

Consumption-Based Taxation in an International Setting

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by

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Mr. Chairman and Members of the Subcommittee:

I am pleased to have this opportunity to offer my views on the advantages of adopting consumption-based taxes, with a special focus on the role of such taxes in promoting a stable, competitive tax environment in an international setting. Today, I will discuss the alternative approaches to consumption taxation, the benefits of such taxes in the domestic context, their additional benefits in the international economy, and how to move toward such taxation from our current tax system. My main focus will be on the Destination-Based Cash Flow Tax (DBCFT), a tax reform that has been considered by Congress in the past and which still merits attention, given the current international tax situation. As I will discuss, the DBCFT would be a simple, pro-growth alternative to our current approach to business taxation.

THE MANY TYPES OF CONSUMPTION-BASED TAXATION

Consumption taxes can take many forms, and this often makes a simple reference to “consumption taxation” ambiguous in its meaning. What all true consumption taxes have in common is that they effectively exempt from tax the returns to saving and investment and impose taxes on private consumption, typically in a broad-based manner.

Retail Sales Taxes

Retail sales taxes are the primary form of consumption tax in the United States, imposed at the state and local level, and the simplest to understand, as taxes are imposed directly on consumer purchases at the point of sale. However, a weakness of retail sales taxes in practice is that their tax bases extend well beyond consumer goods and services to include many business-to-business sales. This move away from taxing only consumption introduces a cascading effect, arising from the imposition of the tax at different points in the production process, that raises the overall tax

rates on final consumption and distorts production decisions by encouraging vertical integration to avoid business-to-business taxes.¹

Value Added Taxes

Value added taxes (VATs) differ from retail sales taxes primarily in imposing tax at each level of production, rather than only at the retail level, with credits provided at each stage for taxes previously paid to avoid the cascading effect that plagues retail sales taxes when imposed on business-to-business transactions. Outside the United States, the VAT is a standard form of consumption tax, although it is in some cases referred to by a different name; for example, the VAT in Canada is called the Goods and Services Tax.

Flat Taxes

As originally conceived by academics Robert Hall and Alvin Rabushka,² and supported by many in the political sphere,³ the flat tax would still tax value added, and hence would be a consumption-based tax. It would be applied by separating value added into two parts, taxing the capital component of value added at the business level in the form of a business cash flow tax (a tax on business revenues with a deduction for all business expenditures, including wages and salaries and capital investment) and taxing the wage and salary component of value added at the personal level, at the same rate as the business cash flow tax but only above a substantial taxpaying threshold. This exclusion of a considerable amount of wage and salary income from taxation makes the flat tax a progressive form of consumption taxation.

Personal Expenditure or Consumed Income Taxes

The U.S. federal income tax already provides “consumption tax” treatment to certain forms of saving, notably saving for retirement through such vehicles as Individual Retirement Accounts and employer 401(k) plans, with saving in the form of contributions to such accounts being deductible from income and withdrawals for purposes of consumption being taxed.⁴ An expansion of such tax treatment to all saving would effectively convert the income tax into a tax on personal consumption expenditures, or a tax on “consumed income.” This approach to taxation has been evaluated in the academic literature⁵ and has been featured in Congressional tax proposals.⁶ An advantage of the consumed income tax is that it is based on the existing

¹ See the discussion in Alan J. Auerbach, *Consumption Tax Options for California*, Public Policy Institute of California, June 2011. <https://www.ppic.org/publication/consumption-tax-options-for-california/>

² Robert Hall and Alvin Rabushka, *The Flat Tax*, Hoover Institution Press, 1995.

³ Notably, former presidential candidate Steve Forbes and former House Majority Leader Dick Armey and former Senator Richard Shelby.

⁴ Although the timing of tax payments differs for Roth-type versions of retirement saving accounts, which provide no deduction for saving and exempt withdrawals from accounts, the economic effects are similar to those of traditional retirement accounts.

⁵ See, e.g., William D. Andrews, “A Consumption-Type or Cash Flow Personal Income Tax,” *Harvard Law Review* 87(6), April 1974, 1113-1188.

⁶ In particular, the USA (“Unlimited Savings Allowance”) Plan put forward by former Senators Pete Domenici and Sam Nunn.

income tax, although there are challenges to be overcome in designing the transition to the expanded system of incentives for saving.

