, and preserve the corporate tax base.

An argument against this option is that taxing the income of public utilities could cause providers to pass the cost along to customers in the form of higher rates and thus bring hardship to lower-income customers. Taxing the income of public electric companies also might cause adversity in communities that rely on public utilities if the companies that were unable to operate competitively faced the prospect of closing inefficient facilities. If those facilities were financed with debt that had not yet been retired, state and local taxpayers could be left with significant costs. Other complications associated with this option involve the numerous legal and practical issues to be resolved if the federal government taxed income earned from what might be termed the business-like enterprises of state and local governments.

RELATED OPTIONS: 270-9, 270-10, 270-11, and Revenue Option 38

RELATED CBO PUBLICATIONS: Prospects for Distributed Electricity Generation, September 2003; and Causes and Lessons of the California Electricity Crisis, September 2001

## **Disallow Tax-Free Conversions of Large C Corporations to S Corporations**

						Total		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues	*	*	*	*	*	*	0.5	
Source: Joint Committee on Tax	ation.							
Note: * = between zero and \$50	) million.							

The tax code recognizes four main types of business organization: C corporations, S corporations, partnerships, and sole proprietorships. The organization a business chooses has tax implications for the business and its owners and for the owners' legal liability. Companies with stock that trades publicly are usually C corporations, although many small, privately owned businesses are structured that way. The government taxes a C corporation's profits two ways: first, as net income under the corporate income tax and again, to the extent that the firm distributes its after-tax income as dividends or shareholders realize capital gains, under the individual income tax. C corporations' owners are not legally liable for the actions of the corporation.

By contrast, the tax code allows income and expenses of businesses such as partnerships, sole proprietorships, and S corporations to pass through the business to the shareholders (in the case of an S corporation) or to the partners or proprietors (in the case of partnerships and sole proprietorships). The income is generally free from tax on the business but is taxed under the individual income tax, even if the income is reinvested in the business.

S corporations differ from the other two kinds of flowthrough firms in part by legal liability. S corporations' owners-unlike sole proprietors or partners in limited or general partnerships-have limited liability. But S corporations face other restrictions: They may have no more than 100 owners, for example, and C corporations cannot be shareholders. Until 1988, the S corporation was the only type of business that offered owners both limited liability and a form of tax treatment that placed business income and losses under the individual income tax. Then, the Internal Revenue Service ruled that limited liability companies, or LLCs, which are defined under state law, could (with some restrictions) be treated as partnerships for federal tax purposes. Over time, the distinction between S corporations and some partnerships has blurred.

A C corporation can avoid the corporate income tax by becoming an S corporation or a partnership. Conversion to an S corporation is more attractive than conversion to a partnership because it can occur tax-free, in many cases. Conversion to a partnership, by contrast, is taxable. The business must "recognize," or include in its taxable income, any built-in gain on its assets, and shareholders must pay taxes on such gain in their corporate stock. The Internal Revenue Code states that if a C corporation converts to an S corporation, the appreciation of the company's assets while a C corporation is not subject to corporate income taxes unless the assets are sold within 10 years of the conversion. Thus, current law allows a C corporation to avoid two-tiered taxation by making the tax-free conversion to an S corporation.

This option would disallow tax-free conversions for C corporations whose total assets exceed \$5 million at the time of the conversion. That is, when making the conversion, the company and its shareholders would immediately recognize the gain on their appreciated assets. Taxing such conversions would increase income tax revenues by \$50 million or less over five years and by \$0.5 billion through 2019.

A major advantage of this option is that it would treat economically similar conversions—from a two-tiered to a single-tiered tax system—in the same way. Equalizing that tax treatment would, in turn, allow society's resources to be allocated more efficiently by diminishing the importance of tax considerations in decisionmaking about what legal form a business should take.

An argument against changing the current differential tax treatment is that, in some people's eyes, S corporations resemble C corporations more closely than they do partnerships, so current law merely allows a C corporation (if it meets the legal requirements) to choose a different corporate form—that of an S corporation—and change its filing status without incurring a tax liability.

Repeal the Low-Income Housing Credit										
		Total								
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	0.1	0.5	1.0	1.8	2.5	5.9	29.2			
Source: Joint Committee on Ta	xation.									

The federal government uses the low-income housing credit (LIHC) to encourage construction, substantial rehabilitation, or purchase of low-income rental housing. To qualify for the credit, a corporation or individual must agree to set aside either 20 percent of a project's rental units for families whose income is below 50 percent of the area's median income or 40 percent of the units for families whose income is below 60 percent of the median. Landlords also agree to limit the rent they charge. The set-aside requirements and the rent limits apply for at least 30 years. The credit can be taken for 10 years and can be worth up to 70 percent of a project's construction or rehabilitation costs or 30 percent of its purchase price. Most often, the LIHC applies to new construction. The Housing and Economic Recovery Act of 2008 (Public Law 110-289) set a temporary floor on the annual credit equal to 9 percent of the capital costs of constructing a building placed in service before December 31, 2013. That floor could lead to issuances of credits that exceed 70 percent of construction costs.

Unlike most tax provisions, the LIHC is not available automatically, even if a project's owner agrees to all conditions. Limited by statute, state housing authorities issue fixed numbers of credits based on the state's population. P.L. 110-289 raised the statutory limits for 2008 and 2009, but allocations will revert to their earlier limits in 2010.

The American Recovery and Reinvestment Act of 2009 (P.L. 111-5) allowed state housing authorities to reduce their 2009 statutory limits and instead award grants to eligible projects. That act also appropriated funds to be distributed by state housing authorities to owners of projects awarded credits in fiscal years 2007, 2008, and 2009.

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This option would repeal the LIHC for new projects, increasing revenues by \$0.1 billion in 2010 and by \$5.9 billion through 2014. The credit would continue for extant projects until the 10 years of eligibility expired.

An argument in favor of this option is that, in most places, federal housing vouchers could assist the same number of people at a lower cost. (The vouchers' cost is not shown in the table.) The federal government's voucher program helps eligible people pay some or all of the rent for housing they choose, provided the dwelling meets minimum standards for habitability. In most cases, vouchers are more likely than tax credits to help low-income people become renters because the existing housing stock generally provides adequate housing more affordably than new or substantially rehabilitated buildings can. Higher administrative costs also can make LIHC-subsidized housing more expensive to produce and rent.

Another rationale for repealing the credit is that it does not by itself always fulfill its intended purpose. In general, unless renters or owners are given additional subsidies, the lowest-income households cannot afford the units built or rehabilitated under the LIHC. Instead, the credit tends to benefit lower-middle-income people who typically have too much income to qualify for vouchers or public housing.

Proponents of retaining the credit assert that the LIHC is needed because investment by owners in new or rehabilitated rental properties can help revitalize neighborhoods that have little existing housing that meets minimum standards for habitability at affordable rents. A similar amount of spending on housing vouchers is not likely to produce a noticeable change in a given neighborhood because the funds are not spent in a single project but are distributed across many neighborhoods.

Extend the Period for Recovering the Cost of Equipment Purchases										
						Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	3.1	10.5	18.2	26.4	34.1	92.3	267.5			
Source: Joint Committee on Ta	ixation.									

When they calculate taxable income, companies can deduct expenses, including depreciation (the drop in the value of a productive asset over time), incurred in producing goods or services for sale. For taxable income to be calculated accurately, however, depreciation should reflect an asset's actual economic decline-that is, the calculation should be for economic depreciation, which accounts for inflation over the asset's lifetime. Because rates of depreciation are set by the tax code and depreciation deductions are not indexed for inflation, the real (inflation-adjusted) value of the depreciation allowed by tax law depends on the rate of inflation.

Most rates of depreciation in the tax code today were set in the Tax Reform Act of 1986 and would approximate economic depreciation at a 5 percent rate of inflation. The Congressional Budget Office estimates, however, that inflation over the next decade will average about 2 percent annually. That difference of about 3 percentage points means that tax depreciation is more valuable to businesses than economic depreciation is because tax depreciation results in the understatement of taxable income.

Equipment and structures are two of the main types of tangible capital for which businesses take depreciation deductions. Deductions for equipment generally contribute more to the understatement of taxable income than do deductions for structures; equipment has a shorter service life (the time over which depreciation deductions can be taken), so changes in inflation have a greater effect on deductions for equipment. Since 1986, policymakers have extended the useful lifetime of some kinds of structures for calculating depreciation.

This option would extend the lifetime of equipment for purposes of tax depreciation. Specifically, where a lifetime of 3, 5, 7, 10, 15, or 20 years was specified by the tax code, this option would set the lifetime to 4, 8, 11, 20,

30, or 39 years, respectively. Those changes would increase revenues by \$3.1 billion in 2010 and by a total of \$92.3 billion over five years.

One advantage of this option is that it would equalize effective tax rates on different types of investment. Under the assumptions of 1.9 percent inflation and a 7 percent real discount rate for businesses (to adjust for the change in the worth of a dollar over time), the average effective tax rates on corporate equity would be about 31.4 percent for equipment and 31.6 percent for structures. That near parity would mitigate the incentive that exists in the tax code for companies to invest more in equipment and less in structures than they might if investment decisions were based on economic returns. Such an incentive distorts choices between investing in equipment and investing in structures, thus reducing economic efficiency.

Those average tax rates would adjust on the basis of inflation, however. If the rate of inflation was a percentage point lower, the average effective tax rate would be 29.5 percent for equipment and about 30.6 percent for structures. Conversely, if inflation was a percentage point higher, the rates on equipment and structures would be 33.1 percent and 32.5 percent, respectively. Therefore, if inflation differed from CBO's expectations, new distortions would emerge over the long run between investment in equipment and structures.

Some opponents of this option argue that low tax rates on capital are important for maintaining a strong economy. Others favor equalizing the current tax treatment by easing taxation on all forms of capital rather than by raising the effective tax rate on a type of capital that is now favored. In addition, under this option, there would continue to be substantial variation in the effective tax rates for different types of equipment.

RELATED CBO PUBLICATIONS: Computing Effective Tax Rates on Capital Income, Background Paper, December 2006; and Taxing Capital Income: Effective Rates and Approaches to Reform, October 2005

						Total		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues								
Eliminate the tax exemption for new bonds	0	0.1	0.6	1.3	2.0	4.0	23.0	
Eliminate the indexation of the volume cap	0	*	*	*	*	0.1	0.2	
ource: Joint Committee on Taxation. lote: * = between zero and \$50 millio	n.							

Limit or Eliminate Tax-Exempt Private-Activity Bonds

### **Option 38**

Federal tax law permits state and local governments to issue bonds whose interest income is exempt from federal taxation. As a result, those bonds bear lower rates of interest than they would if the interest income were taxable. (The bondholder is compensated for the lower interest rate by not having to pay federal tax on the interest income.) For the most part, proceeds from those taxexempt bonds finance public projects, such as schools, highways, and water and sewer systems. But state and local governments also issue tax-exempt securitiesknown as private-activity bonds-whose proceeds are used by nongovernmental entities to finance various quasi-public facilities and private-sector projects: mortgages for rental housing and single-family homes; infrastructure facilities such as airports, docks, wharves, mass transit, and solid-waste disposal plants; small manufacturing plants and agricultural land and property for firsttime farmers; student loans; and facilities for nonprofit institutions, such as hospitals and universities. The American Recovery and Reinvestment Act of 2009 (Public Law 111-5) established a new type of qualified tax-exempt private-activity bond for 2009 and 2010 that is to be used to finance projects in "recovery zones," areas with significant poverty, unemployment, or home foreclosures. The act also made the interest on all tax-exempt privateactivity bonds issued in 2009 and 2010 deductible under the alternative minimum tax.

The Tax Reform Act of 1986 limits the annual volume of new bonds that state and local governments can issue for eligible facilities, small manufacturing plants, student loans, and housing and redevelopment projects. Some private-activity bonds are exempt from the cap, including those for airports, ports, and solid-waste disposal facilities that meet requirements for government ownership, and

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certain bonds for nonprofit organizations (primarily hospitals and educational institutions). Initially, the cap was not indexed for inflation, so the volume of privateactivity bonds issued each year would decline over time and eventually disappear. However, the volume cap has since been raised periodically, and beginning in 2002 it was indexed for inflation. (At that time, the annual volume of new bonds allowed was \$225 million per state or \$75 per state resident, whichever was greater.)

This option would, beginning in 2011, curtail the issuance of private-activity bonds either by eliminating the tax exemption for all new issues or by allowing tax exemption but no longer indexing the volume cap for inflation. The first approach would have an immediate effect on the volume of such bonds and would increase revenues by a total of \$4 billion over the period from 2010 to 2014. The second approach would work more slowly, boosting revenues by only \$0.1 billion over those five years. (Lawmakers also could limit the outstanding stock of private-activity bonds for some uses, such as nonprofit organizations' facilities. That change is discussed in Revenue Option 39.)

One rationale for this option is that limiting or eliminating the tax exemption for new private-activity bonds could improve economic efficiency. Investments that can be financed at below-market interest rates require a lower cash return and thus may contribute less to national income than do investments that are not preferentially taxed. Altering those projects' financing by removing the tax exemption or curbing the volume cap would redirect savings to investments that earn a higher cash return and therefore may contribute more to national income and welfare.

### CHAPTER THREE

A disadvantage of this option is that some of the projects that cannot earn the market rate of return and therefore do not get built may have sufficient public benefits beyond their cash return to compensate for the interest rate subsidy. (If the federal government wished to help such projects, however, it could do so more efficiently through a direct subsidy. Unlike tax-exempt financing, such a subsidy would not reduce federal revenues by more than the drop in borrowers' interest costs. In addition, access to a direct subsidy would not be open-ended, and the subsidy amount could receive regular scrutiny from policymakers in the annual budget process.)

