State Corporate Tax Revenue Trends: Causes and Possible Solutions

William F. Fox
The University of Tennessee, College of Business Administration, Knoxville, TN 37996-4170

LeAnn Luna
The University of North Carolina–Wilmington, Department of Accountancy and Business Law, Wilmington, NC 28403

National Tax Journal
Vol. LV, No. 3
September 2002

INTRODUCTION

States' ability to collect taxes on business, and particularly on interstate business activity, appears to be diminishing. This should not be a surprising outcome since economists have for many years recognized the difficulties for sub–national governments to collect taxes on mobile activities (see Inman and Rubinfeld, 1997, for example). Much recent attention has been paid to the revenue losses that have resulted from the inability to collect taxes on Internet sales, and in particular on business–to–business transactions (see Bruce and Fox, 2000).[1] Reduction in state taxation of specific industries such as telecommunications (through lower rates, reduced property tax assessments, and so forth) has taken place as well. Focus has shifted recently to the diminishing relative importance of corporate income taxes as a state revenue source.[2] Combined, these factors represent a significant lowering of the tax burden that is initially incident on business. This paper takes just one of these, the role of corporate income taxation, and seeks to investigate the extent to which the revenues have declined and some ways to reverse the pattern.

The paper is divided into three sections. The first is a detailed examination of the trends in state corporate income tax revenues over the past three decades. The second is a description of the underlying causes of the decline in corporate tax revenues that has been underway for more than a decade. The last is a review of alternative means of slowing or ending the decline in corporate tax revenues. The paper does not seek to comprehensively address the extent to which state corporate taxes should be levied, though this is a related and interesting part of the overall business tax story.

THE DECLINE IN STATE CORPORATE TAX REVENUES

This section is a consideration of the long–term trends in the role that corporate income taxes play in state finance. In general, corporate taxation grew in importance from the 1960s

[1] Business–to–business transactions do not belong in a properly structured consumption tax, but it is much more difficult to defend only exempting those business–to–business transactions that occur over the Internet.

[2] For examples see Mazerov (2002) and Costenbader, Guariglia, and Wilson (2002).

through the mid–1980s and has declined since. The net effect is that the relative contribution of corporate tax revenues is currently at about the same level that it was in the early 1970s. As discussed in this section, increases in corporate tax collections through the mid–1980s were primarily attributable to legislated rate increases and new states adding the tax. Relative changes in the tax base do not appear to have been an important source of the revenue changes, except for the effects of the Economic Recovery Tax Act of 1981 (ERTA) that significantly reduced the base and the Tax Reform Act of 1986 (TRA86) that significantly broadened the base. Shrinkage of the base appears to explain the general tendency over the last decade or so for revenues to erode back to the levels prevalent in the early 1970s.

Three measures are used to describe the underlying corporate income tax trends: corporate taxes as a percent of before tax corporate profits, corporate taxes as a percent of total taxes, and corporate taxes as a percent of GDP. The trend is similar in each case. Corporate tax revenues as a share of corporate profits can be thought of as an effective tax rate, though the corporate profits used here are drawn from National Income and Product Accounts (NIPA) rather than from financial accounting or tax–based approaches to calculating profits.[3] Different methods of estimating depreciation and handling stock options are among the reasons why profit levels could vary under alternative approaches to measuring profits.[4] Also, the NIPA data include profits that are earned in states that have no profits tax. Given these caveats, the effective tax rate grew nearly continuously (except for 1983–84) from 1970 until 1987 (see Figure 1), nearly doubling from 4.7 percent in 1971 to over 8.8 percent in 1986.[5] Much of the unusually high revenue during the mid–1980s appears to be attributable to tax planning associated with the Tax Reform Act of 1986 and should probably be discounted as indicative of the trend.[6] For example, companies may have timed their receipt of profits to pay taxes at the lower 34 percent rate provided by TRA86 rather than the pre–existing 46 percent rate. Effective rates only exceeded 7.13 percent in 1982, setting aside 1985–1987, suggesting that 7.1 percent is a good indicator of the maximum level that corporate taxes reached. The lower lines in Figures 1 through 3 illustrate the effective tax rates that would have occurred if there had been no rate increases and no additional states adding the tax.[7]

State corporate taxes also grew relative to GDP and total tax revenues, though the increases were less precipitous and the peaks occurred somewhat earlier. Still, the same general pattern holds. For example, corporate tax revenues grew from 8.3 percent of total state tax revenues in 1971 to 10.7 percent in 1980 (see Figure 2), and an even more dramatic change occurred be-

[3] Profits before taxes are used in the graphics shown here. The effective tax rates were also calculated using before tax profits with the capital consumption adjustment and with the inventory valuation adjustment included. The patterns of effective tax rates with and without the adjustments are generally similar over time. The correlation between the effective rates calculated using the two different profits measures is 0.77 or higher.