DOMESTIC ADVANTAGES OF CONSUMPTION-BASED TAXATION

In the domestic context, there are two major attractions to the adoption of any form of tax based on consumption. One is the promotion of capital formation and growth, through the elimination of the tax burden on new saving and investment. This can lead to a substantial improvement in long-run living standards, even if the overall progressivity of the tax system is maintained.⁷ Another benefit, often overlooked, is the major potential simplification afforded by eliminating the need to measure capital income. The concepts of asset basis, depreciation, and amortization, the distinction between ordinary income and capital gains, and the borderline between labor income and capital income all become superfluous with the shift to consumption as a tax base. As an illustration, under the business cash flow tax that is part of the flat tax, the tax base, subject to a single tax rate, is simply revenues net of expenditures, measured on a cash basis.

Some forms of consumption-based taxation, notably the retail sales tax and value added tax, have the additional advantage of collecting all taxes from businesses, completely eliminating the need for personal tax filing and sharply reducing the number of taxpayers. But this advantage is paired with the disadvantage of not being able to have relative tax burdens vary by individual income and other family attributes.

CONSUMPTION-BASED TAXATION IN THE INTERNATIONAL CONTEXT

The domestic advantages of taxing consumption carry over when one considers the broader global economy, but the attractiveness of consumption-based taxation is considerably enhanced when one evaluates the effects of taxation on international business decisions, including the location of production and investment. The simplicity of consumption-based taxation stands in stark contrast to the enormous complexity of existing international tax provisions, and the focus on consumption as the object of taxation has the added benefit that taxation is now determined by the destination of goods and services, rather than where they are produced. This added advantage reflects the fact that the location of consumers is considerably clearer than the location where assets are used and income is generated. This reduces the ability of firms to shift profits and provides an incentive for them to locate their operations in the country adopting such an approach to taxation. These significant benefits may be illustrated by considering the

⁷ See David Altig, Alan J. Auerbach, Laurence J. Kotlikoff, Kent A. Smetters, and Jan Walliser, "Simulating Fundamental Tax Reform in the United States," *American Economic Review* 91(3), June 2001, 574-595, who find that a shift from the current income tax to a modified flat tax (with three tax brackets rather than one) would improve well-being throughout the income distribution and would increase GDP in the long run by over 6 percent.

Destination-Based Cash Flow Tax (DBCFT), as laid out in many academic writings⁸ and put forward in the initial June, 2016 House tax reform proposal.⁹

THE DESTINATION-BASED CASH FLOW TAX (DBCFT)

The DBCFT is a business cash flow tax, as already described, combined with border tax adjustments, which refund the tax that would otherwise be collected on revenues for products that are exported, and impose tax on goods and services that are imported. These combined border adjustments on imports and exports, sometimes referred to on their own as a “border adjustment tax” (BAT), are a key step in shifting the location of taxation from where items are produced to where they are consumed. Goods and services produced in the United States but exported for use elsewhere would not be taxed in the United States, and goods and services produced elsewhere but imported for consumption in the United States would be taxed in the United States. Because the tax is now based on where consumption occurs, there is no tax levied as the result of U.S. production – the tax rate on U.S. production activities is literally zero.

Moreover, border adjustments eliminate any ability of companies to shift profits out of the United States through related-party transactions, because there are no U.S. tax consequences arising from such transactions. Deductions for imported inputs from related parties are offset by the border adjustments on imports, and taxes on revenues from exports to related parties are offset by the border adjustments on exports. Hence, under- or over-valuation of transactions cannot be used to shift profits to related parties in other countries. As a consequence, there is no need any longer for transfer pricing rules or monitoring, as transfer prices are no longer relevant to the calculation of U.S. tax liability.¹⁰ Indeed, the cash flow tax calculation is even simpler than without the border adjustments, for revenues from exports and expenditures on imports can simply be ignored in measuring a company’s tax base, given that the border adjustments neutralize the tax on export revenues and the deduction for import costs.¹¹

The DBCFT has other advantages as well. First, as a tax only on business cash flows, it would be a progressive tax, with wage and salary income exempted. U.S. workers would benefit further from the wage-enhancing investment that the zero tax rate on domestic production would promote. Second, international cooperation and coercion would not be needed to make U.S. adoption of the DBCFT attractive. Making the U.S. an attractive place to invest, and eliminating the incentive to shift profits from the United States, would result from adoption, even if done

⁸ Alan J. Auerbach, *A Modern Corporate Tax*, The Hamilton Project/Center for American Progress, December 2010. <https://www.brookings.edu/articles/a-modern-corporate-tax/>, Alan Auerbach, Michael P. Devereux, Michael Keen, and John Vella, *Destination-Based Cash-Flow Taxation*, Oxford Centre for Business Taxation Working Paper 17/01, January 2017. <https://oxfordtax.sbs.ox.ac.uk/files/wp17-01pdf>, Alan J. Auerbach, “Demystifying the Destination-Based Cash-Flow Tax,” *Brookings Papers on Economic Activity*, Fall 2017, 409-432, and Michael P. Devereux, Alan J. Auerbach, Michael Keen, Paul Oosterhuis, Wolfgang Schön, and John Vella, *Taxing Profit in a Global Economy*, Oxford: Oxford University Press, 2021.