### **RELATED OPTIONS: Revenue Options 25 and 39**

RELATED CBO PUBLICATIONS: *Nonprofit Hospitals and Tax Arbitrage*, Letter to the Honorable William M. Thomas, December 6, 2006; *Nonprofit Hospitals and the Provision of Community Benefits*, December 2006; Statement of Donald B. Marron, Congressional Budget Office, before the Subcommittee on Select Revenue Measures, House Committee on Ways and Means, *Economic Issues in the Use of Tax-Preferred Bond Financing*, March 16, 2006; and *Tax-Credit Bonds and the Federal Cost of Financing Public Expenditures*, July 2004

«CBO»

Cap Nonprofit Organizations' Outstanding Stock of Tax-Exempt Bonds										
						Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	0	*	*	*	0.1	0.1	2.1			
Source: Joint Committee on Ta										

Note: \* = between zero and \$50 million.

Because current law exempts from federal taxation the interest income that investors earn on bonds issued by state and local governments, those bonds can pay belowmarket interest rates and still attract investors. In general, the proceeds that state and local governments receive from the bonds are used to finance schools, highways, and other public infrastructure projects. But states and localities also issue tax-exempt "private-activity" bonds to finance a wide range of quasi-public or private-sector projects, including facilities for hospitals, universities, and other nonprofit institutions.

The Tax Reform Act of 1986 limited the annual volume of new tax-exempt bonds that could be issued for many, although not all, private activities. Nonprofit institutions were not included in that annual cap, but a \$150 million ceiling was imposed on each institution's outstanding stock of tax-exempt bonds (excluding those of hospitals). That \$150 million ceiling was eliminated in 1997.

This option would reestablish the \$150 million cap on the outstanding stock of tax-exempt bonds that a nonprofit organization—including a hospital—could use for financing. To be consistent with the American Recovery and Reinvestment Act of 2009 (Public Law 111-5), which eliminated some limitations on other types of taxexempt private-activity bonds to encourage investment in public infrastructure in 2009 and 2010, the option would reestablish the cap in 2011. That cap would increase federal tax revenues by a total of \$2.1 billion through 2019. (A related approach, ending or reducing the tax exemption for new issues of private-activity bonds, is discussed in Revenue Option 38.)

One advantage of this option is that it would curtail what might be characterized as arbitrage profits that such organizations can earn indirectly under the current system. Many nonprofit universities, hospitals, and other institutions use tax-exempt debt to pay for buildings and equipment that they could have financed by selling their own investment assets. Their decision to fund new operating assets with tax-exempt bonds is influenced by their ability to earn an untaxed return from their investment assets that is much higher than the interest cost they must pay on the bonds-in other words, arbitrage profits. Imposing a ceiling on such organizations' outstanding stock of tax-exempt bonds would curtail that tax arbitrage. Investment might be redirected to more valuable uses because projects that would otherwise be financed with taxexempt debt would be forced to compete for funding at the higher interest rates that prevail in private markets.

A drawback of this option is that some of the nonprofit activities that would face higher financing costs could be activities that provide enough public benefits to justify the tax subsidy.

**RELATED OPTIONS: Revenue Options 25 and 38** 

RELATED CBO PUBLICATIONS: Nonprofit Hospitals and Tax Arbitrage, Letter to the Honorable William M. Thomas, December 6, 2006; Nonprofit Hospitals and the Provision of Community Benefits, December 2006; Statement of Donald B. Marron, Congressional Budget Office, before the Subcommittee on Select Revenue Measures, House Committee on Ways and Means, Economic Issues in the Use of Tax-Preferred Bond Financing, March 16, 2006; and Tax-Credit Bonds and the Federal Cost of Financing Public Expenditures, July 2004

Repeal the Deduction for Domestic Production Activities										
						Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	4.2	11.2	12.4	13.3	14.1	55.2	136.2			
Source: Joint Committee on Ta	xation.									

### The American Jobs Creation Act of 2004 allows businesses to deduct from their taxable income a percentage of what they earn from qualified domestic production activities. The deduction was set at 3 percent for taxable years beginning in calendar years 2005 and 2006; it rose to 6 percent for taxable years beginning in 2007 through 2009, and it will rise to 9 percent thereafter. The Emergency Economic Stabilization Act of 2008 (Public Law 110-343) reduced the deduction rate for oil-related qualified production activities to 6 percent for taxable years after 2009. Various activities qualify for the deduction:

- Lease, rental, sale, exchange, or other disposal of tangible personal property, computer software, or sound recordings, if they are manufactured, produced, grown, or extracted in whole or significant part in the United States;
- Production of films (other than those that are sexually explicit);
- Production of electricity, natural gas, or potable water;
- Construction or renovation; and
- Performance of engineering or architectural services.

The list of qualified activities specifically excludes the sale of food or beverages prepared at retail establishments; the transmission or distribution of electricity, natural gas, or potable water; and many activities that would otherwise qualify except that the proceeds come from sales to a related business.

The deduction for domestic production activities was created in part to replace the tax code's extraterritorial income exclusion-which, according to the World Trade Organization, violated its agreements by subsidizing exports. The deduction was intended to reduce the taxes on income from domestic production without violating the organization's rules.

This option would repeal the deduction for domestic production activities. Doing so would increase revenues by \$4.2 billion in 2010 and by a total of \$55.2 billion between 2010 and 2014.

One rationale for eliminating the deduction is that it creates economic distortions. Although it is targeted toward investments in domestic production activities, it does not apply to all domestic production. Whether a business activity qualifies for the deduction is unrelated to the economic merits of the activity. Thus, the deduction gives businesses an incentive to invest in a particular set of domestic production activities and to forgo other, perhaps more economically beneficial, investments in domestic production activities that do not qualify.

In addition, to comply with the law, businesses must satisfy a complex and evolving set of statutory and regulatory rules for allocating gross receipts and business expenses to the qualified activities. The complexity of those rules and the costly planning required for companies that want to take full advantage of the deduction are likely to cause contentiousness between businesses and the Internal Revenue Service and lead to even more rules to govern the process.

An argument against this option is that simply repealing the deduction for domestic production activities would increase the cost of domestic business investment. Alternatively, the deduction could be replaced with a revenueneutral cut in the top corporate tax rate (a cut that would reduce revenues by the same amount that eliminating the deduction would increase them). That alternative would end the current distortions between activities that qualify for the deduction and those that do not. It also would reduce biases in the corporate tax that favor noncorporate Rev investments over investments in the corporate sector and foreign over domestic business activities.

Permanently Extend the Research and Experimentation Tax Credit										
						Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	-2.3	-4.0	-4.7	-5.5	-6.3	-22.8	-67.9			
Source: Joint Committee on Ta	axation.									

### Current law allows businesses to take a nonrefundable research and experimentation (R&E) tax credit equal to 20 percent of their qualified research expenses above a base amount, generally determined by multiplying a company's average annual gross receipts in the previous four years by its ratio of research expenses to gross receipts from 1984 to 1988. Companies established after 1988 are assigned a fixed ratio (research expenses to gross receipts) of 3 percent. As an alternative, a business can apply a much lower credit rate (ranging from 2.65 percent to 3.75 percent) to qualified research expenses in excess of a lower base amount (ranging from 1 percent to 2 percent of average gross receipts).

The R&E tax credit was first enacted as a temporary provision in the Economic Recovery Tax Act of 1981. It has been extended, with modifications, 13 times since then. Each extension has been fully retroactive to the previous date of expiration (except for one year between June 30, 1995, and July 1, 1996). The credit was most recently extended through the end of 2009.

This option would make the research and experimentation tax credit permanent. That change would reduce revenues by \$2.3 billion in 2010 and by a total of \$22.8 billion over five years. The President's budget request for 2010 also includes a provision to make the credit permanent.

Supporters of the R&E tax credit assert that it produces a net benefit for society by making it less expensive for companies to engage in research that creates general knowledge or social benefits beyond what accrues to the businesses themselves. In that view, encouraging such research can make the economy as a whole more productive than it would be otherwise.

According to supporters, those benefits could multiply if the credit did not expire every few years. With a temporary tax credit there is uncertainty about whether and when the credit will be extended and with what modifications. That uncertainty is not likely to matter much for companies engaged in qualified research projects that take only a short time to complete. But making the R&E tax credit permanent might encourage long-term projects by decreasing uncertainty about the costs of undertaking those projects. Because a permanent extension could shift the incentive toward long-term projects, it could encourage research for which the effect of the credit is most likely to be a net social gain.

An argument against extending the credit is that it encourages excess private research in projects with no additional social benefits. The credit applies to all additional research projects an enterprise undertakes, and many have little or no benefit beyond that captured by the business itself. Yet when the business invests more in such projects than is justified by their economic return, it is wasting resources that could have been invested more beneficially elsewhere. Whether the R&E tax credit produces a net benefit to the economy depends on the extent to which it encourages research that imparts general knowledge or other social benefits. The evidence on that question is inconclusive.

RELATED CBO PUBLICATION: R&D and Productivity Growth, Background Paper, June 2005

						Total		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues	0.4	0.9	1.1	1.3	1.4	5.1	13.5	
Source: Joint Committee on Taxation.								

## Tax the Federal Home Loan Banks Under the Corporate Income Tax

The Federal Home Loan Bank (FHLB) system is a government-sponsored enterprise (GSE) that was created in 1932 to provide low-cost loans (called advances) to thrift institutions to bolster their lending for home mortgages. The system consists of 12 Federal Home Loan Banks that are cooperatively owned by their members, more than 8,000 financial institutions. The FHLBs raise money in the capital markets through borrowing to fund the advances made to members. Because investors perceive an implied guarantee of the system's debt by the federal government, the banks can borrow at rates below those available to private entities.

Unlike other corporations or the other GSEs that finance home mortgages, the FHLBs pay no federal corporate income taxes. (Although both Fannie Mae and Freddie Mac are now under federal conservatorship and are not currently profitable, they remain subject to federal income tax provisions.) The federal government requires the FHLBs to make other payments, however. They must devote 10 percent of the previous year's net income to affordable-housing programs. In calendar year 2008, the FHLB system's payments for affordable housing totaled \$188 million. Since 1990, the programs have subsidized rent or purchases of more than 600,000 housing units for low- and moderate-income borrowers. The FHLBs also are required to transfer 20 percent of their net income to the Resolution Funding Corporation (REFCORP), a federal corporation created to borrow money to help finance the Federal Savings and Loan Insurance Corporation's obligations for insured deposits of insolvent thrifts. The banks' assessments for REFCORP exceeded \$400 million in calendar year 2008. The FHLBs are projected to make their last contributions to REFCORP for its debt service in 2011. (Their total contributions to REFCORP are

capped by law.) Both types of required payments are included as revenues in the federal budget.

This option would impose federal corporate income taxes on the FHLBs, and doing so would generate revenues of \$5.1 billion over five years. That estimate assumes that the banks' payments for affordable housing and REFCORP would be deductible expenses for the purpose of calculating federal income taxes. (Revenues would be significantly lower if tax credits were granted for REFCORP payments.)

An advantage of this option is that it would eliminate a special privilege—tax-free status—that is not provided to other similar entities (including Fannie Mae and Freddie Mac) and that does not wholly benefit mortgage borrowers. Studies by the Congressional Budget Office and others have concluded that the FHLB system's status as a GSE confers substantial implicit federal subsidies beyond the tax benefits, which are not fully passed on to mortgage borrowers.

A disadvantage of the option is that it might cause member banks to pay somewhat more for their advances, which could result in higher costs to borrowers. Moreover, taxing the FHLBs while also requiring payments to affordable-housing programs and REFCORP could create a greater burden than is imposed on their competitors. Raising taxes on the banks during a period of financial crisis could prove counterproductive. Although the system has remained profitable with net income of \$1.2 billion in 2008, losses in the fourth quarter exceeded \$700 million. The FHLBs are eligible for federal assistance under the Housing and Economic Recovery Act of 2008, and some individual banks might need injections of federal capital to cover losses on their holdings of private-label mortgage-backed securities.

**RELATED OPTION: Revenue Option 32** 

RELATED CBO PUBLICATIONS: *Updated Estimates of the Subsidies to the Housing GSEs,* Letter to the Honorable Richard C. Shelby, April 8, 2004; *Federal Subsidies and the Housing GSEs,* May 2001; and *The Federal Home Loan Banks in the Housing Finance System,* July 1993

Tax Qualified Sponsorship Payments to Postsecondary Sports Programs									
						Total			
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Revenues	7.2	18.3	19.2	20.1	21.1	85.9	207.6		
Source: Joint Committee on Taxation.									

### Certain corporate payments to colleges, universities, or other nonprofit organizations in exchange for naming rights for sporting events or facilities are deemed "qualified sponsorship payments." Such payments are considered nontaxable income to the institutions that receive the revenue. Income from activities that are not substantially related to the tax-exempt purpose of an organization—for example, the sale of advertising—is usually taxed as unrelated business income, even if that income supports the institution's tax-exempt purpose. The National Collegiate Athletic Association has estimated that corporate sponsorships, including qualified sponsorship payments, generated \$275 million in revenues for its member athletic departments in 2004 and 2005.

This option would classify as advertising revenue any money given by a corporation to a college or university in exchange for naming rights to postsecondary athletic events and facilities, thus making those institutions liable for taxes on that revenue as unrelated business income. The option would raise \$7 million in revenues in 2010 and \$86 million over the period from 2010 to 2014.

An advantage of this option is that it would treat similar sponsorship payments the same way. Payments for naming rights that are contingent on such conditions as attendance, broadcast ratings, or limits on competing products are not considered qualified sponsorship payments and thus, under current law, may be considered taxable income. Payments made in exchange for advertising that includes other types of information about a sponsor in addition to its name, including qualitative assessments of a sponsor's products, pricing information, or endorsements, are taxable under the unrelated business income tax. In contrast, qualified sponsorship payments, which provide similar advertising value to the sponsor, are not currently taxable. This option also would decrease the ability of nonprofits to compete tax-free with for-profit organizations that also receive advertising revenue. Corporations that purchase naming rights to college football bowl games, for example, effectively pay less for advertising than they would to purchase similar services from a forprofit organization, such as a professional football team whose income from the advertising would be taxable at the corporate rate. If that is the case, a considerable portion of the subsidy the tax code provides to amateur athletics could be passed on to purchasers of advertising.