[4] Mackie (2000) argues that the average effective tax rate is a poor means to examine the effects of tax sheltering because the rate can move for reasons other than changes in tax sheltering and because calculation of the effective rate may fail to capture some types of sheltering.

[5] The effective rate began to increase much sooner, having risen from 2.3 percent in 1960.

[6] The effective income tax rate also appears to be high around recession years (1970, 1975, 1980, 1982, and 1990), suggesting that national income based corporate profits fall faster than corporate profits tax liabilities during recessions. However, this pattern does not appear to have occurred in 2001–2.

[7] Actual revenues were adjusted proportionately to extract the effects of rate changes, and revenues raised by new states were excluded. The calculations were made with no allowance for behavioral responses. Michigan was excluded from the calculation because of its varying from a VAT to a corporate income tax, and Alaska was excluded because of its very volatile tax revenue.

Figure 1. State Corporate Taxes as a Percent of Corporate Profits

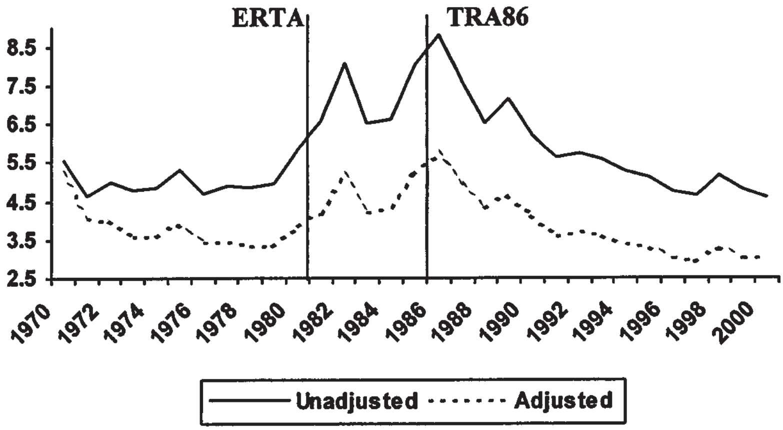
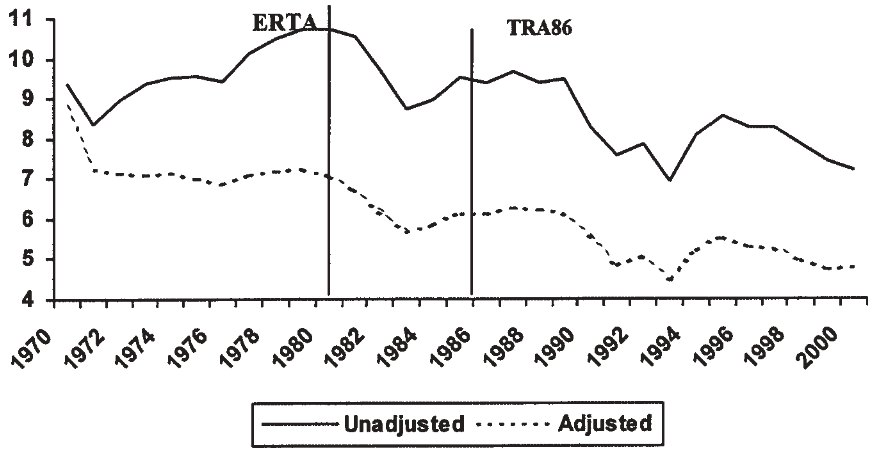


Figure 2. State Corporate Taxes as a Percent of Total Taxes



tween 1960 and 1970. Similarly, corporate profits taxes increased significantly through 1980 relative to macroeconomic measures such as GDP and have fallen sporadically since (Figure 3).