⁹ https://www.novoco.com/sites/default/files/atoms/files/ryan_a_better_way_policy_paper_062416.pdf

¹⁰ Profit shifting through other mechanisms than transfer pricing is also ineffective under the DBCFT, as discussed in Alan J. Auerbach, Michael P. Devereux, Michael Keen, and John Vella, “International Tax Planning under the Destination-Based Cash Flow Tax,” *National Tax Journal* 70(4), December 2017, 783-802.

¹¹ Auerbach, *A Modern Corporate Tax*, *op. cit.*

unilaterally. Indeed, other countries would be encouraged to follow suit, to align their own tax incentives with those of the United States in order to prevent the loss of business activities and profits.¹² In short, the DBCFT would work by making the adopting country a more attractive place to do business, not by forcing other countries to become less attractive.

Misconceptions Regarding the DBCFT

As a relatively novel proposal, the DBCFT has been subject to considerable misunderstanding on the part of policymakers, tax practitioners, and academics. Some of the most common misconceptions include the following.

*Misconception #1: The DBCFT would distort international trade through its border tax adjustments.*¹³

The adoption of border adjustments on their own might appear to make a country more competitive in international trade. But any such effect is at most a temporary one. The border adjustment on imports, on its own, by making imports more expensive, would discourage trade; by contrast, the border adjustment on exports, by making exports cheaper abroad, would encourage trade. These two effects on trade would cancel, a well-established result in international economics known as the Lerner symmetry theorem. For a country, like the United States, with a floating exchange rate, the primary result would be an appreciation of the dollar, which would serve to offset both the apparently reduced cost of exports and the apparently increased cost of imports, leaving the trade balance little changed. This is not to say that a shift to the DBCFT would have no impact on the trade balance, because the increased incentive to produce and invest in the United States could well strengthen the U.S. position with respect to its trading partners. But this would be due to the shift to consumption-based taxation, not to any direct disruption of trade flows.

A similar misconception has plagued discussions of VATs, which, like the DBCFT, include border adjustments on exports and imports, and attempts to dispel the misconception regarding the VAT have been made over the years.¹⁴ This is not to say that there would be no short-run effects on trade arising from the adoption of large border adjustments, as the process of adjustment of exchange rates and domestic and foreign prices might not occur instantaneously.¹⁵ Note, too, to the extent that other countries also adopted the DBCFT, exchange rate adjustments would be less necessary, for (if the border adjustment tax rates were comparable to those of the

¹² This is illustrated using examples in Tables 9-12 in Alan J. Auerbach and Douglas Holtz-Eakin, *The Role of Border Adjustments in International Taxation*, American Action Forum, November 2016. <https://www.americanactionforum.org/research/14344/>

¹³ The discussion here follows that in Devereux et al., *Taxing Profit in a Global Economy*, *op. cit.*, Chapter 7, and Alan J. Auerbach, *Border Adjustment and the Dollar*, American Enterprise Institute Economic Perspectives, February 2017. <https://www.aei.org/wp-content/uploads/2017/02/Border-adjustment-and-the-dollar.pdf?x91208>

¹⁴ See, e.g., Martin Feldstein and Paul Krugman, “International Trade Effects of Value-Added Taxation,” in Assaf Razin and Joel Slemrod, eds., *Taxation in the Global Economy*, Chicago: University of Chicago Press, 1990, Chapter 7.

¹⁵ See Omar Barbiero, Emmanuel Farhi, Gita Gopinath, and Oleg Itskhoki, “The Macroeconomics of Border Taxes,” in Martin Eichenbaum and Jonathan A. Parker, eds., *NBER Macroeconomics Annual 33*, 2018.

United States) the appreciation of the dollar with respect to the currencies of other adopting countries would not need to occur.

Misconception #2: As a consumption tax, The DBCFT would be a regressive tax.