A disadvantage of this option is that it would decrease the federal subsidy for postsecondary athletic programs, which traditionally have been considered part of the taxexempt educational purpose of their institutions. The option also could lead to cuts in institutions' programs that are financed by revenues obtained from corporate sponsors. Finally, although this option would eliminate the disparity in tax treatment of different types of sponsorship payments, it would not eliminate the difference in the treatment of those payments and other conceptually similar types of revenue, such as royalty income, that is received by colleges and universities.

RELATED CBO PUBLICATION: Tax Preferences for Collegiate Sports, May 2009

Expand the Medicare Payroll Tax to Include All State and Local Government Employees											
						Total					
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Revenues	0.5	0.6	0.4	0.3	0.2	2.0	2.4				
Source: Joint Committee on Ta	axation.										

### Unlike nearly all private-sector workers and federal employees, some workers employed by state or local governments do not pay the Medicare payroll tax. That tax is currently 2.9 percent of earnings, half of which is deducted from employees' paychecks and half of which is paid by employers.

State and local governments were not included in the original Social Security Act. In 1951, the option to enroll was extended to them, but not all agreed to participate. Each state has an agreement with the Social Security Administration about which categories of state and local employees are covered. The Consolidated Omnibus Budget Reconciliation Act of 1985 required employees who began working for a state or local government after March 31, 1986, to pay the Medicare tax, but it did not make the tax mandatory for workers hired before that date. Under the Omnibus Budget Reconciliation Act of 1990, the tax's reach was broadened to include all state and local government workers who were not covered by a retirement plan through a current employer. Currently, about 2 percent of state and local workers do not pay the tax through their employers.

This option would impose the Medicare tax on all state and local government employees who do not now pay it, increasing revenues by \$0.5 billion in 2010 and by a total of \$2.4 billion over the 2010–2019 period. The annual gain in revenues from that change would decline over time as employees who were hired before April 1986 gradually retire or otherwise leave the payrolls of state and local governments.

Paying the Medicare payroll tax for 10 years generally qualifies workers (and their spouses) to receive Medicare benefits when they reach age 65 or become disabled. Thus, extending the tax to more employees would eventually increase the number of Medicare beneficiaries. That addition would have little impact on Medicare spending, however. Most of those workers will receive Medicare benefits under current law because they have held other, covered jobs in the past or because they are covered through a spouse's employment. (The estimates shown here do not reflect any additional outlays.)

One rationale for requiring all state and local government employees to pay the Medicare payroll tax concerns fairness. Currently, state and local governments provide retiree health insurance for their employees who are not covered by Medicare, and those governments, their employees, and their retirees in some combination pay for that coverage. However, they are not paying for the coverage that most of the same workers will get through Medicare. Extending the Medicare payroll tax to all state and local employees would remove that inequity.

Fairness is also a rationale for not extending the Medicare tax to those employees. For decades, long-term employees of state and local governments have made their work and spending plans under the assumption that the agreements with the Social Security Administration would remain in effect. When the 1985 act extended Medicare to all newly hired workers, federal lawmakers elected to abide by those agreements for existing employees. The employees and their state and local governments would find it unfair—and a financial hardship—for the federal government to renounce those agreements now.

Imposing the Medicare tax would be particularly unfair to employees who will not qualify for Medicare before they had planned to retire. They would pay the tax and get no benefit. Even if such workers delayed retirement long enough to earn 10 years of coverage, they would still have an extra burden in terms of lost leisure.

## Increase the Maximum Taxable Earnings for the Social Security Payroll Tax

						Total	
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
Tax 92 percent of earnings	19.1	63.0	65.4	67.6	66.5	281.5	688.5
Tax 91 percent of earnings	18.3	56.1	58.3	59.7	58.4	250.8	588.5
Tax 90 percent of earnings	16.8	48.6	50.4	51.2	49.6	216.7	503.4

Source: Joint Committee on Taxation.

Notes: All revenues are off-budget.

The projected revenue effects show small growth from 2011 through 2013 and a decline in 2014 because the maximum earnings subject to tax are expected to remain unchanged from 2010 through 2012 under current law.

Social Security, which consists of Old-Age, Survivors, and Disability Insurance (OASDI), is financed by payroll taxes on employees, employers, and self-employed people. Earnings up to a maximum of \$106,800 in 2009 are subject to the tax; the maximum increases each year by the growth rate of average wages in the economy. One exception to this rule occurs when the inflation rate used to index the maximum earnings subject to the tax (the consumer price index for urban wage earners and clerical workers, or CPI-W) declines: The maximum amount of earnings subject to the OASDI tax is unchanged until the CPI-W exceeds the highest amount it reached before the decline in inflation. In the third quarter of 2008, high energy prices pushed the CPI-W to its highest level in history. When energy prices dropped, the CPI-W also fell. The Congressional Budget Office does not expect the CPI-W to exceed the historical high until the third quarter of 2012. Thus, CBO projects that the maximum earnings subject to OASDI tax will be frozen until 2013.

When Social Security began in 1937, about 92 percent of all earnings from jobs covered by the program were below the maximum taxable amount. Over time, that percentage fell as the maximum was raised by specific statutory increases. The 1977 amendments to the Social Security Act boosted the amount of covered taxable earnings to 90 percent by 1982; that law also indexed the taxable maximum to match annual growth in average wages. Despite that, the fraction of taxable earnings has slipped in the past decade because earnings for the highest-paid workers have grown faster than the average. Thus, in 2007, approximately 80 percent of earnings from employment covered by OASDI fell below the maximum taxable amount. This option would increase the share of total earnings subject to the Social Security payroll tax to 92 percent, 91 percent, or 90 percent by raising the maximum taxable amount to \$270,000, \$230,000, or \$198,000, respectively. After that increase, the maximum would continue to be indexed as it is now.

The first alternative, 92 percent coverage, would generate an additional \$282 billion in revenues from 2010 to 2014; the second, 91 percent coverage, would increase revenues by \$251 billion; and the third, 90 percent coverage, would add \$217 billion to revenues. Because Social Security's retirement benefits are tied to the amount of income on which taxes are paid, however, some of the increase in revenues from this option would be offset by the additional retirement benefits paid to people whose income is above the current maximum taxable amount. The revenue estimates shown here do not reflect those additional outlays (although they include the effects on individual income tax revenues that would result from the assumed changes in the taxable and nontaxable components of labor compensation).

This option, in addition to improving Social Security's long-term financial outlook, would make the payroll tax less regressive. People whose income is above the ceiling now pay a smaller fraction of their total income in payroll taxes than do people whose total earnings are below the maximum. Making more earnings taxable would increase payroll taxes for those high-income earners and move the Social Security tax toward proportionality. (Although that change also could lead to higher benefit payments for people with earnings above the prior maximum, the

additional benefits would be modest relative to the additional taxes those earners would pay.)

A drawback of this option is that raising the earnings cap could weaken the link between the taxes that workers pay into the system and the benefits they receive, changing an important aspect of Social Security since its inception. Another drawback is that people whose earnings fall between the existing and the proposed taxable limits would earn less after taxes for each additional hour worked. That lower reward could encourage a small net reduction in time worked and a small shift from taxable wages to tax-exempt fringe benefits. People whose earnings reach well above the proposed limit would not see any reduction in the return on their additional work, but they would have less income after taxes. That combination probably would encourage more work.

RELATED CBO PUBLICATIONS: Updated Long-Term Projections for Social Security, August 2008; The Long-Term Budget Outlook, December 2007; Is Social Security Progressive? Issue Brief, December 15, 2006; and Social Security: A Primer, September 2001

Require Self-Employed People and Employees to Pay the Same Amounts in	
Payroll Taxes	

						То	tal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
On-budget	0.2	0.3	0.3	0.3	0.3	1.4	2.9
Off-budget	0.1	0.2	0.2	0.2	0.2	0.9	1.8
Source: Joint Committee on Ta	axation						

Social Security and Medicare taxes come in two forms: the Federal Insurance Contribution Act (FICA) tax, which is paid on the taxable earnings of people who have employers, and the Self-Employment Contribution Act (SECA) tax, which self-employed workers pay on their net taxable income. Under FICA, employees and employers each pay a Social Security tax of 6.2 percent on earnings up to a maximum taxable amount (\$106,800 in 2009) and a Medicare tax of 1.45 percent on all earnings. Until 1983, the SECA rate (the tax rate for income from self-employment) was lower than the combined employer and employee rate under FICA. As part of the Social Security Amendments of 1983, however, lawmakers increased the effective tax rate under SECA. The conference committee for that legislation said the change was "designed to achieve parity between employees and the self-employed" beginning in 1990.

In fact, there are two ways that the current method for calculating SECA taxes allows a self-employed person to pay less than an employee with the same earnings. In the first case, a self-employed taxpayer calculates taxes on an income base that consists of total compensation minus 7.65 percent; for an employee, the tax is calculated on taxable compensation without a percentage deduction. Thus, an employee who earns \$50,000 pays \$3,825 in FICA taxes, calculated on a taxable base of \$50,000; the employer also pays \$3,825 in FICA taxes. Because the employer's contribution amounts to additional compensation, the employee is essentially earning \$53,825 (\$50,000 plus the employer's share of FICA taxes) and paying \$7,650 in employment taxes. A self-employed person earning the same \$53,825 pays \$7,605, or \$45 less, in SECA taxes (\$7,605 is \$53,825 minus 7.65 percent, multiplied by the SECA rate). The dif-

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ference arises because comparability would require that the 7.65 percent tax rate be applied to a base of \$50,000, not \$49,707, for a self-employed worker.

In the second case, a self-employed person with earnings above Social Security's taxable maximum of \$106,800 pays the same in Social Security tax as an employee but pays less in Medicare tax. As one example, consider an employee who earns \$150,000: The worker and the employer each pay \$6,622 in Social Security tax (the maximum) and \$2,175 in Medicare tax. The employee's total compensation is thus \$158,797, and the total FICA tax is \$17,593. The self-employed counterpart who earns \$158,797, however, has a taxable base of \$146,649 (total compensation of \$158,797 minus 7.65 percent). Consequently, that person pays the same maximum Social Security tax but \$97 less in Medicare tax. Indeed, highincome self-employed taxpayers can pay as much as 6.3 percent less in Medicare tax under SECA than employees with similar total compensation pay under FICA. That difference has existed since 1991, when lawmakers first set a taxable maximum for Medicare that was higher than the taxable maximum for Social Security. (The cap on taxable earnings for Medicare ended in 1994.)

This option would eliminate the differences in payroll taxes for self-employed people and those who are employed by others. Changing the calculation for SECA taxes would increase on-budget revenues by \$1.4 billion over the 2010–2014 period. (That estimate includes reductions in individual income tax revenues because a portion of the additional SECA tax is tax-deductible.) Off-budget SECA receipts, which are credited to the Social Security trust funds, would increase by \$0.9 billion

over the same five-year period. (The option would require a slight change in Schedule SE, the income tax form taxpayers use to report self-employment income.)

The main rationale for this option is that it would make taxation more equitable. The change would ensure that people with the same total compensation paid the same amount of payroll tax. A drawback of this option comes in the additional complexity it would introduce to the structure of FICA taxation. The Social Security tax would require different taxable maximums for employees and self-employed people, and different methods of calculation would be necessary to determine tax liability for each group of workers.

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Increase Federal Employees' Contributions to Pension Plans										
				То	Total					
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	0.3	0.6	0.9	0.9	1.0	3.7	8.9			
Source: Congressional Budget Of	ffice.									

Most workers covered by the Civil Service Retirement System (CSRS)-the older of the two major retirement plans for civilian employees of the federal governmentcontribute 7 percent of their salary to their retirement fund in exchange for a defined-benefit pension. (Defined-benefit plans set benefits according to a formula that is not affected by the amount employees contribute.) CSRS workers do not pay Social Security payroll taxes. Employees covered by the other main plan for federal civilian workers, the Federal Employees Retirement System (FERS), generally contribute at least 0.8 percent of their salary toward a defined-benefit plan and 6.2 percent in Social Security taxes. Employees covered by either plan may make voluntary contributions (up to the Internal Revenue Service's limit of \$16,500 in 2009) to the Thrift Savings Plan, the government's version of a definedcontribution 401(k) plan.

This option would raise by 0.5 percentage points the contribution most federal civilian workers make to a definedbenefit retirement plan. The increase would be phased in over several years, starting at 0.25 percentage points in calendar year 2010, rising to 0.4 percentage points in 2011, and finally reaching 0.5 percentage points in 2012. (The increases match those that the Balanced Budget Act of 1997 imposed through 2002.) Adopting those changes for federal civilian employees would boost revenues by \$0.3 billion in 2010 and by \$3.7 billion between 2010 and 2014 (assuming that the retirement contributions

that agencies made on behalf of their employees were unchanged, as under the Balanced Budget Act).

The main rationale for increasing employees' contributions concerns comparability: This option would make the government's costs for civilian pension benefits more like those of private-sector employers, without reducing the rate of salary replacement that workers receive in retirement. Private businesses have been moving away from providing traditional pensions for many years. Proponents of this option argue that raising the employees' contributions would be better than cutting the benefits that current retirees receive (as would occur under Option 600-3) because workers could accommodate the effective pay cut by making smaller adjustments to their spending over a longer period. (Some employees could choose to maintain their previous take-home pay by reducing their contributions to the Thrift Savings Plan.)

An argument against raising employees' retirement contributions is that the increases would be roughly equivalent to a 0.5 percent pay cut for most federal civilian workers and thus would diminish the government's compensation package relative to that of the private sector. (The large private companies that still offer definedbenefit plans seldom require employee contributions.) Those factors could weaken the government's ability to attract new employees and might necessitate an increase in cash compensation for employees or result in a less skilled workforce.