Rate hikes, new states adding the tax, and tax planning linked to TRA86 explain most of the revenue growth through the mid–1980s. Base broadening from TRA86 was also an important factor after the late 1980s (the lower lines in Figures 1–3 rose after 1986). The simple average maximum state tax rate increased from 5.60 percent in 1969 to 7.72 percent in 1993, with most of the increases having occurred by 1987.[8] State tax rates for 1968 and 2001 are listed in Table 1. Adoption of the tax by additional states also explains some of the rela-

[8] A simple average of state maximum corporate tax rates is used, with no attempt to weight by size of state. Thirteen of the 45 states with a corporate income tax impose progressive rates, but the lower rate brackets generally apply to very small profit levels.

Figure 3. State Corporate Taxes as a Percent of GDP

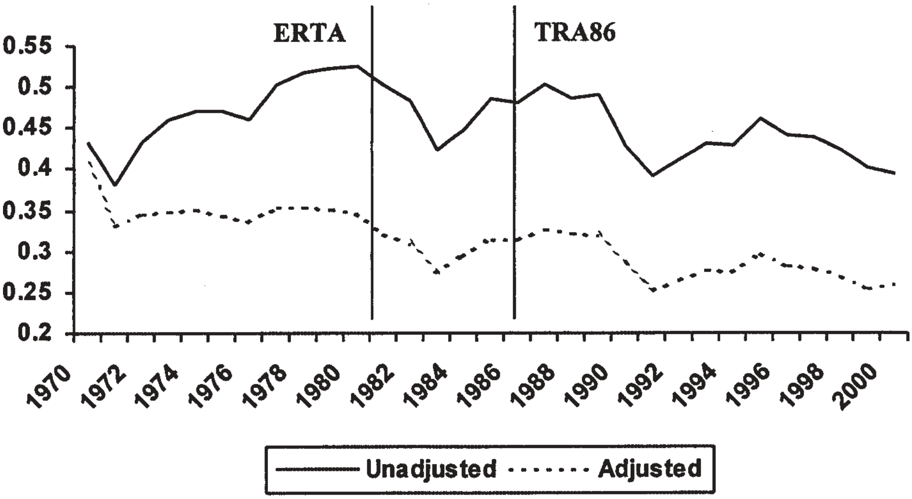


TABLE 1
STATE TOP MARGINAL CORPORATE INCOME TAX RATE

State	1968	2001	State	1968	2001
Alabama	5	6.5	Montana	5.5	6.75
Alaska	18*	9.4	Nebraska	2*	7.81
Arizona	6.6	6.968	Nevada	None	None
Arkansas	5	6.5	New Hampshire	None	8
California	7	8.84	New Jersey	3.25	9
Colorado	5	4.63	New Mexico	3	7.6
Connecticut	5.25	7.5	New York	5.5	8
Delaware	5	8.7	North Carolina	6	6.9
District of Columbia	5	9.5	North Dakota	6	10.5
Florida	None	5.5	Ohio	None	8.5
Georgia	5	6	Oklahoma	4	6
Hawaii	6.435	6.4	Oregon	6	6.6
Idaho	6	8	Pennsylvania	7	9.99
Illinois	None	4.8[1]	Rhode Island	6	9
Indiana	2	3.4[2]	South Carolina	5	5
Iowa	8	12	South Dakota	4.5	None
Kansas	4.5	4[3]	Tennessee	5	6
Kentucky	7	8.25	Texas	None	None
Louisiana	4	8	Utah	6	5
Maine	None	8.93	Vermont	5	9.75
Maryland	5.25	7	Virginia	5	6
Massachusetts	6.765	9.5	Washington	None	None
Michigan[4]	5.6	2.1	West Virginia	6	9
Minnesota	11.33	9.8	Wisconsin	7	7.9
Mississippi	3	5	Wyoming	None	None
Missouri	2	6.25			

*Tax is percentage of federal corporate income tax liability.
[1]Additional tax of 2.5%.
[2]A 4.5% supplemental net income tax is imposed.
[3]Also a 3.35% surtax on top earning corporations.
[4]Shited from corporate income tax to VAT.

tive revenue growth. Illinois, Maine, New Hampshire, Florida, and Ohio added the tax between 1968 and 1971.[9] In sum, rate increases and new states account for 35 percent of the effective tax rate by the late 1980s (which is the difference between the lower and upper lines in Figures 1 through 3).[10] Tax base changes do not appear to be an important cause of the relative corporate tax revenue growth until after TRA86. State corporate income tax collections appear to have risen less during the 1970s and 1980s and to have fallen even more sharply when compared with state tax revenues and GDP (Figures 2 and 3).