As discussed above, there are many types of consumption-based taxes. The most familiar in the United States is the retail sales tax, which some argue is regressive, because expenditures on taxed items account for a large share of the budgets of lower-income families. While this argument can be overstated, because sales taxes typically include exemptions for necessities such as food and utilities, it is completely inapplicable to the DBCFT. In particular, as already mentioned, the deductibility of wages and salaries from the base of the DBCFT means that it is a tax on the earnings of businesses, just as our existing corporate income tax is, but with the added benefit of enhancing the incentive for domestic investment that can boost wages.

Misconception #3: If the United States adopts the DBCFT unilaterally, multinational companies still can engage in profit shifting at the U.S. expense.

As already discussed, adoption of the DBCFT would eliminate the opportunities for companies to shift profits out of the United States. Profit shifting opportunities would still exist with respect to other countries maintaining a more traditional tax system, but such tax avoidance would not be at the expense of the United States.

Design Issues to Consider in Adopting the DBCFT¹⁶

Among the important technical issues to be resolved in formulating the DBCFT are those that follow.

Net Operating Losses

The number of firms experiencing net operating losses could increase under the DBCFT, particularly those with substantial untaxed exports, given that domestically incurred expenses would still be fully deductible. The House Blueprint would have dealt with this issue by allowing firms to carry forward unused losses with interest. But this might not suffice for firms with significant export shares that might have persistent losses as a result. For such firms, some additional policy could be needed, with alternatives ranging from more generous treatment (such as refundability) of losses attributable to exports to a liberal policy toward transferability of losses to other taxpayers. Another potential approach would be to allow losses due to untaxed exports to offset other taxes paid by the business, notably payroll taxes.

Treatment of Financial Institutions

How should financial institutions be taxed under the DBCFT? One possible approach would be to include all cash flows associated with financial transactions (of financial and nonfinancial companies) in the tax base, retaining the current system's tax on interest received and tax deduction for interest paid, but now also taxing amounts borrowed and allowing a deduction for amounts lent. This option would have the disadvantage of requiring all companies to include

¹⁶ The discussion here follows that in Auerbach, "Demystifying the Destination-Based Cash Flow Tax," *op. cit.*

financial flows in their tax calculations. However, given that this approach would result in a large number of offsetting transactions among domestic taxpayers, one can reduce the scope of what is needed to capture the profits of financial institutions to the transactions between those institutions and domestic non-business entities.¹⁷

Pass-Through Entities

To avoid exacerbating incentives for companies to change organizational form in response to inconsistencies in tax provisions, one would want major elements of the DBCFT to apply at least to large pass-through entities as well. (The House Blueprint would have covered all such entities). To avoid distorting trade flows between corporate and pass-through sectors, the system should have the same rate of border tax adjustment for both types of entities, regardless of their regular tax rates.

Getting There from Here

The DBCFT would represent a major change in the U.S. system of business taxation. It should be noted that we took several steps in the same direction in 2017 with the Tax Cuts and Jobs Act (TCJA), notably the adoption of a territorial system of taxation and investment expensing and the introduction of the Foreign-Derived Intangible Income (FDII) reduction in the tax rate on export-derived income and the Base Erosion and Anti-Abuse Tax (BEAT) on certain related-party imports. Both FDII and BEAT may be thought of as limited border adjustments, and they were adopted for similar reasons – to reduce opportunities for profit shifting and encourage the location of assets and production in the United States. We still have a considerable distance to go, but the journey needn't be accomplished in a single step. One possible route would be to introduce the DBCFT at a low rate to run in parallel with the existing system (at a reduced rate) or, equivalently, to implement the border tax adjustment and other elements of the DBCFT within the current system, but at a tax rate substantially below the corporate tax rate. Such an introductory step would provide time to evaluate the performance of the new system and, if necessary, introduce modifications. It would also give other countries an opportunity to learn from the U.S. experience and decide whether it provides a better option than the path they are currently following.

