Would a Consumption Tax Favor the Rich?

R. Glenn Hubbard

Many chapters in this volume discuss the pros and cons of specific options for fundamental tax reform. It is helpful as well to consider the basic sources of efficiency gains from tax reform—income gains of as much as 9 percent (Altig et al. 2001). The bulk of these gains are achieved by reducing the burden of capital income taxation, which arises from the multiple layers of taxation on certain forms of productive business investment. Capital income taxation is also at center stage in the complexity of the present tax system (for example, measurement of capital gains and depreciation and the numbing complexity of tax rules governing multinational companies).

President George W. Bush has pursued an agenda of reducing the efficiency and complexity costs associated with capital income taxation. Yet fundamental tax reform—moving from the current tax system to a broad-based income tax or consumption tax with a simpler structure and lower marginal rates—would be on the watch list for 2005 even without the president’s interest. Part of this emphasis reflects the concerns of economists and policy mavens that tax reform could improve the efficiency of the economy and generate extra income for U.S. citizens. But practical factors in the real world of policy debates loom much larger—the perceived declining competitiveness of U.S. firms, the low rates of saving by most Americans, and the growing reach of the alternative minimum tax into millions of middle-income households.

These real-world pressures supported President Bush’s tax cuts of 2001, 2002, and 2003. By means of his tax cuts and discussions of tax reform, President Bush has quietly made the case for a simpler tax system that
would remove or at least sharply reduce the current-law tax bias against saving and investment. Indeed, the president’s framing of the tax reform debate has corralled the real-world pressures for reform into a discussion of a consumption tax as a way of flushing out the familiar “simpler, fairer, fatter” goals of tax reform. And one would hope that this discussion will focus on how to broaden the tax base to make the marginal tax rates on investment (and work and entrepreneurship) as low as possible.

So, if capital income taxation is the “elephant in the room” of tax reform discussions, why is fundamental tax reform so difficult to accomplish? This framing will likely provoke loud outcries that consumption-based tax reform is unfair or, in the language of economists, “regressive.” An understanding why these cries are greatly exaggerated reveals not only insight into how tax reform works, but also how it is likely to emerge in the political discussion.

One “fairness” concern about any fundamental tax reform that would broaden the tax base and reduce marginal tax rates is that top rate reductions would benefit only a handful of affluent taxpayers. This “snapshot” distributional analysis calls to mind the imagination of Tevye the Milkman in *Fiddler on the Roof*, who in the song “If I Were a Rich Man” thinks of one staircase for just going up and another for just going down. But in the same way that actual staircases allow for both upward and downward mobility, the tax system sees considerable income and tax rate mobility on the part of households. As a result, the reductions in marginal rates made possible by tax reform would affect many more individuals than a snapshot suggests.

In 2003, the White House Council of Economic Advisers used Treasury Department data on households for the years 1987–96 to study how households change income tax brackets over time (see Council of Economic Advisers 2003, exhibit 5.4). More specifically, the economists used the data to ask what tax rates households would have faced had President Bush’s signature Economic Growth and Tax Relief Reconciliation Act of 2001 been in place over this period. The tabulations revealed that more than half of taxpayers were in a different tax rate bracket at the end of the period and that the upward and downward mobility was significant: Two-thirds of taxpayers in the lowest bracket had moved to a higher bracket after ten years, and four times more taxpayers were subject to one of the top two tax rates in at least one of the ten years than was indicated by the initial snapshot.
But the much more significant “fairness” concern about tax reform in the form of a consumption tax is the claim that such a tax would exempt income from saving from tax. To the extent that higher-income and wealthier households save more (both absolutely and relative to their income), a shift to a consumption tax would confer much larger gains to the higher-income and wealthier taxpayers. Such an argument is intuitive—but wrong. A broad-based consumption tax need not be more regressive than a broad-based income tax. The real challenge for tax reform is to accomplish either one.