The rapid increases in the effective corporate tax rate from 1960–1989 have been replaced with rapid decreases (and beginning somewhat earlier for other measures of relative corporate tax revenues), with the effective 2000 tax rate (4.59 percent of profit) having fallen to the levels prevailing in the early 1970s. The tendency for legislated rates to stabilize or even fall is one reason that growth in the effective tax rate stopped. Nominal income tax rates now approximate the 1987 rate. But, rate adjusted revenues have fallen by about one–third since 1989, suggesting that the taxable base has diminished dramatically relative to NIPA profits. These declines in the relative base have been sufficient to approximately offset effects of increasing rates and additional states adding the tax that occurred during the 1970s and 1980s. There is no evidence as yet that the decline in effective tax rates has subsided. The remainder of the paper addresses the causes of the corporate base decline and possible mechanisms for offsetting the trend.

CAUSES OF STATE CORPORATE TAX REVENUE DECLINES

Four sources of the deterioration in state corporate tax revenues can be identified: cyclical declines in profits, reductions in the federal corporate tax base, state policy decisions to reduce corporate tax burdens, and more aggressive corporate tax planning.[11] Before–tax corporate profits are estimated to have grown 8.9 percent in 2000, fallen 17.4 percent in 2001, and are expected to decline another 7.4 percent in 2002 (DRI / WEFA, 2002). Poor corporate profits are certainly a factor in the state corporate tax revenue decline during the last couple of years. Corporate income tax receipts in the average state were down 7.2 percent in 2001 and are down 27.4 percent for the first six months of FY 2002.[12] These short–term cyclical effects are not the focus of this paper and are not considered further. The other three factors are addressed in the remainder of this section.

Deterioration because of Changes in the Federal Corporate Tax Base

Most state tax structures begin with federal corporate taxable income and then allow for some additions and subtractions.[13] Thus, decreases in the comprehen-

[9] Indiana, Nebraska, and West Virginia added the corporate income tax between 1960 and 1967. Michigan added the corporate income tax in 1967 and replaced it with the Single Business Tax in 1976. The Michigan tax is currently being phased–out over a 24 year time period.

[10] The rate adjusted base as a percent of corporate profits is about 10 percent higher at the end of the 1980s than it was in 1971.

[11] The effects of these four factors are very different across corporations. Therefore, they can be expected to increase the non–neutralities in the corporate tax structure.

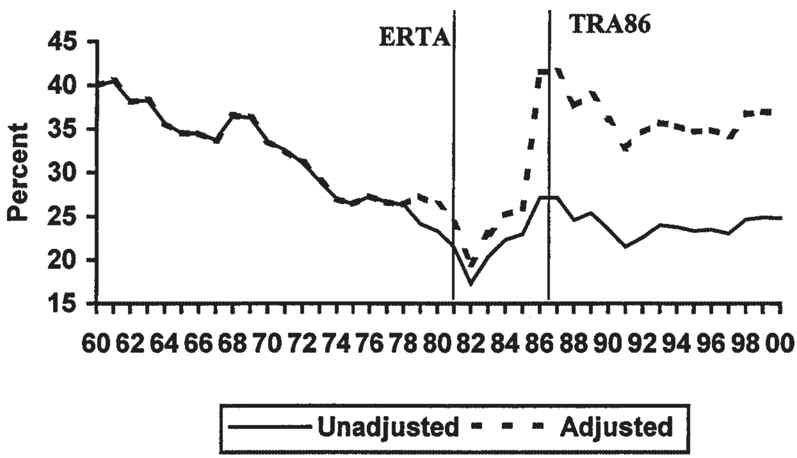
[12] A major thesis of this paper is that there has not been a close linkage between corporate profits measured for NIPA purposes and state corporate profits tax revenues, so no close relationship should be expected in the data. Further, at least a one–year lag should be expected, since corporate profits in 2001 should have the greatest influence on revenues during fiscal 2002. Still, a positive correlation is expected.