A MORE MODEST APPROACH TO DESTINATION-BASED TAXATION

While the DBCFT is a simple, effective approach to international taxation, it remains an unfamiliar concept to many practitioners and policymakers. As just discussed, one response to this lack of familiarity would be a gradual implementation of the DBCFT, to increase understanding and confidence in the system. However, should that approach not prove feasible, there are more modest approaches that involve lesser departures from the current system but still provide some of the advantages of destination-based taxation in an international setting. One

¹⁷ This issue is discussed at greater length in Auerbach et al., *Destination-Based Cash-Flow Taxation*, *op. cit.* and Devereux et al., *Taxing Profit in a Global Economy*, *op. cit.*, Chapter 7.

such approach that I have worked with co-authors to develop is what we call the Residual Profit Allocation by Income (RPAI) approach.¹⁸

The RPAI approach would maintain the existing transfer-pricing approach for determining the profits associated with routine activities, assigning such activities a modest, fact-based rate of return in the locations in which they are performed. For a company's remaining, or residual profits, the RPAI would allocate such profits among countries in proportion to the company's net sales revenues in each country.¹⁹ The main appeal of such an approach, relative to the current system, is that it would use the destination basis to determine the location of those profits for which existing transfer pricing methods are inadequate. This not only would eliminate the ability of companies to use transfer pricing to shift these profits, but would also encourage companies to locate their profitable production activities in an adopting country, for the location of such production there would have no impact on the company's domestic tax liability.

Even the RPAI approach would involve significant changes from the current tax environment. In particular, the allocation of profits based on the location of sales would mean a departure from the current rules regarding permanent establishments, for companies could face tax liabilities even in countries in which the current PE threshold were not satisfied. In addition, the RPAI would require additional restrictions to prevent particular tax avoidance strategies, such as through resales via unrelated parties in low-tax jurisdictions.

TAX REFORM IN THE CURRENT INTERNATIONAL TAX ENVIRONMENT

Decisions about the best path forward for the United States are complicated by the current international tax reform process. The so-called "inclusive framework," promulgated by the OECD and strongly supported by the Biden Administration, has been promoted as the exclusive approach to tax reform, through a process that encourages countries to participate but also includes provisions that would coerce the reluctant to do so. The framework includes two "pillars" that would each introduce a new approach to taxing income. Pillar 1 would impose a tax based on the location of customers on a portion of profits (25 percent over a threshold of a 10 percent rate of return) earned by very large corporations. Pillar 2, which is further along in its adoption abroad, calls for countries to adopt a domestic minimum tax of at least 15 percent on a measure of income based on accounting statements, and also includes a so-called "top-up" tax, referred to as the income inclusion rule (IIR), under which countries would impose additional taxes on their resident corporations on profits earned in non-complying countries, and an undertaxed profits rule (UTPR) that would allow countries to impose taxes on corporations based in other countries that are deemed to be noncompliant.

¹⁸ Michael P. Devereux, Alan J. Auerbach, Paul Oosterhuis, Wolfgang Schön, and John Vella, *Residual Profit Allocation by Income*. Oxford University Centre for Business Taxation Working Paper 19/01, March 2019. <https://oxfordtax.sbs.ox.ac.uk/files/wp19-01pdf> and Devereux et al., *Taxing Profit in a Global Economy*, *op. cit.*, Chapter 6.

¹⁹ Net sales revenues would be calculated as sales revenues less allocable costs and a proportionate share of non-allocable costs (including the routine profits attributed to such costs).

Some of the elements of Pillars 1 and 2 overlap with U.S. tax provisions; other elements resemble alternative tax reform approaches. The IIR top-up tax is similar in nature to the Global Intangible Low-Taxed Income (GILTI) provision of TCJA, and the minimum tax shares some features with the new 15 percent corporate AMT included in the Inflation Reduction Act, which is also based on accounting income measures. The apportionment of income based on customers' location contained in Pillar 1 represents a move in the direction of the RPAI, but it applies only to a small share of income and would be imposed on a very small number of companies, many of which are based in the United States. Thus, there are elements of Pillars 1 and 2 that might, with some modification, be compatible with existing U.S. law or potentially attractive reforms. However, the inclusive framework has been presented not as a starting point, but as the only option for international tax reform, and the IIR and UTPR are designed to promote participation by countries that might otherwise not be inclined toward adoption.

The fundamental problem with Pillar 2 is that it still tries to tax income based on where that income is earned, which in the modern global economy based on international supply chains and the use of intangible assets is a daunting task. In addition, it confronts definitional problems that have already become apparent, notably which tax credits and subsidies to count as reducing taxes paid and which to treat as additional income. Despite its incentives for participation, there are many ways in which Pillar 2 may fail, either immediately or after initial adoption, so it is important to have alternatives in mind. A failure of Pillar 1, which seems even more likely, would likely bring back the digital service taxes that Pillar 1 was intended to replace, leaving the need for alternatives even more pressing. Thus, one need not, and should not, view the current international tax process as one in which the outcome has already been determined, and it would be of considerable value not only to develop alternatives, but also to move forward with them, to help speed the process of achieving a simple, stable, and efficient international tax system.