The “Fairness” of Consumption Taxation

Critics often claim that, as a tax base, consumption is less fair than income, because the benefits of not taxing capital income accrue to high-income households. As is often noted, this claim depends critically on the time frame for analyzing fairness; consumption taxes may be less regressive from a lifetime perspective than from an annual perspective. The truth is that, despite the common perception that consumption taxation eliminates all taxes on capital income, consumption and income taxes actually treat similarly much of what is commonly called capital income. Not all capital income escapes the consumption tax. In principle, capital income can be decomposed into four components: (1) the risk-free interest rate (the return to waiting); (2) the expected risk premium for investing (the return to risk taking); (3) returns to market power, entrepreneurial skill or ideas (what economists call economic profit); and (4) a remainder that reflects good or bad luck. For most investments, the income tax base—but not the consumption tax base—includes the first component of capital income; both tax bases treat the last three components of capital income similarly. Relative to an income tax, a consumption tax exempts only the tax on the opportunity cost of capital.

I focus here on a set of plausible and widely discussed prototypes of tax reform. Moving from the current U.S. tax base to a broad-based consumption tax base encompasses two reforms: (1) a move from the current income tax to a broad-based income tax with uniform capital taxation (as under the Treasury Department’s 1992 proposal of a comprehensive...
business income tax), and (2) a switch from this pure income tax base to a consumption tax base (as under the flat tax of Hall and Rabushka). The short-run and long-run distributional consequences of moving from the current tax system to a consumption tax may differ in significant ways. In the short run, eliminating differential capital taxation would affect asset prices, favoring assets that are currently heavily taxed, such as corporate capital, over assets that are lightly taxed, such as housing. The short-run effects of switching from an income base to a consumption base may depend heavily on transition rules. And the short-run distributional consequences of changes in asset prices depend critically on the current pattern of assets holding in the economy and the horizon over which different people plan to hold their assets.

A central question for distributional analysis is which savers earn higher returns. For example, for a given level of wealth, investors whose returns mainly consist of risk-free returns on savings would benefit more than investors whose returns include returns to risk taking or rents from entrepreneurial activities. But how many very wealthy taxpayers earned their fortunes by saving up risk-free returns?

Comparison of Income and Consumption Taxes

It is useful to begin by comparing two benchmark taxes: a pure uniform-rate income tax and a subtraction-method value-added tax (or combination of a wage tax and a business cash-flow tax at the same rate). A pure uniform-rate income tax has a base that includes all forms of labor and capital income and a flat rate. This system would tax corporate and noncorporate capital at the same total tax rate. One way to implement such an income tax would be to combine a business-level tax (for both corporate and noncorporate firms) on receipts, less wages, materials costs, and capital depreciation, with a household-level tax on wages. For simplicity, suppose that the business and household taxes are imposed at a flat rate; that the two tax rates are the same; that no tax-favored ways of holding wealth are available; and that the economy is closed to capital flows. Abstracting from risk considerations, the revised income tax system, then, has three components: (1) a wage tax, (2) a tax on returns from
break-even investment projects, and (3) a cash-flow tax on returns from existing capital and highly profitable investment projects. Within the context of broad-based income tax reform, Treasury’s comprehensive business income tax (CBIT) proposal generally followed this model (U.S. Department of the Treasury 1992).

In a subtraction-method value-added tax (VAT), each business has a tax base equal to the difference between receipts from sales of goods and services and purchases of goods and services from other businesses. This measure of value added is then taxed at a fixed tax rate. Transactions among businesses generate offsetting increases in the tax base of sellers and decreases in the tax base of buyers, so that no net revenue accrues to the government. Net revenue arises when goods are sold by a business to a nonbusiness entity, generally households. Because the aggregate business tax base equals the aggregate sales by businesses to nonbusinesses, the tax base is equivalent to aggregate consumption. As long as tax rates are uniform, this subtraction-method value-added tax is equivalent to the familiar European-style credit-invoice value-added tax.

A uniform tax could be achieved by equivalently allowing a deduction for wages at the business level with wage taxation at the same rate for individuals (as in the Hall-Rabushka flat tax). Thus the VAT can be envisaged as a combination of a wage tax and a tax on business cash flow. With this alternative means of administration, the consumption tax strikingly resembles the benchmark income tax. The difference between the two taxes, if one abstracts from the treatment of losses, is that the income tax base depreciates capital expenditures and the consumption tax base deducts capital outlays.