#### RELATED OPTIONS: 600-2 and 600-3

CBO PUBLICATIONS: Characteristics and Pay of Federal Civilian Employees, March 2007; Assessing Pay and Benefits for Military Personnel, Issue Brief, August 15, 2007; Comparing the Pay of Federal and Nonfederal Law Enforcement Officers, August 2005; Measuring Differences Between Federal and Private Pay, November 2002; and The President's Proposal to Accrue Retirement Costs for Federal Employees, June 2002

						Total		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues								
Alternative 1	-0.2	-15.5	-32.3	-37.7	-42.6	-128.3	-402.8	
Alternative 2	-0.1	-11.7	-29.9	-35.1	-39.8	-116.6	-374.4	
Alternative 3	0.5	-0.3	-18.0	-21.8	-25.5	-65.1	-238.1	
Alternative 4	-1.0	-18.8	-41.5	-48.3	-53.7	-163.3	-501.9	

When someone dies, an estate tax is imposed on the value of his or her assets that are transferred at death, and a gift tax is paid on the value of taxable gifts that were made during that person's lifetime. Only the portion of an estate that exceeds a stated amount (currently \$3.5 million) is subject to the estate tax. Likewise, only taxable gifts that exceed the lifetime exemption amount (\$1 million) are subject to the gift tax. (Those two exemptions are not cumulative; the exemption amount under the estate tax is reduced by any exemption used under the gift tax.) Gifts and bequests between spouses and bequests to charities are not subject to taxation.

Before enactment of the Economic Growth and Tax Relief Reconciliation Act of 2001 (EGTRRA), the estate and gift taxes were a single unified levy, with a common exemption amount and rate schedule that applied to the cumulative taxable transfers made by a taxpayer during life and at death. EGTRRA created different exemption amounts for the two taxes. Moreover, under the law's provisions, the estate tax is being phased out until its repeal in 2010, although the gift tax is being retained. (EGTRRA also phases out and then repeals generationskipping transfer taxes. Those taxes were designed to prevent people from avoiding some estate taxation by transferring assets, either as gifts during their lifetime or as bequests, to individuals more than one generation younger than the transferor.)

EGTRRA phased out the estate tax primarily by increasing the amount of an estate that is exempt from taxation and by reducing the top marginal tax rate (the rate that applies to the last dollar of an estate). Under that law, the exemption amount is \$3.5 million in 2009, with a top marginal rate of 45 percent. In 2010, the estate tax is temporarily repealed entirely (as are generation-skipping transfer taxes).

In repealing the estate tax in 2010, EGTRRA also temporarily changes the way in which the basis is calculated for assets transferred from a decedent. Basis comes into play when inherited assets are eventually sold and capital gains (or losses)—and any applicable taxes—are calculated. A capital gain or loss is measured as the proceeds received from the sale of an asset minus the taxpayer's basis in the asset (which represents his or her original cost for it). Through 2009, "stepped-up basis" will continue to apply to assets transferred from a decedent. In that treatment, basis is generally measured as an asset's fair market value on the date of the decedent's death or on an alternative valuation date, as specified by law. However, EGTRRA specifies that in 2010, a modified "carryover basis" will be used for inherited assets. Under carryover basis, the basis of assets in the hands of an heir is generally the same as it was in the hands of the decedent. EGTRRA modifies that treatment by allowing spouses to step up basis on assets by a total of \$4.3 million and other heirs by \$1.3 million.

For the gift tax, EGTRRA set the exemption amount at \$1 million beginning in 2002. In 2010 that tax's top marginal rate is set to decline from 45 percent to a rate equal to the highest rate of the individual income tax, currently set for 35 percent.

Those provisions of EGTRRA are set to expire on December 31, 2010; under current law, the estate tax in 2011 will return in its pre-EGTRRA form: unified with the gift tax, having a top marginal rate of 55 percent and a combined exemption amount of \$1 million, and using stepped-up basis. (A 5 percent surcharge will apply to estates worth between \$10 million and \$17 million.)

EGTRRA's provisions also address state death taxes. Previously, estates could use a credit to lower their federal estate tax liability by the amount of state death taxes they paid (up to a certain amount). EGTRRA gradually repealed that credit and, in 2005, replaced it with a deduction that reduces a taxable estate by the amount of such taxes paid to any state or the District of Columbia. In 2011, when EGTRRA expires, that deduction will be replaced by a credit.

Because of the various changes included in EGTRRA, far fewer estates have been subject to the estate tax than would otherwise have been the case. For example, without EGTRRA, about 49,000 estates would have been subject to the tax in 2007; instead, it applied to about 17,400 estates that year. Similarly, under prior law, in 2010 about 39,700 estates would be subject to the tax; under EGTRRA, none would be.

EGTRRA has made estate planning significantly more complicated, however. In addition to the usual uncertainties people face about when they will die and the size of their estate, they also face the complexity of legislated phase-outs and repeals and the ultimate reinstatement of the estate and gift tax. EGTRRA has complicated the strategic use of gifts to transfer wealth to heirs before a benefactor's death (called inter vivos giving), a significant part of estate planning for many taxpayers.

This option considers four methods of modifying the scheduled phase-outs and eventual repeal of the estate tax (and generation-skipping transfer taxes). The first three alternatives would retain and reunify the estate and gift taxes, beginning in 2010; the fourth would make permanent EGTRRA's repeal of the estate tax. In each alternative, the exemption amount for generation-skipping transfer taxes would mirror that of the estate tax.

Alternative 1 would set the exemption for the combined tax at \$5 million starting in 2010, index that amount for inflation, and set the tax rate equal to the top rate on capital gains (currently set for 15 percent in 2010 and 20 percent thereafter). Stepped-up basis would apply to assets transferred from a decedent. No deduction or credit would be given for state death taxes. This alternative would reduce revenues by \$128 billion over the period from 2010 to 2014. In 2014, approximately 5,300 estates would be required to pay some federal estate tax under this alternative, compared with about 58,000 under current law (after EGTRRA's expiration).

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- Alternative 2 would make the same changes, except that instead of a single tax rate, two would apply. The first \$25 million of the taxable estate would be taxed at the top capital gains rate, and taxable transfers above \$25 million would be taxed at 30 percent. (The \$25 million threshold would be indexed for inflation.) Through 2014, revenues would fall by \$117 billion. In that year, some 5,300 estates would have federal estate tax liabilities, compared with about 58,000 under current law.
- Alternative 3 would set the exemption at \$3.5 million beginning in 2010, index that amount for inflation, and set the tax rate at 45 percent. The stepped-up basis would continue to apply to assets transferred from a decedent, but unlike the other three approaches, this alternative would retain EGTRRA's deduction for state death taxes. Those changes would reduce revenues by \$65 billion over five years. About 9,400 estates would pay some federal estate tax in 2014 under this alternative, compared with about 58,000 under current law.
- Alternative 4 would make EGTRRA's provisions for estate and gift taxes in 2010 permanent rather than temporary. Thus, the estate tax would not be reinstated, and the gift tax exemption would remain at \$1 million. In addition, this alternative would permanently retain the modified carryover basis that EGTRRA specifies in 2010 for some transferred assets. Together, those changes would reduce revenues by \$163 billion between 2010 and 2014, and no one would pay federal estate taxes in 2014.

An advantage of all of the alternatives is that they would provide more certainty about future estate and gift tax law, which would simplify estate planning. Another potential benefit is that each would exempt smaller estates (or, in the case of Alternative 4, all estates) from filing estate tax returns, which would reduce the filing burden for some taxpayers and their heirs. In addition, smaller estates would be less likely to incur estate tax liability—which, some proponents argue, could reduce the possibility of having to liquidate a small business to pay estate taxes after the owner's death. Nevertheless, because the first three alternatives would retain the estate and gift tax, returns would still be filed for some estates, and some would be required to pay estate taxes.

Opponents of reducing or repealing estate and gift taxes argue that the progressive nature of those taxes lessens the concentration of wealth in the United States. Another drawback of repealing the estate tax—in addition to the large loss in revenues—is that charitable giving could decline because taxpayers would no longer have a deduction for leaving bequests to charities. Other opponents of

repeal argue that if the estate tax has a negative effect on small estates and closely held businesses (such as familyowned enterprises), the tax could be largely avoided by increasing the exemption amount rather than by repealing the tax. Moreover, opponents maintain that even before EGTRRA, very few businesses were forced to liquidate to pay estate taxes. Another consideration is that repealing the federal estate tax would not eliminate the filing burden because many estates would still have state returns to file and state taxes to pay.

Analysts hold a variety of views about how estate and gift taxes affect saving, the accumulation of capital, and economic growth. Research in those areas is inconclusive.

RELATED CBO PUBLICATIONS: *Effects of the Federal Estate Tax on Farms and Small Businesses*, July 2005; and *The Estate Tax and Charitable Giving*, July 2004

Eliminate the Source-Rules Exception for Exports										
						То	tal			
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	2.1	4.1	4.5	4.9	5.3	20.9	53.7			
Source: Joint Committee on Ta	xation.									

U.S. multinational corporations generally pay U.S. taxes on worldwide income, including that earned from the operations of foreign branches or subsidiaries. Other nations also tax the income from those operations, and the U.S. tax code allows multinational corporations to subtract limited amounts of foreign income taxes from their U.S. tax liability, although the credits cannot exceed what a company would have owed had the income been earned domestically. If a corporation pays more foreign tax on its foreign income than it would have paid on otherwise identical domestic income, it accrues what the tax code calls excess foreign tax credits.

Unlike income from overseas operations, income from products that are produced domestically but sold abroad results almost entirely from value created or added in the United States. Hence, the income that U.S. corporations receive from exports typically is not taxed by foreign nations. However, the U.S. tax code's "title passage" rule specifies that the source of a gain on the sale of a firm's inventory is the place to which the legal title to the inventory "passes." If a firm sells its inventory abroad as exports, the title passage rule treats the income from those sales in a way that, in effect, allocates half to the jurisdiction in which the sale takes place and half to the place of manufacture. In practice, that means that if the company's inventory is produced in the United States and sold elsewhere, half of the income from the sale is treated as originating abroad, even though the company may have no branch or subsidiary located in the place of sale and the foreign jurisdiction does not tax the income.

The result of this rule is that a business can classify more of its income from exports as foreign than could be justified solely on the basis of where the underlying economic activity occurs. A multinational corporation can then use any excess foreign tax credits to offset U.S. taxes on that income. About half of the export income that companies with such excess credits receive is effectively exempted from U.S. taxation, and the income allocation rules give those companies an incentive to produce goods domestically for sale by their overseas subsidiaries.

This option would eliminate the title passage rule and require taxpayers to allocate income for the purpose of taxation on the basis of where economic activity actually occurs. That change would increase revenues by \$2.1 billion in 2010 and by \$20.9 billion over five years.

One rationale in favor of the option is that export incentives, such as those embodied in the title passage rule, do not boost domestic investment and employment overall or affect the trade balance. They do increase profits—and thus investment and employment—in industries that sell substantial amounts of their products abroad. But the U.S. dollar appreciates as a result, making foreign goods cheaper and thereby reducing profits, investment, and employment for U.S. companies whose products compete with imported goods. Thus, export incentives distort the allocation of resources by misaligning the prices of goods relative to their production costs, regardless of where the goods are produced.

This option also would end an undesirable feature of the way foreign tax credits are granted under U.S. tax law. Those credits were intended to prevent the income of U.S. businesses from being taxed twice: domestically and abroad. But the title passage rule allows domestic export income that is not usually subject to foreign taxes to be exempted from U.S. taxes as well, so the income escapes corporate taxation altogether.

Opponents of this option argue that the title passage rule gives U.S. corporations an advantage over foreign companies operating in the same markets. (However, enterprises that lack excess foreign tax credits—such as some U.S. multinationals and U.S. exporters that carry out all of their production domestically—receive no such advantage.) Some opponents of this option also argue that allocating income is less complex under the title passage rule than under the normal rules for income allocation.

RELATED OPTIONS: Revenue Options 40, 50, and 51

RELATED CBO PUBLICATIONS: William C. Randolph, "International Burdens of the Corporate Income Tax," CBO Working Paper 2006-09, August 2006; *Corporate Income Tax Rates: International Comparisons*, November 2005; and *Causes and Consequences of the Trade Deficit: An Overview*, CBO Memorandum, March 2000

Tax the Worldwide Income of U.S. Corporations as It Is Earned										
						То	tal			
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	2.7	5.7	6.0	6.3	6.4	27.1	65.2			
Source: Joint Committee on Ta	exation.									

The federal government taxes the income of U.S. businesses earned at home and abroad. Income earned abroad also may be taxed by the country in which it is earned. To prevent such double taxation, U.S. companies are allowed to claim the foreign tax credit, which reduces their U.S. taxes by the amount of any income and withholding taxes they have paid to foreign governments. The foreign tax credit is subject to limits that are designed to ensure that the amount of credits taken does not exceed the amount of U.S. tax that would otherwise have been due. Those limits also are intended to prevent corporations from using foreign tax credits as a way to reduce taxes on income earned in the United States. For computing those limits, overhead expenses (such as interest costs) of a U.S. parent company's domestic operations must be allocated between domestic and foreign activities. Most income earned by the foreign subsidiaries of U.S. corporations is not subject to U.S. taxation until it is repatriated in the form of dividends paid to the parent corporation.

Under this option, all income earned by the foreign subsidiaries of U.S. companies would be subject to U.S. taxes as it was earned, regardless of when it was repatriated. To prevent double taxation, foreign tax credits would still be allowed. For determining the limit on those credits, however, the U.S. parent corporation's overhead expenses would no longer be allocated between domestic and foreign activities. Together, those changes would increase revenues by \$2.7 billion in 2010 and by \$27.1 billion over the 2010–2014 period.