[13] For example, Tennessee begins the calculation with line 28 of the Federal corporate income tax return (Form 1120). At least three states, Alabama, Arkansas, and Mississippi, do not begin with the federal definition of income (see Hellerstein and Hellerstein, 1997).

siveness of the federal base, whether caused by policy changes, better tax planning, or greater tax sheltering, can be expected to decrease state corporate tax bases.[14] The pattern of federal corporate income taxes through the late 1980s appears radically different than that for state corporate taxes. Federal corporate taxes fell dramatically between 1960 and 1982 as state income taxes were rising (see Figure 4 for an example of the federal pattern, where the dashed line represents the effective rate, adjusted proportionately by the effects of nominal rate changes). As with state taxation, the 1986 through 1990 period was probably heavily influenced by tax planning linked to TRA86, and can be viewed as an aberration. The federal tax base fell slightly (though varying across the years) through most of the 1990s as the state rate was declining.

There are several possible explanations for the federal tax pattern. First, the 1980s were heavily influenced by the base decrease from ERTA and the base expansion from TRA86.[15] Second, federal tax rates were changed significantly. The marginal federal rate on the highest income levels declined from 52 percent in 1960 to 46 percent in 1979 through 1986 and then to 34 percent before rising back to 35 percent. The initial six percent drop in federal rates appears to explain a little less than half of the decline in taxes as a share of profits through the mid–1980s, though the effective rate was declining well before the rate reduction. There was no corresponding fall in the effective tax rate when the nominal rate was lowered to 35 percent. Third, state taxes are deductible in the calculation of federal tax liabilities. Federal corporate tax revenue is decreased (increased) by the marginal federal tax rate times the increase (decrease) in state tax revenue. Assuming that state taxes are fully deductible at the maximum marginal federal tax rate, federal taxes were reduced by 1.19 percent of corporate profits in 1960 (52 percent marginal rate times state taxes equal to 2.29 percent of profits) and by 3.24 percent of profits in 1985 (46 percent marginal rate times state taxes

Figure 4. Federal Corporate Profits Tax Accruals as a Percent of Corporate Profits before Tax



[14] Avoidance of the corporate income tax is not new. For example, transfer–pricing problems have existed for decades.

[15] The first steps to reduce perverse incentives created through the treatment of depreciation under ERTA were made in 1984.

equal to 8.01 percent of profits). Thus, the trend in state tax revenues accounts for a 2 percent decrease in federal tax revenues relative to NIPA profits. The pattern reversed in subsequent years, though with both lower state revenues and a lower federal rate effects of these two factors were somewhat offsetting. An increase in federal revenues equal to 1.61 percent of corporate profits can be attributed to the net effect of changes in the federal tax rate and state effective tax rate after 1985 (35 percent marginal rate times state taxes equal to 4.59 percent of profits in 2000).

The rate–adjusted data presented in Figure 4 suggest that TRA86 was effective in raising the federal corporate tax base, and this should have been reflected in larger state tax bases. This explains some of the reason why the effective state tax rate was higher in the mid to later 1980s. Several years after TRA86 there is strong evidence that the federal base has diminished relative to book income and some evidence that the federal base has fallen relative to the NIPA measure of profits. State tax revenues fall to the extent that federal taxable income is reduced as opposed to financial profits being overstated.

The relationship between corporate book income and federal corporate taxable income has been diverging, as illustrated by Talisman (1999) who found that book income was approximately equal to taxable income in 1991 but had grown to be 40 percent greater by 1996. Interestingly, this deviation far exceeds any change in the federal taxable base relative to NIPA profits, suggesting that NIPA profits are also diverging from book income. The federal effective tax rate is about the same at the beginning of the 1990s and in 2000.[16] But revenues should have grown about 10 percent from the combined effect of the increase in federal revenues as the state effective rate fell and the nominal federal rate increased in 1993 (and there were some other base expansions such as longer lives for real property). This suggests that the federal base actually has fallen about 10 percent relative to profits.[17] Some reasons for the federal tax base decline may include the check the box regulations, worldwide tax planning, and expatriation of U.S. corporations. Additional tax sheltering is another possible explanation for this decline.[18] A federal base decline of this magnitude is consistent with a lower federal base accounting for about 30 percent of the fall off in the state effective rate, meaning other factors account for most of the pattern.[19]