**Riskless Returns to Capital: What Is Taxed?** Traditional descriptions of the taxation of capital income under a cash-flow tax or consumption tax assume that all income from capital is exempt. For example, assume that investment projects offer a single riskless rate of return. Then decompose the base of the flat tax into two parts: The first is a business cash-flow tax whose base is \( R - I \), where \( R \) is receipts from sales of goods and services less purchases for labor, raw materials, and services, and \( I \) is expenditure on capital goods. The second is a wage tax, whose base is wages, \( W \). (The subtraction-method VAT combines the two pieces, with a base equal to
The wage tax burden is borne by labor, but who bears the burden of the cash-flow tax?

Under the cash-flow tax scheme, taxes would no longer affect business investment decisions. The present value of one dollar's worth of depreciation deduction would be one dollar, whereas under the income tax the present value is less than one dollar. The present value of depreciation allowances depends on the depreciation schedule prescribed by the tax code for the firm's assets and the discount rate that the firm uses to discount the future tax savings from the depreciation allowances. Hypothetically, depreciation schedules reflect the useful life of different assets. In a riskless investment project, the tax savings from depreciation allowances represent riskless cash flows that the firm would discount at the risk-free rate of interest.

For a break-even investment—one in which the expected rate of return just equals the interest rate—the upfront subsidy to investment provided by expensing just equals the expected future tax payments. *It is only in this sense that the return to capital is not taxed under the cash-flow tax (or, equivalently, under the consumption tax).*

**Entrepreneurial Returns: What Is Taxed?** The example assumed a single riskless return on investment projects. Now suppose that, in addition to having access to riskless investments, certain entrepreneurs have access to very profitable investments in which profits are associated with ideas, managerial skill, or market power.

Extending the example, what is taxed are rates of cash flow in excess of the riskless rate of return. Cash flows representing entrepreneurial rents are taxed equivalently under the broad-based income tax and the cash-flow tax (or consumption tax). As long as the scale of entrepreneurial projects with rents is limited, the tax savings from expensing should be invested in another riskless asset. For entrepreneurial projects, then, only the component of the return representing the riskless rate is untaxed under the cash-flow tax (or consumption tax).

**Risky Investment: What Is Taxed?** Introducing risk adds two complications. First, risky investments have a higher required rate of return than riskless investments, reflecting a risk premium to compensate savers for
bearing risk. Second, risky investments generate—after the fact—high or low returns to investing. In the actual distribution of capital income across households, some variation reflects this good or bad fortune. The component of capital income that represents luck after a risky investment decision has been made can be treated like the rents in the benchmark income tax and cash-flow tax. Actual realized returns in excess of the expected return are taxed under both the income tax and the cash-flow tax. Assuming similar loss offset provisions, low realized returns also generate the same tax consequences under the two systems.

Whether either tax system levies a tax on the risk premium depends on how one defines a tax. If a tax is defined as an increase in expected government revenues—the definition economists generally prefer—then both the income tax and the cash-flow tax include the risk premium. If, by contrast, a tax is an increase in the discounted present value of government revenues, then neither tax system includes the risk premium. This distinction is most easily seen for a cash-flow tax with full loss offsets. By levying such a tax, the government shares equally in the costs and revenues of investment projects. This feature of the tax system prompts the analogy of the government as a “silent partner” in the investment. Suppose that the government taxes two projects with the same costs but with different expected returns (because one project is riskier than the other). Like private investors, the government would expect a higher return on its investment (cost sharing) in the riskier project. However, assuming that the expected returns compensate for the risk, the “market value” of this extra expected revenue would be zero, because it compensates the government for the added riskiness of the revenue stream. There is no free lunch—the government does not increase the discounted present value of its revenue by taxing pure risk.