Proponents of this option argue that by not taxing income until it is repatriated as dividends, the current system reduces the cost of foreign relative to domestic investment. This option would eliminate the bias in favor of foreign investment and thus increase the amount of domestic investment, which in turn would make U.S. workers more productive and boost their earnings. Other arguments for this option focus on simplifying the tax system. Eliminating the rules for allocating overhead expenses and the provisions that distinguish between active foreign income (which is not taxed until it is repatriated) and passive foreign income (which is generally taxed as it is earned) would make international tax rules less complex. The costs of tax planning also would decline for U.S. multinational corporations, which would no longer need to plan the repatriation of dividends from their foreign subsidiaries. Finally, enforcing tax rules would be less costly because U.S. companies would not be able to reduce their worldwide taxes by disguising U.S. income as foreign income.

Opponents of this approach argue that it would put U.S. multinational corporations at a competitive disadvantage: The cost of foreign investments by U.S. multinationals would rise while the cost of foreign investments by foreign multinationals remained the same. Opponents maintain that such a competitive disadvantage would shift market share and production toward businesses controlled by foreign multinationals. Concerns of proponents and opponents of this option could be addressed by reducing U.S. corporate tax rates at the same time.

The President's 2010 budget does not call for taxing worldwide income, but it does include proposals that would limit the ability of corporations to shift income abroad. The Administration would require companies to defer certain deductions until the distributed income is repatriated, it would limit the foreign tax credit to a share of total foreign taxes that equals the share of foreign income repatriated, it would revise the "check the box" rules that allow businesses to make subsidiaries invisible for U.S. tax purposes, and it would restrict the ability of corporations to generate foreign tax credits on income that is not currently subject to U.S. tax.

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RELATED OPTIONS: Revenue Options 29, 49, and 51

RELATED CBO PUBLICATION: Corporate Income Tax Rates: International Comparisons, November 2005

Exempt Active Foreign Dividends from U.S. Taxation											
						То	Total				
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Revenues	3.3	6.5	6.9	7.3	7.7	31.7	76.2				
Source: Joint Committee on Ta	axation.										

The federal government taxes the income of U.S. business earned at home and abroad. To prevent income earned abroad from being subject to both foreign and U.S. taxation, the tax code gives U.S. corporations a credit that reduces their U.S. tax liability by the amount of income and withholding taxes they have paid to foreign governments. (The rules governing that foreign tax credit are designed to prevent the credit from exceeding the amount of U.S. tax that would otherwise be owed and to keep companies from using the credit as a way to reduce their taxes on income earned in the United States.) Most of the income that U.S. corporations earn from the business activities of their foreign subsidiaries is not subject to U.S. taxes until it is repatriated in the form of dividends paid to the parent company by its subsidiaries.

This option would exempt from U.S. taxation active dividends-those that U.S. corporations earn from the business operations of their foreign subsidiaries or foreign branches. Any overhead costs (such as interest expenses) of a U.S. parent company would be allocated between the company's U.S. and foreign activities as they are now. Unlike current law, however, overhead expenses allocated to foreign income would not be deductible from U.S. income. All other foreign income would be taxed in the current manner: as it is earned. Foreign tax credits would be allowed so that companies could offset any foreign income taxes or withholding taxes paid on foreign income that would still be subject to U.S. taxation. Those changes would increase revenues by a total of \$31.7 billion through 2014. The revenue lost by exempting dividends from U.S. taxation would be more than offset by increases in taxes on other sources of income. Specifically, taxes on U.S. income would rise because overhead expenses allocated to exempt foreign income could no

longer be deducted from U.S. income. In addition, companies that paid high foreign income taxes would no longer be able to use the foreign tax credits associated with repatriated dividends to shield other low-tax foreign income (such as royalties and export income) from U.S. taxes.

Advocates of this option argue that such a change would reduce the complexity of the tax system. The current rules allow U.S. multinational corporations to reduce their worldwide taxes by carefully planning how and when they will repatriate dividend income from their foreign subsidiaries. Researchers have estimated the total costs of such planning at more than \$1 billion per year. Proponents argue that this option would eliminate those planning costs without affecting the balance between the incentives that companies have to invest in the United States and their incentives to invest abroad. Proponents also argue that this option would allow foreign tax credit rules to be simplified because many of those rules would no longer apply to active dividend income.

Opponents of this option argue that both this option and the current tax system cause U.S. corporations to favor foreign over U.S. investments, thus reducing the amount of capital available for production in the United States. That bias could be eliminated by retaining the current system of foreign tax credits while taxing the income of foreign subsidiaries as it is earned (an approach discussed in Revenue Option 50) rather than waiting until the income is repatriated as dividends.

Although the President's 2010 budget does not propose the exemption of active foreign dividends from U.S. taxation, it does include provisions for enforcing international taxation and reforming deferral and other foreign tax policies.

**RELATED OPTIONS: Revenue Options 49 and 50** 

RELATED CBO PUBLICATION: Corporate Income Tax Rates: International Comparisons, November 2005

Increase Excise Taxes on Motor Fuels									
						То	otal		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Revenues									
50 cent increase	43.6	61.0	61.5	62.0	62.4	290.5	604.8		
25 cent increase	21.9	30.7	31.0	31.2	31.5	146.3	305.1		
ource: Joint Committee on Ta	axation.								

Revenues from federal excise taxes on motor fuels are credited to the Highway Trust Fund to pay for highway maintenance and construction. Those taxes currently are set at 18.4 cents per gallon of gasoline and 24.4 cents per gallon of diesel fuel produced. (State and local excise taxes bring total average tax rates nationwide to 40.3 cents per gallon for gasoline and 46.6 cents per gallon for diesel fuel.)

The first alternative under this option would increase the federal excise tax on gasoline and diesel fuel by 50 cents per gallon, to 68.4 cents for a gallon of gasoline and 74.4 cents for a gallon of diesel fuel. The change would increase federal revenues by \$43.6 billion in 2010 and by a total of \$290.5 billion over five years. (Because excise taxes reduce the tax base of income and payroll taxes, higher excise taxes would lead to reductions in income and payroll tax revenues. The estimates shown here reflect those reductions.) The second alternative would raise federal fuel taxes by 25 cents per gallon, to 43.4 cents for gasoline and 49.4 cents for diesel fuel. That alternative would increase federal revenues by \$21.9 billion in 2010 and by \$146.3 billion over five years.

The first alternative would bring average taxes on gasoline and diesel fuel to about \$1 per gallon (including state and local excise taxes). Various studies and public statements by economists suggest that \$1 is the "optimal" excise tax rate for motor fuels. That amount is intended to account for external costs—costs imposed on society that are not reflected in the pretax price paid by individual consumers—stemming from the overconsumption of motor fuel, including costs associated with road congestion, the risk of accidents, and pollution. National Surface Transportation Policy and Revenue Study Commission. The commission reported that a 25- to 40-cent-per-gallon increase in the fuel tax would be needed to fund significant improvements or expansion of the nation's highways. A February 2009 report by the National Surface Transportation Infrastructure Financing Commission stated that a smaller increase, of 10 cents, would be needed simply to maintain current highway conditions. Any extra revenue resulting from the 25 cent increase could be used to improve or expand the highway system or to reduce the deficit.

A rationale for increasing the excise tax above the amount needed simply to improve the system (for example, to 50 cents per gallon) is that doing so would give a more accurate reflection of the external costs of excess consumption of motor fuel. If fuels were more expensive, people might drive less or purchase vehicles that use fuel more efficiently, thus reducing the external costs of congestion, accidents, pollution, and dependence on imported oil. Lower fuel consumption also would reduce emissions of carbon dioxide and could help moderate the effects of human activity on the planet's climate.

The research organization Resources for the Future cites road congestion as the greatest contributor to the external costs of driving. An argument against this option is that imposing tolls or congestion pricing (charging fees for driving at specific times in given areas) would be better ways to alleviate congestion. One could argue that pollution costs would be best met through a direct tax on gasoline emissions, and a levy on miles driven would be most appropriate for taxing accident-related costs.

Other arguments against raising the gasoline tax involve fairness. If the higher cost of fuel was passed on by the trucking industry to consumers in the form of higher

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The second alternative, raising the taxes by 25 cents, follows recommendations of a 2007 study by the

prices for transported retail goods, those higher prices would impose a disproportionate burden on rural households, even though the benefits associated with reducing vehicle emissions and congestion are greatest in densely populated, mostly urban areas. Moreover, some analysts argue that taxes on gasoline and other petroleum products are regressive; they consume a greater percentage of the income of lower-income households than of middleand upper-income households.

Another rationale for increasing the excise tax is that doing so could fund repair or expansion of the nation's highway system. In that scenario, the net revenue added to the federal budget would be reduced by the amount of money used for highway projects.

#### RELATED OPTIONS: Revenue Options 53, 56, and 57

RELATED CBO PUBLICATIONS: Using Pricing to Reduce Traffic Congestion, March 2009; Effects of Gasoline Prices on Driving Behavior and Vehicle Markets, January 2008; The Economic Costs of Fuel Economy Standards Versus a Gasoline Tax, December 2003; Statement of Douglas Holtz-Eakin, Congressional Budget Office, before the Joint Economic Committee, Congestion Pricing for Highways, May 6, 2003; and Reducing Gasoline Consumption: Three Policy Options, November 2002

Make Permanent the Partial Excise Tax Exemption for Biofuels									
						То	tal		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019		
Change in Revenues	-0.7	-4.8	-6.2	-6.7	-7.1	-25.5	-62.1		
Source: Joint Committee on Tax	ation.								

Although all motor fuels are subject to excise taxes, the tax code gives tax credits to producers (or sometimes sellers) of gasoline or diesel fuels that contain ethanol (another name for ethyl alcohol, which in the United States is made chiefly from corn) or biodiesel (often made from soybeans). Through 2010, the tax credit for ethanol can be as much as 45 cents per gallon, depending on the percentage of alcohol in the fuel. The credit is 4.5 cents per gallon for gasohol, for example, which is 90 percent gasoline and 10 percent alcohol. Through 2009, the tax credit for producers of biodiesel from agricultural crops, such as soybeans, is 1 dollar per gallon. The rules primarily benefit ethanol producers because production and consumption of ethanol far exceed that of biodiesel fuel.

Lawmakers first reduced excise taxes on renewable fuels in the 1970s. In 2004, the rate reduction was changed to an equivalent tax credit, which is scheduled to expire at the end of 2010. In 2008, the tax credit for ethanol was reduced from 51 cents to 45 cents per gallon and the credit for biodiesel was increased from 50 cents to 1 dollar.

This option makes permanent the tax credit on renewable liquid fuels, decreasing revenues by \$0.7 billion in 2010 and by \$25.5 billion through 2014. Because excise taxes reduce the tax base of income and payroll taxes, lower excise taxes would lead to increases in income and payroll tax revenues. The estimates shown here reflect those increases.

Proponents of the excise tax credits assert that they help cut demand for imported oil by reducing prices for domestically produced alternative fuels. The credit is intended to bolster markets for biofuels as those fuels come to provide an economically competitive supplement to conventional petroleum-based fuels. Making the credit permanent rather than enacting a short-term extension would reduce the risk businesses face on investments in renewable liquid fuels and thereby encourage greater production.

Advocates of allowing the tax credits to expire argue that biofuels currently displace only about 2 percent of U.S. oil imports and thus provide little protection from price shocks in global oil markets. Moreover, recent research results suggest that the United States' entire yearly corn crop could produce enough ethanol to displace only about 12 percent of the gasoline used each year.

Proponents of the credits point to the environmental benefits of biofuels over conventional gasoline and diesel fuels. Ethanol's oxygen content is higher than that of conventional gasoline, so burning it produces less carbon monoxide-a major precursor of smog. Indeed, the use of higher-octane gasoline (octane can be boosted by adding ethanol) during the winter as part of the Environmental Protection Agency's Oxy-Fuels program has reduced carbon monoxide emissions and helped improve air quality in some areas where carbon monoxide concentrations had exceeded federally mandated limits. Engines that run on biodiesel fuel also emit smaller quantities of particulate matter, carbon monoxide, sulfur dioxide, and volatile organic compounds than do those that use conventional diesel fuel. In some circumstances, engines that use ethanol or biodiesel produce smaller amounts of greenhouse gases. Supporters of the credits argue that tax advantages are justified for renewable liquid fuels, such as ethanol and biodiesel, in part because of their benefits to human health and the environment.

Some advocates of eliminating the credit dispute the environmental benefits of using biofuels and argue that stricter environmental regulations or higher excise taxes on motor fuels are better ways to achieve environmental protection. The environmental benefits of using alternative fuels can be offset by the amount of fossil fuels required to grow the crops and produce the fuels. In addition, some observers argue that the additional cropland

needed for biofuel production results in increased deforestation elsewhere as other land is converted to agricultural use, thus mitigating reductions in greenhouse gases. The scientific literature contains competing estimates of the net benefits provided by renewable liquid fuels.

Supporters of repealing the tax credit argue that, given current production, ethanol and biodiesel provide little more, or possibly less, energy than must be used to create them and only a small reduction in consumption of fossil fuels or emissions of carbon dioxide. Thus, the credits serve mainly as a transfer payment from taxpayers to biofuel producers and from consumers to producers in the form of higher prices for food or for corn- and soybased products. Proponents of ending the credit argue that production of biofuels draws resources that might be better used elsewhere. Some critics of permanent credits for biofuels also argue that as the biofuels industry matures and production of ethanol and biodiesel becomes more competitive with gasoline and diesel fuel, the need for credits will abate.

RELATED OPTIONS: 270-6 and Revenue Option 52

RELATED CBO PUBLICATIONS: *The Economic Costs of Fuel Economy Standards Versus a Gasoline Tax,* December 2003; and *Reducing Gasoline Consumption: Three Policy Options,* November 2002

						Total	
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues							
Eliminate the communications excise tax	-0.3	-0.2	-0.1	-0.1	-0.1	-0.8	-1.5
Eliminate Universal Service Fund fees	-8.8	-8.8	-8.9	-9.0	-9.1	-44.6	-91.8

### Eliminate the Federal Communications Excise Tax and Universal Service Fund Fees

The federal government levies a 3 percent communications excise tax on some phone and telecommunications services. In 2006, after legal challenges to the tax's longdistance component, the Internal Revenue Service (IRS) announced that it would no longer collect taxes on longdistance and services "bundled" with it, such as wireless and Internet-based telephone services. That decision left local telephone calling as the only service subject to the communications excise tax.