Desai (2002) examines the reasons for the deviation of book and taxable income. He begins with taxable income and simulates the effect that changes in the differential treatment of depreciation, reinvested earnings abroad, and non–qualified stock options have had on the divergence from book income. Findings of the simulations evidence that book income and taxable income are diverging, particularly at the end of the 1990s, but with the relative roles of the determinants changing over time. The failure to find large re-

[16] Based on data for the mid–1990s, some had suggested a significant decline in the effective federal tax rate. However, the effective rate rose again at the end of the 1990s.

[17] Mackie (2000) correctly argues that changes in the effective tax rate can result from many factors so this finding is at best a general indication of the pattern. He decomposes the reasons why the average effective federal tax rate deviates from the nominal tax rates into effects from treatment of depreciation, S corporations, losses, inflation, foreign income, alternative minimum tax, and other. He finds that the relative effects of these factors change over time. Depreciation and S corporations are the primary factors explaining why the effective rate is lower than the nominal rate, and his results evidence that there has been little change over the 1990s in the role of these two factors. However, the treatment of losses raises the effective tax rate and inflation lowers it, and the role of each fell dramatically during the 1990s, but in a somewhat offsetting manner.

[18] See Hines (2002) for a description of some newer methods of tax sheltering.

[19] The 10 percent base shrinkage divided by the 35 percent decline in the state effective tax rate.

ductions in the effective federal rate suggests that the problem may be more an increasing overstatement of book income than an increasing understatement of taxable income.

Accelerated depreciation reduces the federal taxable base and therefore lowers state tax revenue. Depreciation is found to have a smaller role in the differentials estimated using the simulations for the 1990s than for the 1980s.[20] Excess depreciation accounted for about two–thirds of the deviation during the 1980s, but for no more than one–fifth during the 1990s. Hellerstein and Hellerstein (1997) note that the large increases in depreciation under the Accelerated Cost Recovery System (ACRS) had a dramatic effect on state tax revenues in the early 1980s (and also the federal effective tax rate until 1984), causing many states to decouple their tax base from the federal base. However, most states conformed back to the federal base following the base broadening effects of TRA86. The Job Creation and Workers Assistance Act of 2002 provides a 30 percent depreciation bonus that should raise the role that depreciation plays in causing the divergence, though the effect will not return excess depreciation to the role it was playing two decades ago. Lav and Johnson (2001) estimated that the depreciation bonus will cost states about $5 billion (about 15 percent of state corporate tax revenues) during each of the next three years. As a result, the calculation of depreciation in at least 18 states and the District of Columbia is decoupled from the federal definition.[21]

The exercise of non–qualified stock options currently accounts for the largest share of the divergence (about one–half), after playing no role until 1992. The exercise of stock options reduces corporate taxable income but not book income. Some states may not experience a revenue loss since the excess of the market over the strike price is taxable under the individual income tax. But a revenue loss can be expected in the 24 states where the maximum corporate rate is higher than the maximum individual rate and in the nine states with no individual income tax.[22] Reinvested earnings abroad are responsible for one–third or more of the simulated divergence. This can result either because foreign activity is growing rapidly or because of reduced repatriation of earnings.

Further, Desai observes that the relationship between simulated book income and actual book income, which was relatively close until 1993, has begun to diverge. Actual book income has been consistently greater than simulated book income, with the former being 26 percent greater than the latter by 1998.[23] He undertakes regressions of book income on taxable income and finds results that are consistent with increased tax sheltering at low levels of income. He observes that lower probabilities that tax sheltering will be detected and lower perceived penalties if it is detected are explanations that are consistent with this pattern. Greater tax sheltering will lower state tax revenues.

Deterioration Because of State Policy Actions

State tax bases have deteriorated further than the federal base because of a combination of explicit state actions and tax avoidance / evasion by businesses. We are unable to determine the relative strength of the two effects but will describe the

[20] This is also consistent with Mackie's findings.