In contrast to the cash-flow tax, an income tax provides depreciation allowances rather than expensing for capital purchases. This difference does not affect the treatment of the uncertainty about costs and revenues, as long as the two tax systems have similar loss-offset provisions. By providing depreciation allowances rather than expensing, the government pays a smaller share of the cost of investment projects, because the investor recoups the government’s “share” of the cost in the future rather than at the time of the outlay. The present value of the loss to the investor
(and, conversely, the gain to the government) depends on how the tax savings from depreciation allowances should be discounted. As long as tax rates do not change, the government’s promise of depreciation allowances gives the investor a safe, predictable cash flow, which warrants discounting at the default risk-free rate of return. Thus the benchmark income and consumption taxes treat the return to risk taking similarly.

Putting these arguments together, what is often called the return to capital can be thought of as the sum of the riskless return (return to waiting), entrepreneurial returns (economic profits), and a risk premium on risky investments (payment for bearing risk) and realizations on risky investments (luck). Unlike the consumption tax base, the income tax base includes the opportunity cost of capital, which equals the rate of return on a marginal riskless project. Assuming the consumption tax does not change the rate of return on investment, for investments with the same opportunity cost the owner of the investment with a high rate of return will pay more in taxes than the owner of the investment with a lower rate of return. Because households that save benefit from eliminating the tax on the opportunity cost of capital, they benefit from this tax reform. However, because entrepreneurial returns are still taxed, the distributional effects also depend on separating “opportunity cost” returns to saving from entrepreneurial returns and returns to risk taking.

**Shifting the Tax Base from Income to Consumption**

A major focus of the political discussion of the incidence of a consumption tax is the transitional redistribution accompanying a switch from an income tax to a consumption tax. Within the familiar life-cycle framework, part of the gain in economic well-being accompanying the tax reform is attributed to a transition tax, borne disproportionately by the elderly in the conventional life-cycle setting. The elderly accumulate assets to finance retirement consumption under the income tax regime, but now they must pay tax again on those funds as they are used to purchase goods and services. The extent to which the elderly bear this burden depends on the change in the after-tax price of consumption from switching tax bases. In part, the after-tax price of consumption depends
on the general price level effects of tax reform, which, in turn, may depend on the administration of tax reform. If the transition tax stems only from disallowing depreciation allowances and not from a one-time increase in the price level, then the elderly bear the tax only to the extent that they own a disproportionately large share of assets that lose their depreciation allowances. There is another significant consideration, however: Consumption taxes offer higher expected future (after-tax) returns to saving. Thus to the extent that the transition tax is borne by individuals with relatively long future consumption horizons, the consumption tax may make even households bearing the transition tax better off. Yet decomposing capital income into its components suggests that the higher expected future (after-tax) returns to saving applies only to a small component of observed returns.7

Eliminating the Differential Taxation of Capital Income

The broad-based income tax assumed by the benchmark described earlier bears only a faint resemblance to the current U.S. tax system. An important difference between the two is the current system’s differential taxation of capital income. Most prominent is the double taxation of equity-financed corporate investment created by the existence of a separate corporate income tax (although this bias was reduced by the 2003 tax legislation). Moreover, variation in the generosity of depreciation allowances across assets generates differences in the effective tax rates across investments. In addition to the corporate tax, many provisions of the individual tax code also produce differential taxation, such as differential tax rates on capital gains and dividends, the nontaxation of the implicit returns from consumer durables, the exemption from tax of interest on state and local government bonds, and various provisions to encourage retirement saving.

Again, a consumption tax is only one method of uniform capital income taxation. Such taxation can also be achieved (albeit at a somewhat higher rate) by reforming the income tax system—for example, the Treasury Department’s comprehensive business income tax proposal eliminated most of the main forms of differential capital taxation. Thus the distributional
issues associated with eliminating differential taxation are not unique to a consumption tax but can apply to income tax reform.