A variety of telecommunications services are subject to another federal levy to finance the Universal Service Fund (USF), which promotes universal access to affordable telecommunications services for high-cost companies that serve rural areas, low-income consumers, rural health care providers, and schools and libraries. The fees are collected from all U.S. providers of interstate and international telecommunications services, and they function in effect as a telecommunications excise tax.

This option would eliminate the final component of the federal communications excise tax and the USF fees. Doing away with the excise tax would reduce revenues by \$0.3 billion in 2010 and by \$0.8 billion through 2014. (Because excise taxes reduce the tax base of income and payroll taxes, lower excise taxes would lead to increases in income and payroll tax revenues. The estimates shown here reflect those increases.) Eliminating the USF fees would reduce federal revenues by \$8.8 billion in 2010 and by \$44.6 billion over five years. (Those estimates reflect only the effect of ending the fees. Lawmakers could choose to reduce spending on programs funded by the USF and thus offset some of the lost revenues.)

The main rationale for eliminating those taxes is that they have negative effects on the allocation of telecommunications resources. Innovations in the communications industry and the IRS decision have led to a wide range of untaxed services that are similar to the remaining taxed service. New forms of communication through the Internet and the bundling of various services including local and long-distance calling offered as part of wireless service or combinations of local-telephone and long-distance services with dial-up Internet access. The uneven application of the communications excise tax distorts consumers' choices among available services by causing decisions to be based more on the services' relative tax rates than on their relative costs and benefits. The USF fees have much the same distortional effects, and they could be greater now than in the past, when substituting one service for anotherwireless calling, text messaging, or electronic mail, for traditional phone service, for example-was less feasible.

Another rationale for this option involves fairness. Those levies are most likely regressive, in that paying for them probably takes up a larger share of earnings for lower-income than for higher-income households. Moreover, the communications industry's new untaxed alternative services generally are used more by higher-income people who have more access to computers and other communication devices.

An argument against ending the excise tax and USF fees is that (to the extent that the taxable services are used) those levies provide a reliable source of federal revenues and, because they are collected by telephone companies, they are difficult to evade. Furthermore, the distortions they create could be corrected either by broadening them

to include services that are similar but not now taxed or by eliminating exemptions granted to such groups as nonprofit hospitals and educational institutions. Those alternative approaches would increase revenues and mitigate the regressive nature of the taxes. In addition, eliminating USF fees, which are dedicated to specific programs, would raise the issue of how or whether those programs would be funded.

RELATED CBO PUBLICATIONS: Factors That May Increase Spending from the Universal Service Fund, June 2006; and Financing Universal Telephone Service, March 2005

Impose a Tax on Emissions of Sulfur Dioxide										
		То	tal							
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019			
Change in Revenues	0.2	0.3	0.3	0.3	0.3	1.4	3.0			

To protect the public's health and welfare, the Clean Air Act charged the Environmental Protection Agency (EPA) with setting national standards for ambient air quality. Among the pollutants EPA regulates is sulfur dioxide  $(SO_2)$ —a gas formed when sulfur-containing fuel (mainly coal and oil) is burned and from metal smelting and other industrial processes. Exposure to high concentrations of SO<sub>2</sub> can aggravate respiratory illnesses and cardiovascular disease, and SO<sub>2</sub> is considered a main cause of acid rain, which harms surface waters, forests, crops, and buildings. (Revenue Option 56 concerns emissions of oxides of nitrogen, another precursor of acid rain.)

The Clean Air Act Amendments of 1990 established a program to reduce SO<sub>2</sub> emissions, and thus acid rain, through a market-based system of emission allowances, commonly called cap-and-trade programs, that govern the amount of SO<sub>2</sub> an electric utility or industrial source may emit in a year. Each allowance provides limited authorization to emit 1 ton of  $SO_2$ . EPA distributes the allowances on the basis of past fuel use and the statutory cap on emissions. The law requires that each source's annual SO2 emissions not exceed its allowances, but those entities may trade allowances, bank them for future use, or purchase more of them at periodic EPA auctions. Polluters that can abate SO<sub>2</sub> emissions at relatively low cost have an economic incentive to do so and to sell their surplus allowances to companies that have relatively high abatement costs. Beginning in 2010, another EPA initiative-the Clean Air Interstate Rule (CAIR)-will permanently cap emissions of SO<sub>2</sub> and nitrogen oxides in the eastern United States. CAIR, which has been the subject

of legal challenges, must be revised by EPA to comply with a decision by a U.S. Court of Appeals.

This option would impose an excise tax on emissions of  $SO_2$  from stationary sources (for example, electricitygenerating units that produce less than 25 megawatts of power) that are not covered by the acid rain program or CAIR. The tax would be set at \$100 per ton, on the basis of the price of  $SO_2$  emission allowances. The tax would increase revenues by \$0.2 billion in 2010 and by a total of \$1.4 billion through 2014. (Because excise taxes reduce the tax base of income and payroll taxes, additional excise taxes would lead to reductions in income and payroll tax revenues. The estimates shown here reflect those reductions.)

Proponents of this option assert that placing taxes on emissions can help lessen pollution efficiently. The tax would lead to reductions in  $SO_2$  emissions by encouraging utilities whose abatement costs were lower than the tax to cut emissions and allowing those whose abatement costs were higher than the limit to continue to emit  $SO_2$ and pay the tax.

A potential objection is that this option would lead to inequitable treatment of different sources of pollution. Companies covered by the acid rain program or by CAIR would incur no costs for emissions up to their allowance allocations, whereas companies covered by this option would bear the burden of a tax on all  $SO_2$  emissions. In addition, facilities that are not currently required to monitor emissions would incur a cost to install monitoring systems to help them comply with the new rules.

#### RELATED OPTIONS: Revenue Options 56 and 57

RELATED CBO PUBLICATIONS: Policy Options for Reducing CO<sub>2</sub> Emissions, February 2008; Limiting Carbon Dioxide Emissions: Prices Versus Caps, Issue Brief, March 15, 2005; Uncertainty in Analyzing Climate Change: Policy Implications, January 2005; The Economics of Climate Change: A Primer, April 2003; and Factors Affecting the Relative Success of EPA's NO<sub>x</sub> Cap-and-Trade Program, June 1998

Impose a Tax on Emissions of Nitrogen Oxides											
						Total					
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019				
Change in Revenues	1.2	1.7	1.7	1.8	1.9	8.3	18.4				

Nitrogen oxides  $(NO_x)$  usually enter the air as a result of high-temperature combustion of nitrogen-containing fuel: coal in power plants and gasoline in engines, for example.  $NO_x$  emissions are cause for concern because they are precursors of ground-level ozone (the primary constituent of smog) and acid rain. According to the Environmental Protection Agency (EPA), exposure to  $NO_x$  can cause respiratory irritation and result in compromised resistance to infections such as influenza. Nitrogen oxides and pollutants formed from them can be transported over long distances, so the effects on human health and the environment are not confined to the vicinity of a source.

The Clean Air Act requires states to implement programs that reduce ground-level ozone. In 1998, EPA promulgated a rule, commonly called the NO<sub>x</sub> SIP (State Implementation Plan) Call, to address the regional transport of  $NO_{r}$  emissions. The rule required many eastern states and the District of Columbia to identify how they would cut NO<sub>r</sub> emissions to quantities below previously mandated limits. Under the NO<sub>x</sub> SIP Call, EPA created the federal NO<sub>x</sub> Budget Trading Program, a market-based system for emission allowances (also called cap and trade), to assist states in meeting federal requirements. In 2009, EPA will begin implementing the Clean Air Interstate Rule (CAIR), which caps NO<sub>x</sub> and sulfur dioxide emissions in the eastern United States and addresses the interstate transport of emissions. CAIR, which has been the subject of legal challenges, must be revised by EPA in a manner that is consistent with a decision by a U.S. Court of Appeals. (Revenue Option 55 concerns an excise tax on producers of sulfur dioxide emissions.)

This option would supplement EPA's initiatives by imposing an excise tax on  $NO_x$  emissions from stationary sources in states not included in CAIR. The tax would apply to industrial facilities and commercial operations, including electricity-generating units and industrial boilers. The optimal tax is one that would impose a cost that is equal to the benefit gained by society from the reduction of  $NO_x$  emissions. A tax rate set at \$500 per ton would boost revenues by \$1.2 billion in 2010 and by a total of \$8.3 billion through 2014. (Because excise taxes reduce the tax base of income and payroll taxes, additional excise taxes would lead to reductions in income and payroll tax revenues. The estimates shown here reflect those reductions.)

Proponents of this option argue that it would encourage efficient reduction of air pollution. Polluters that can cut their  $NO_x$  emissions at a cost that is less than the tax itself would have an incentive to do so; those whose abatement costs exceed the tax could continue to pollute and pay the levy. In that way, this option would encourage further reductions in  $NO_x$  emissions to amounts below the limits set in current regulations.

An argument against this option is that current policies sufficiently control the risks posed by  $NO_x$  emissions, so the tax would needlessly burden some businesses. In most cases the businesses that would be subject to the tax already have paid for scrubbers and other required pollution abatement equipment. Moreover, opponents of this option argue, current regulations and programs already have effectively reduced  $NO_x$  emissions to an extent that safeguards public health.

**RELATED OPTIONS: Revenue Options 55 and 57** 

RELATED CBO PUBLICATIONS: Policy Options for Reducing CO<sub>2</sub> Emissions, February 2008; Limiting Carbon Dioxide Emissions: Prices Versus Caps, Issue Brief, March 15, 2005; Uncertainty in Analyzing Climate Change: Policy Implications, January 2005; The Economics of Climate Change: A Primer, April 2003; and Factors Affecting the Relative Success of EPA's NO<sub>x</sub> Cap-and-Trade Program, June 1998

						Τα	otal
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	0	0	83.5	86.8	99.9	270.1	881.8

Carbon dioxide  $(CO_2)$  emitted into the atmosphere from burning fossil fuels is among the greenhouse gases that prevent heat from escaping the Earth's atmosphere. Concentrations of greenhouse gases are increasing, and they are believed to contribute to climate change that could have serious long-term consequences for the planet.

This option would create a regulatory program requiring emitters of large amounts of greenhouse gases to pay a "price" to emit those gases. The policy could be instituted as a tax on emissions or as part of a cap-and-trade system. In either case, payments could be made "upstream," by domestic energy producers and importers of fossil fuels and other products that lead to greenhouse gases, or "downstream," on users of energy where the emissions actually occur. Both approaches would yield similar results because the amounts paid upstream for the most part would be passed downstream in higher prices for fuel and for goods and services that use fuel in their production. Those higher prices, in turn, would create incentives throughout the U.S. economy to reduce emissions of greenhouse gases.

The revenue estimates shown in this option assume the establishment of a cap-and-trade program for emitting greenhouse gases (measured in CO2 equivalents, or CO<sub>2</sub>e, the amount of carbon dioxide that would cause an equivalent amount of warming). Under that program, a decreasing number of allowances would be sold at open auction, beginning in 2012 and ending in 2050, such that emissions from the sectors that are subject to the cap-and-trade policy would fall by 25 percent from their projected amounts in 2022 and by 36 percent by 2026. Although there would be no revenues in 2010 or 2011, the program would be expected to yield revenues of \$270 billion through 2014. (Because it would reduce the tax base of income and payroll taxes, the program would lead to reductions in revenue from income and payroll taxes. The estimates shown here reflect those reductions.) The program would yield revenues and emissions reductions that are similar to those that would be generated by a tax on emissions that would begin at \$23 per ton of

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 $CO_2e$  in 2012 and increase at a constant annual rate of 5.8 percent through 2050.

Ideally, the program would seek to reduce emissions such that the marginal cost of those reductions would equal the reductions' expected marginal benefits from averting future changes attributable to unabated emissions. The benefits of reducing the risks of damage caused by those emissions are not known precisely. To assess the benefits, it is necessary to quantify the relationship between emissions of greenhouse gases and the change (and rate of change) in various aspects of the Earth's climate (such as average temperature, sea level, rainfall, or severity of droughts and storms) in different regions. It also requires evaluating possible effects-harmful or beneficial-of regional changes on natural and human systems and calculating the pecuniary value of those effects. Any benefit or harm that arises from different countries' cutting emissions will be exhibited over large areas, so it is difficult to set an optimal price for emissions of greenhouse gases in the United States. Accordingly, the expected benefits to the nation of reducing emissions overall will depend on reductions achieved here and abroad. Most analysts agree that if other countries with high emissions do not cut their emissions over the same period as the United States and by roughly the same percentage, efforts in the United States will produce small climate-related benefits. Finally, to estimate a price that produces future benefits, analysts apply a discount rate to the value of benefits that occur in the future, thus placing more weight on current costs than on future benefits. There is controversy, however, about how to discount the future benefits that society would reap from averting climate change.

Because of the difficulty in determining the benefits of reduced emissions, any estimate of the price that would best balance current costs and future benefits of reductions should be viewed only as an approximation. Nevertheless, many observers agree that, from an economic standpoint, the best approach to mitigating carbon emissions would begin by setting relatively modest prices for emissions and increasing them gradually to

give economies time to adjust to cutting the use of fossil fuels and to allow for flexible policymaking. For example, a 2008 study identified an appropriate price of about \$7.50 per ton of  $CO_2e$  beginning in 2005, rising to \$55 per ton of  $CO_2e$  by the end of the century (in 2005 dollars). The researchers assumed the price would be applied worldwide. (Such a global price on emissions differs from this option, which seeks only to lower domestic emissions. The marginal costs of doing so are higher in this option at the targeted rates for reductions in emissions and would be borne primarily by U.S. residents even though the benefits are global and probably would have the greatest effect among developing nations.)

There is no consensus about the amount by which U.S. emissions of greenhouse gases should be reduced. Opponents of policies that limit emissions argue that any attempt to curtail U.S. emissions in the near term would burden the economy; cause carbon-intensive industries, such as aluminum and steel production, to move abroad; and produce uncertain benefits. Moreover, averting the risk of future damage caused by climate change will depend on collective global efforts to cut emissions.

There also is continuing disagreement about the best means to achieve a specific reduction. Many observers advocate ambitious energy performance standards for passenger vehicles, for example, as a way to cut emissions. Other observers believe that low-carbon technology, such as nuclear power, will produce larger reductions in the emissions of greenhouse gases. Many economists argue that market-based approaches-a carbon tax or a capand-trade program-would be the most efficient pathways to reducing emissions because they allow markets to dictate when, where, and how reductions would occur most cheaply. Yet those who agree that a market-based policy is superior to other policies often disagree about how best to implement a price on emissions. Some analysts maintain that a cap on aggregate emissions would be better than a tax because the cap would provide more certainty about the extent of the reduction.

#### RELATED OPTIONS: Revenue Options 55 and 56

RELATED CBO PUBLICATIONS: *Potential Impacts of Climate Change in the United States*, May 2009; *How CBO Estimates the Costs of Reducing Greenhouse-Gas Emissions*, Background Paper, April 2009; Statements of Douglas W. Elmendorf, Congressional Budget Office, before the House Committee on Ways and Means, *Flexibility in the Timing of Emission Reductions Under a Cap-and-Trade Program*, March 26, 2009, and before the Subcommittee on Income Security and Family Support, House Committee on Ways and Means, *The Distributional Consequences of a Cap-and-Trade Program for CO*<sub>2</sub>*Emissions*, March 12, 2009; cost estimate for S. 3036, Lieberman-Warner Climate Security Act of 2008, June 2, 2008; cost estimate for S. 2191, America's Climate Security Act of 2007, with an amendment, April 10, 2008; and *Evaluating the Role of Prices and R&D in Reducing CO*<sub>2</sub>*Emissions*, September 2006

Reinstate the Superfund Taxes								
						То	tal	
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues	1.4	1.9	1.9	2.0	2.0	9.2	19.8	

The Superfund program, administered by the Environmental Protection Agency (EPA), and its associated trust fund were established in 1981 to clean up the nation's most contaminated hazardous waste sites. By statute, the cost of cleanup is to be borne by the parties responsible for the damage, but EPA pays for the cleanup when liable parties cannot be identified, no longer exist, or are unwilling or unable to undertake the job.

EPA-led cleanups and other portions of Superfund's programs are funded by an annual appropriation, which lawmakers designate as having two sources: One portion comes from the general fund of the Treasury, and the rest derives from balances in the program's trust fund. Originally, revenues went to the trust fund mainly from taxes on petroleum and various industrial chemicals and from a corporate environmental income tax. However, authorization for those taxes expired in December 1995, and by the end of 2003, the balance in the trust fund had dwindled essentially to zero. Since 2004, EPA's appropriation has allowed the Superfund program to be financed by the general fund and to draw from the trust fund only "such sums as are available."

This option would reinstate the Superfund excise tax of 9.7 cents per barrel of crude oil or refined oil product, an excise tax of \$0.22 to \$4.87 per ton on various chemicals, and a corporate income tax of 0.12 percent on corporations' modified alternative minimum taxable income above \$2 million. Together, those taxes would yield revenues of \$1.4 billion in 2010 and \$19.8 billion from 2010 to 2019. (Because excise taxes reduce the tax base of income and payroll taxes, additional excise taxes would lead to reductions in revenue from income and payroll taxes. The estimates shown here reflect those reductions.)

Proponents of this option assert that reauthorizing the Superfund taxes is consistent with the principle that polluters should pay to clean up the problems they create. Because petroleum products and various chemical feedstocks and derivatives are common sources of contamination at Superfund sites, and because hazardous chemicals are used by many medium-sized and large corporations, it is appropriate that producers and users of those substances—as well as corporations more broadly—foot much of the cleanup bill. Some advocates of this option argue that the Superfund program needs a stable source of funding to maintain its long-term efforts at the worst sites and to continue to provide a credible assurance that EPA will clean up sites and recover the costs from the responsible parties that do not undertake the work themselves.

Some critics of reinstating the taxes argue that the Superfund program should not be given dedicated funding until lawmakers reform its liability system and clarify its mission. Other opponents maintain that taxing all companies in an industry or all corporations above a particular size, regardless of individual past or current waste disposal practices, is inconsistent with the efficiency and fairness goals of the "polluter pays" principle. Such taxes provide no incentive for companies to handle waste carefully or in fact to avoid creating it in the first place. Instead, the taxes merely distort economic decisions, thus hampering rather than promoting efficiency. Moreover, the burden of paying such taxes falls on a business's current stakeholders (its customers, employees, and investors), who might not be the same people who benefited from or were responsible for earlier activity, including any that might have caused the pollution.

Opponents of reinstating the Superfund taxes also point to research results that show that the administrative and compliance costs of such levies are out of proportion with the relatively small amounts of revenue they raise. Finally, opponents note that Superfund spending has always been subject to annual appropriations and that dedicated taxes thus provide no guarantee of stable funding.

### Make Permanent the Tax Credits for Generating Electricity from Renewable Sources

					Total		
(Billions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	*	*	*	-0.1	-0.3	-0.4	-6.3
Source: Joint Committee on Ta	xation.						
Note: * = between zero and -\$!	50 million.						

Section 45 of the tax code provides tax credits to businesses that generate electricity from renewable sources. Eligible sources include wind, biomass, geothermal and solar energy, municipal solid waste, marine and hydrokinetic resources (electricity from waves, tides, and river currents), qualified hydropower, and refined coal (coal that produces at least 20 percent less nitrogen oxide and 45 percent less sulfur dioxide or mercury when burned).

Those tax credits were enacted to promote renewable energy production and to reduce emissions of air pollutants and greenhouse-gas emissions by lowering the cost of supplying consumers with alternatives to electricity produced from conventional coal. Production credits could cause some manufacturers to cut the price of energy from those sources, or they could lead to larger profits. In either case, the result could be decreased reliance on conventional, fossil fuels to supply U.S. energy needs.

To be eligible for those credits, facilities that produce electricity from renewable sources must be placed into service by a certain date. The American Recovery and Reinvestment Act of 2009 (Public Law 111-5) extended those dates in some cases: wind facilities must be in service before 2013; refined coal facilities, before 2010; and biomass, geothermal energy, municipal solid waste, marine and hydrokinetic resources, and hydropower, before 2014. Credits for electricity generated using solar energy are available to facilities placed into service before 2006.

This option would make permanent section 45 tax credits for electricity production from those renewable sources, decreasing revenues by \$0.4 billion through 2014. Advocates of this option maintain that tax credits support the development of new energy sources and help curb wasteful and polluting practices. For example, using poultry waste as a fuel averts environmental damage by decreasing the amount of animal waste that could pollute surrounding water resources or contribute to air pollution through ammonia or hydrogen sulfide emissions. In addition, to the extent that the tax credits encourage the use of renewable sources of energy, they could help reduce U.S. emissions of greenhouse gases by lowering consumption of electricity produced from fossil fuels.

Opponents of this option assert that, far from benefiting the environment, energy production from some eligible sources causes environmental problems. For example, some analysts believe that wind turbines endanger migratory birds. Some say that the goal of promoting a cleaner environment could be achieved more efficiently by taxing polluters in proportion to the damage they cause. (Revenue Option 57, for example, which would create a capand-trade system to control emissions of greenhouse gases, would have a similar effect.)

Other observers argue that renewable electricity sources cannot contribute significantly to meeting the nation's energy needs. Many of the sources covered by the credits are not commercially viable, and their successful development will be attributable to factors beyond the tax credits, including advances in technology, higher energy prices, and the existence of other programs (such as states' renewable portfolio standards). The tax credits also could reduce economic efficiency by encouraging the use of fuels that are more expensive than fossil-fuel-based electricity production.

RELATED OPTIONS: 270-1, 270-2, 270-7, and Revenue Options 33 and 57

RELATED CBO PUBLICATIONS: Cost estimate for S. 2191, America's Climate Security Act of 2007, with an amendment, April 10, 2008; *The Economics of Climate Change: A Primer*, April 2003

Impose Fees for Use of the Inland Waterway System								
						То	tal	
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues	103	243	497	507	525	1,875	4,712	

Source: Congressional Budget Office.

Note: Fees collected under this option also could be recorded in the budget as offsetting collections (discretionary) or offsetting receipts (usually mandatory), depending on the legislative language used for their establishment.

The Army Corps of Engineers spent about \$960 million in 2008 on the nation's system of inland waterways. About 45 percent went to construction of new navigation channels, locks, and other infrastructure, and about 55 percent paid for operation and maintenance of existing infrastructure. Current law allows up to half of the Corps's new construction on inland waterways to be funded with revenues from the tax on fuel consumed by towboats that use most segments of the system. The Corps receives general funds for the remaining costs of construction and for operation and maintenance.

This option would set fees that were high enough to cover all costs for construction and for operation and maintenance of inland waterways. Those fees—which could take the form of higher fuel taxes, charges for the use of locks, or assessments based on shipments' weight and distance traveled—would generate revenues of \$103 million in 2010 and about \$1.9 billion over five years. (Because excise taxes reduce the tax base of income and payroll taxes, higher excise taxes would lead to reductions in revenue from income and payroll taxes. The estimates shown here reflect those reductions.)

The principal rationale for this option is that it would increase economic efficiency. Imposing fees on the basis of the actual cost associated with keeping the inland waterway system open would encourage shippers to choose the most efficient routes and modes of transportation (which in some cases might involve shipping via another method or route). In addition, more efficient use of existing waterways could alleviate congestion and perhaps curtail the demand for new construction. Setting the fees to cover costs also would send market signals that could help the Corps identify which additional construction projects would be likely to provide the greatest net benefits to the public.

The effects of such fees on efficiency would depend largely on whether they were set at the same rate for all segments of a waterway or were based on each segment's operating costs. Because costs vary dramatically from one segment to another, systemwide fees would offer weaker incentives for the efficient use of resources.

A rationale against this option is that higher fees might slow economic development in some regions that depend on waterway commerce. Although the increase could be phased in to ameliorate those effects, doing so would reduce revenues in the near term. Imposing higher fees also would reduce the income of barge operators and shippers in some areas, although those losses would be small in the context of overall regional economies.

RELATED OPTION: 400-7

RELATED CBO PUBLICATION: Paying for Highways, Airways, and Waterways: How Can Users Be Charged? May 1992

Charge for Examinations of State-Chartered Banks								
						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues	97	98	99	100	102	497	1,037	
Source: Congressional Budget Office.								

Federal bank supervision consists of monitoring an institution's activity and financial condition to ensure its safe and sound operation and to assess risks to the government's Deposit Insurance Fund. Although nationally chartered banks and savings associations pay assessments for that federal supervision, state-chartered banks do not.

This option would charge state-chartered banks to cover the cost of their examinations by the Federal Reserve and the Federal Deposit Insurance Corporation (FDIC). Charging the 5,500 state-chartered banks for examinations (about 900 of them are supervised by the Federal Reserve and about 4,600 are supervised by the FDIC) would increase the revenues remitted to the Treasury by the Federal Reserve by \$97 million in 2010 and by \$497 million over five years. The collections by the FDIC would help offset the costs of the examinations, which now are funded by deposit insurance premiums. Any fees the Federal Reserve charged banks would lead to reductions in revenues from corporate income taxes. The estimates shown here reflect those reductions.

The primary advantage of this option is that it would bring more uniformity to federal treatment of insured financial institutions. By assessing the fees, the FDIC could cover its examination costs without using resources from the Deposit Insurance Fund, thus making the cost of deposit insurance for nationally chartered and statechartered depositories more equitable.

A disadvantage is that the fees could result in somewhat higher costs for state-chartered banks because the banks already pay examination fees to state regulatory agencies. Imposing examination fees on state-chartered banks might lead some to apply for national charters, however, depending on the amount of the new fees and the benefits of a national charter. In particular, national banks' charters allow banks that conduct interstate business to do so under one set of regulations and consumer protection laws. (The Congressional Budget Office's estimates incorporate an assumption that the number of statechartered banks examined by the Federal Reserve and the FDIC will remain constant over the period.) This option would not completely level the playing field because bank holding companies and the U.S. operations of foreign banking organizations would still pay no assessments to the Federal Reserve, their primary regulator.

## Charge Transaction Fees to Fund the Commodity Futures Trading Commission

						To	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	113	116	118	119	122	588	1,255

Source: Congressional Budget Office.

Note: Fees collected under this option also could be recorded in the budget as offsetting collections (discretionary) or as offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

The Commodity Futures Trading Commission (CFTC) oversees and regulates trading in commodity and financial futures and options. Some of the most actively traded securities, such as interest rate and stock market index derivatives, are listed on exchanges regulated by the CFTC. Many of those securities and markets are similar to those under the supervision of the Securities and Exchange Commission (SEC). Currently, the SEC's operating costs are defrayed by fees on transactions involving the securities it regulates. The CFTC, by contrast, is funded from general tax revenues and it charges no fees.

This option would assess fees on transactions in securities regulated by the CFTC. The fees would be based on transactions in futures and options contracts in proportion to trading volume or relative costs to the CFTC, adjusted periodically by lawmakers to cover the agency's operating costs. For this option, gross receipts from the fees are set to equal the agency's projected operating costs, whereas the estimated increases in revenues incorporate the effect that the fees would have in reducing the tax bases for income and payroll taxes. On the basis of trading volumes reported by the CFTC for 2008, a uniform fee of about 4 cents per transaction would be sufficient to cover the agency's 2010 operating costs (excluding effects on income and payroll taxes). However, because a uniform per-transaction fee could distort market activity by driving out trades on options with very low market prices, a fee structure could be developed on the basis of the value of each transaction involving options and a

uniform per-transaction fee on futures. (Futures contracts typically have a value of zero at their inception. The contracts' terms are set so that the expected gains and losses to both parties are zero.) That alternative would require tracking the value of options that are traded, a practice not currently in place in the markets. This option would provide \$113 million in revenues in 2010 and \$588 million between 2010 and 2014.