**Distributional Consequences of a Consumption Tax**

After studying U.S. household-level data, Gentry and Hubbard (1998) concluded that the switch from a pure income tax to a consumption tax is likely to be less regressive than commonly assumed. Despite the claim that consumption taxes do not tax capital income, replacing depreciation allowances with expensing only eliminated the taxation of the opportunity cost of capital and not capital income attributable to rents and luck (either good or bad). Because wealthier households receive a larger portion of what is often called their capital income in the forms treated similarly by income and consumption taxes (realized returns to risk taking and entrepreneurial returns), a consumption tax is less regressive than would be suggested by assuming that a consumption tax exempts all parts of capital income. The distributional analysis by Gentry and Hubbard suggests that more than one-third of the reduction in the share of taxes paid by very high-income households in switching from an income tax to a consumption tax is offset by this effect.

That analysis illustrates the benefits of separating the parts of tax reform inherent to taxing consumption from those associated with a broad-based income tax. For the debate over fundamental tax reform, the advantages and disadvantages of eliminating differential capital income taxation can be separated from the choice between income and consumption as the tax base. Moreover, in some cases the elimination of differential capital taxation may be the more important of the two issues.

**Getting There from Here**

Large efficiency gains are possible from fundamental tax reforms. Efficiency and simplicity gains for individuals and businesses will be greatest under a consumption tax. The counterclaim that consumption tax reform is a sop to the rich is almost certainly unfair, especially if a progressive
consumption tax like that proposed by Bradford in this volume were under consideration. But even abstracting from such considerations, the sense in which the distributional burdens of “textbook” income and consumption taxes are closer than conventionally imagined offers three lessons for the process of tax reform. First, many of the economic gains from fundamental reform can be obtained from reform of the income tax (though additional pro–business investment and pro simplification gains can be achieved by the further shift to a consumption tax). Second, following this observation, as the reform debate unfolds, “fairness” assaults on tax reform will likely take aim at pro growth changes in the income tax—reduced double taxation of savings, in particular. But such tax changes are popular. Finally, should tax reform enter the legislative process, compromises include graduated wage tax rates or a hybrid tax in which capital income is still taxed at the individual level, but at a lower rate than wage income (as is true under the 2003 tax legislation championed by President Bush). The debate on these compromises will, however, return to the question of what types of base broadening will pay for tax reform’s lower rates. That seems to be fair.
Notes

1. This chapter was prepared for the American Enterprise Institute Conference on Fundamental Tax Reform, held in Washington, D.C., February 11, 2005. The author is grateful to Alan Auerbach, Kevin Hassett, and conference participants for helpful comments and suggestions.

2. And the empirical evidence suggests that they do—see, for example, Dynan, Skinner, and Zeldes (2004) and Gentry and Hubbard (2004).

3. See, for example, Davies, St. Hilaire, and Whalley (1984); Poterba (1989); and Fullerton and Rogers (1993).


5. This argument is an old one, tracing its roots to John Stuart Mill’s evaluation of capital income taxation as inherently representing double taxation. A similar argument appears in Musgrave (1959).

6. The business cash-flow tax has a long pedigree among economists seeking to apply consumption tax principles to business taxation. An early exposition appears in Brown (1948); implementation issues are discussed in King (1975), Institute for Fiscal Studies (1978), and Hubbard (1989).

7. Much of the conventional analysis of the distributional consequences of a shift to consumption taxation emphasizes the “tax on old capital” associated with a “cold turkey” switch from an income tax to a consumption tax. As Gentry and Hubbard (1997, 1998) observe, this effect for equities is overstated. Equity prices should decline by a lesser amount and may even rise modestly in response to a consumption tax reform. This result is particularly likely in cases in which firms require a significant period of time to make new capital investments. In this instance, existing investments earn higher after-tax returns in response to the lower marginal tax rates following tax reform.

Another commonly cited transition cost relates to owner-occupied housing. As Gentry and Hubbard (1997, 1998) note, a switch from the current tax will likely depress house prices in the short run, but only modestly. The largest such declines should be concentrated in regions in which there are many homeownering households with high marginal tax rates, as in California or New York.

8. See Auerbach and Kotlikoff (1987) for an early discussion of these gains, and the introduction to this volume for a description of this literature.

9. Indeed, Altig et al. (2001) find that even the lowest income groups benefit from a switch to an X tax.
References


94 REFERENCES