A primary advantage of this option is that it would require participants in markets regulated by the CFTC to fund the cost of oversight. It also would align the costs of regulating similar transactions serving the same economic purpose—for example, a trade involving a security in the cash market (for which the SEC charges fees) and a comparable trade in the derivatives market (for which the CFTC does not)—with the entities that benefit from the efficient performance of those markets.

The main disadvantage of this option is the possibility that assessing transaction fees on securities traded in the United States could induce some traders to move to foreign markets. High-volume futures traders would face significantly increased transaction costs under this option. Transaction costs can be as little as 25 cents per contract for traders who handle more than 50,000 contracts per month. Consequently, a fee of 4 cents on each contract would represent a relatively large percentage increase in costs.

## Charge Fees to Offset the Cost of Federal Rail Safety Activities

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	0	80	162	165	168	574	1,501

Source: Congressional Budget Office.

Note: Fees collected under this option could also be recorded in the budget as offsetting collections (discretionary) or offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

According to the Office of Safety Analysis of the Federal Railroad Administration (FRA), U.S. freight and passenger trains traveled almost 800 million miles in 2008. The FRA is responsible for protecting railroad employees and the public by ensuring the safe operation of the nation's passenger and freight railroads. The FRA establishes standards and procedures, issues regulations, conducts drug testing of railroad employees randomly and after accidents, provides technical training to railroad workers, and manages highway grade-crossing projects. The Federal Railroad Safety Act of 2008 (Public Law 110-432) mandated a 50 percent increase over a five-year period in the number of FRA field safety inspectors whose job it is to enforce federal safety regulations and standards.

This option would impose fees on passenger and freight railroad companies to offset the costs of the FRA's rail safety activities. The Omnibus Budget Reconciliation Act of 1990 had required railroads to pay fees to cover the administrative and enforcement costs of carrying out FRA's mandated safety activities. Those fees expired in 1995; since then, the FRA's activities have been funded by general funds. A fee of about 30 cents for each mile traveled on freight and passenger railroads (assuming the 2008 figure remained constant) would be about sufficient to cover the cost of the FRA's rail safety activities. Allowing 18 months to implement the program, receipts would total about \$575 million over five years. (Because excise taxes reduce the tax base of income and payroll taxes, higher excise taxes would lead to reductions in revenue from income and payroll taxes. The estimates shown here reflect those reductions.)

The main rationale for assessing the fees is that the users who benefit most from rail safety—passengers and freight shippers—should pay for it. Moreover, as in the past, user fees would relieve the general taxpayer of some of the burden of funding the FRA's rail safety programs.

A rationale against reinstating the fees is that, although passengers, shippers, and railroad employees benefit from the FRA's safety activities, there also is a public benefit. Opponents of this option point out that charging railroads for the cost of regulating safety might dissuade them from undertaking voluntary improvements that require regulatory approval.

RELATED OPTIONS: 400-3 and 400-6

RELATED CBO PUBLICATION: Freight Rail Transportation: Long-Term Issues, January 2006

## Increase Registration Fees for the Federal Aviation Administration

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	17	35	36	38	38	164	377

Source: Congressional Budget Office.

Note: Fees collected under this option also could be recorded in the budget as offsetting collections (discretionary) or as offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

The Federal Aviation Administration (FAA) runs a large regulatory program designed to ensure the safety of air travel. Among its other activities, the FAA oversees and regulates the registration of aircraft and the licensing and medical certification of pilots. Under current law, there is no charge for some licenses and certificates, and others are issued at charges well below the agency's costs. The current fee to register an aircraft is \$5, for example, but the FAA estimates its cost to provide that service is closer to \$130. Airmens' certificates are free, although the FAA estimates the cost of issuing them at \$50 apiece.

This option would increase or impose fees to cover the costs of the FAA's regulatory services. Those changes could increase receipts by \$17 million in 2010 and by \$164 million over the period from 2010 to 2014. (Because excise taxes reduce the tax base of income and payroll taxes, higher excise taxes would lead to reductions

**RELATED OPTION: 400-6** 

in revenue from income and payroll taxes. The estimates shown here reflect those reductions.) The net budgetary effect would be somewhat smaller if the FAA needed additional resources to establish and administer the fees.

The primary rationale for this option is that it would allow the FAA to recover the costs of issuing certificates and licenses at a relatively modest cost to users—especially compared with the total cost of owning an airplane. The charges would be analogous to the fees for registering an automobile or obtaining a license to drive.

A drawback of this option is that higher regulatory fees might impose a burden on some aircraft owners and operators, although that effect could be lessened by setting registration fees according to the size or value of an aircraft rather than on the basis of the FAA's costs.

### Finance the Food Safety and Inspection Service Solely Through Fees

						То	tal
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019
Change in Revenues	884	902	918	936	959	4,599	9,853

Source: Congressional Budget Office.

Note: Fees collected under this option also could be recorded in the budget as offsetting collections (discretionary) or as offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

The Food Safety and Inspection Service (FSIS), an agency within the Department of Agriculture (USDA), employs some 7,800 inspectors who regulate the safety and labeling of the nation's commercial supply of meat, poultry, and processed egg products. Under current law, at least one inspector must be present at all times when a meat or poultry slaughtering plant is in operation. In addition to sampling and testing meat and poultry products, inspectors monitor processing plants daily for adherence to regulations that govern sanitary conditions, ingredients, and packaging, for example. The FSIS also has been directed to protect the nation's meat and poultry supply from attacks by bioterrorists. The agency receives most of its funding through annual appropriations, which in 2009 came to \$972 million. (Inspections during holidays or on overtime shifts are paid for by user fees.)

This option would finance all federal inspections of meat, poultry, and processed egg products with fees paid by the processing facilities. The change would increase federal revenues by \$884 million in 2010 and by almost \$4.6 billion over five years. (Because such fees reduce the tax base of income and payroll taxes, the new fees would lead to reductions in revenue from income and payroll taxes. The estimates shown here reflect those reductions.) The President's 2010 budget contains a proposal to add a user fee to help finance FSIS activities, but not to the extent considered here.

An argument in favor of this option is that users of government services should pay for them. Federal inspections benefit producers and consumers of meat and poultry products because they prevent diseased animals and adulterated egg products from being sold as food. But the meat and poultry industries also benefit in other ways. For example, they can advertise that their products have passed USDA inspection, which some consumers would consider an important affirmation.

An argument against this option is that the federal government should protect the public at large through inspections of the safety of the nation's food supply, and therefore it should be the taxpayers' responsibility to pay for those inspections.

Establish New Fees for the Food and Drug Administration								
						Total		
(Millions of dollars)	2010	2011	2012	2013	2014	2010-2014	2010-2019	
Change in Revenues	45	48	51	54	56	254	586	

Source: Congressional Budget Office.

Note: Fees collected under this option also could be recorded in the budget as offsetting collections (discretionary) or as offsetting receipts (usually mandatory), depending on the specific legislative language used in establishing the fees.

The Prescription Drug User Fee Act of 1992 authorized the Food and Drug Administration (FDA) to collect fees from drug manufacturers to help speed the review of applications for approval and marketing of new brandname drugs and biologic products. (The program was reauthorized in 2007.)

This option would establish two sets of fees to enable the FDA to recover its costs, at current workloads, for reviewing applications filed by manufacturers of generic drugs and for reviewing the promotion of brand-name drugs and biologic products to physicians (a practice known as physician detailing) and to consumers. Together, the fees would boost federal revenues by \$45 million in 2010 and by \$254 million through 2014. (Because such fees reduce the tax base for income and payroll taxes, the new fees would lead to reductions in revenue from those taxes. The estimates shown here reflect those reductions.)

Currently, a manufacturer seeking to market a generic drug files an abbreviated new-drug application with the FDA's Office of Generic Drugs. That office determines whether the drugmaker has sufficiently demonstrated the similarity of its product to the brand-name drug. The FDA's workload for processing such applications has expanded: In 2003, it received 479 applications; by 2007, that number had climbed to 880. Under the first portion of this option, the Secretary of Health and Human Services would set a fee either for each application submitted or for each generic drug on the market. Imposing the fee to fund the current workload of the Office of Generic Drugs would increase revenues, on net, by \$33 million in 2010 and by \$185 million through 2014. The President's budget for 2010 also proposed collecting fees from manufacturers of generic drugs.

The second portion of this option concerns the FDA's regulation of the promotion of prescription drugs. The Food and Drug Administration Amendments Act of 2007 created voluntary user fees for the advisory review of direct-to-consumer television advertisements, but funds for that program were not appropriated and it was never implemented. This option would fund all work of the FDA's units that regulate physician detailing and direct-to-consumer advertising of prescription drugs and biologic products. The Secretary would set the new fee either by the product or by the advertisement, increasing federal revenues, on net, by \$12 million in 2010 and by \$69 million through 2014.

Proponents of this option assert that the FDA's regulatory activities benefit consumers and manufacturers by certifying the safety and efficacy of prescription drugs. Under the new system, businesses and consumers would bear more of the costs of bringing those products to market, thereby encouraging efficient decisionmaking. Moreover, the fees might curtail physician detailing and direct advertising to consumers. Some analysts would argue that any resulting reduction could be beneficial because drug promotion tends to favor newer, more expensive drugs (with side effects that perhaps are not yet fully understood) over older, less expensive drugs.

A disadvantage of this option is that the new fees could deter manufacturers from entering the market for generic drugs and possibly spur somewhat higher prices for drugs that do reach the marketplace. In addition, a decrease in physician detailing and advertising to consumers could lead to the loss of important channels through which useful information about new drugs reaches physicians and the public. APPENDIX

# **Contributors to This Volume**

Il divisions of the Congressional Budget Office (CBO) contributed to this report, which was coordinated by Kate Kelly and Meaghan Mann. Technical assistance was provided by Albert DuPree and Keisuke Nakagawa. The staff of the Budget Analysis Division, under the supervision of Peter Fontaine, Theresa Gullo, Kim Cawley, Jeffrey Holland, Sarah Jennings, and Sam Papenfuss, prepared the spending estimates that appear throughout the report. The staff of the Joint Committee on Taxation prepared most of the revenue estimates. Paul Cullinan wrote Chapter 1. Many other people at CBO helped prepare the options:

### **Chapter 2 (Spending Options)**

Nabeel Alsalam of the Health and Human Resources Division, Matthew Goldberg of the National Security Division, David Moore of the Microeconomic Studies Division, and David Torregrosa of the Macroeconomic Analysis Division coordinated the work of the chapter, under the supervision of, respectively, Bruce Vavrichek, J. Michael Gilmore, Joseph Kile, and Robert Dennis. Theresa Gullo and Amber Marcellino prepared the pages that introduce each budget function. The following analysts contributed to the options or budget estimates:

Adebayo Adedeji	Justin Falk
Nabeel Alsalam	Kathleen FitzGerald
Leigh Angres	Daniel Frisk
Christi Hawley Anthony	Matthew Goldberg
Bruce Arnold	Heidi Golding
David Arthur	Mark Grabowicz
David Austin	Kathleen Gramp
Perry Beider	Raymond Hall
Michael Bennett	Gregory Hitz
Patrick Bernhardt	Janet Holtzblatt
Jared Brewster	Daniel Hoople
Sheila Campbell	David Hull
Megan Carroll	Justin Humphrey
John Chin	Rob Johansson
Chad Chirico	Deborah Kalcevic
Kent Christensen	Wendy Kiska
Sheila Dacey	Eric Labs
Molly Dahl	James Langley
Scott Dennis	Frances Lussier
Kevin Eveker	Amber Marcellino

Chapter 2 Contributors (Continued)	Dawn Sauter Regan
Susanne Mehlman	Deborah Reis
Noah Meyerson	Matthew Schmit
Jonathan Morancy	Jessica Sherry
Carla Tighe Murray	Michael Simpson
Nathan Musick	Julie Somers
Keisuke Nakagawa	Aurora Swanson
David Newman	Adam Talaber
Sam Papenfuss	Natalie Tawil
Allison Percy	David Torregrosa
John Peterson	Derek Trunkey
Amy Petz	Philip Webre
Matthew Pickford	Jason Wheelock
Paige Piper/Bach	Susan Willie
Sarah Puro	Camille Woodland
David Rafferty	Dwayne Wright

## **Chapter 3**

Larry Ozanne of the Tax Analysis Division coordinated the work of the chapter, under the supervision of Frank Sammartino. The following analysts contributed to the options:

Nabeel Alsalam	Rob Johansson
Perry Beider	Amber Marcellino
Mark Booth	Athiphat Muthitacharoen
Paul Burnham	Kevin Perese
Julia Christensen	Amy Petz
Anna Cook	Kristy Piccinini
Scott Dennis	Sarah Puro
Grant Driessen	William Randolph
Barbara Edwards	Kurt Seibert
Zachary Epstein	Joshua Shakin
Justin Falk	David Torregrosa
Jennifer Gravelle	Steven Weinberg
Pamela Greene	David Weiner
Ed Harris	Ellen Werble
Janet Holtzblatt	Susan Willie

### **Editing and Production**

Kate Kelly edited the report, and Christine Bogusz, Loretta Lettner, Leah Mazade, and Sherry Snyder proofread it. Maureen Costantino designed the cover and prepared the report for publication, with assistance from Allan Keaton, Donald Price, and Rick Quatro. Lenny Skutnik printed the initial copies, Linda Schimmel coordinated the print distribution, and Simone Thomas handled the electronic distribution through CBO's Web site (www.cbo.gov).