[21] State Tax Review, Commerce ClearingHouse, May 6, 2002, p. 3.

[22] No revenue loss exists if the stock options are viewed as legitimate compensation, since they should be regarded as a deductible expense. However, failure to reflect the cost in book income creates an incentive to provide excess compensation that is further encouraged by the tax savings.

[23] Actual book income is 63 percent greater in 1998 than actual taxable income using Desai's data.

mechanisms through which each operates. This section will address explicit state actions. States have tended to maintain their basic business tax structures (same rates, exemptions and so forth) so that domestic activity continues to be taxed much as before, but have lowered burdens in ways that are most likely to benefit multi–state firms that are perceived as being more footloose. Lowering taxes to attract business is not new, but the practice expanded during the 1980s and 1990s. Examples are the continued granting of tax concessions and changes in apportionment rules to favor production activities. The introduction of limited liability companies (LLCs) has allowed corporations to retain limited liability but lower their tax burdens by structuring their affairs to shift income into the lowest tax rate states or to avoid taxation altogether. Each of these is addressed in this section.

Tax Concessions

States offer two types of tax incentives: discretionary concessions that are normally granted during the recruitment of large firms and incentives built directly into the tax code. Between 1991 and 1993, 33 states enacted or significantly expanded one or more tax incentives related to business location (Enrich, 1998). Common examples include investment tax credits, property tax abatements, and employment tax credits. Negotiated concession packages exceeding hundreds of millions of dollars are becoming more common, particularly for auto plants (though for other types of firms as well).[24] For example, Tennessee provided $150 million in tax abatements to obtain the Saturn plant; Alabama provided $300 million for the Mercedes Benz plant and more recently $250 million for the Hyundai plant.

The debate over the extent to which low tax rates and tax concessions influence business location decisions continues. Legislators often argue there is no lost revenue from these incentives because the states are giving away revenue they would not have otherwise had. Others argue that the businesses are doing what they would have done anyway, and that tax incentives have done nothing to attract new businesses but have contributed to a significant decline of state tax revenues. Wasylenko (1997) reviews the literature and concludes that taxes influence the location of business, but the effects are small. There is a general consensus that factors other than taxes, such as labor costs, skill level, and accessibility to inputs, are more important determinants of location decisions than taxes (Moore et. al., 1991; Schmenner, 1982). Regardless of whether incentives are effective in attracting business, however, they reduce the relative contribution of corporate revenues, unless a Laffer–curve effect is present. In any event, the location of business raises the need to finance public services. Without the compensating revenue from the new businesses, these costs must be borne by other taxpayers.

Apportionment Formula

States adopted formulary apportionment as a solution to dividing and sharing the tax base of corporations operating in multiple states. The overall intent was to share the base according to a proxy for where the underlying economic activity took place. The traditional three–factor formula, originally adopted by UDITPA (Uniform Division of Income for Tax Purposes Act) in 1957 and based on equally weighted sales, property, and payroll, evolved when the economy was focused predominately on manufacturing. However, the original three–factor formula is now the exception rather than the rule (See Edmiston, 2002). In fact, the recent trend has been for states to double weight the sales factor as an inducement for

[24] See Fox and Mayes (1994) for a listing of some concessions.

producers.[25] Currently, over two–thirds of the states at least double weight the sales factor, 13 states have sales factors that exceed 50 percent, and nine states have a single sales factor apportionment formula for at least some taxpayers (Cline, 2002). The corporate tax structure on multi–state businesses increasingly becomes a destination–based sales tax as more weight is placed on the sales factor.

Generally, assessing more than one–third weight to the sales factor will lower the overall tax burden for a multi–state corporation that produces relatively more in a state than it sells,[26] because it lessens the significance of the property and payroll factors. States have placed greater weight on the sales factor as an incentive for businesses either to relocate or expand production activities. Likewise, corporations have lobbied to get legislatures to place greater weight on the sales factor by threatening to move production and jobs elsewhere, and the legislation is often passed to benefit specific firms. Some firms are winners and some are losers from changes in the apportionment formula, but the net effect is often to reduce revenues. Pomp (1998) estimates that the net annual revenue loss from deviating from the traditional 3–factor formula is around $500 million.

LLC Structure

Most states allowed the creation of LLCs for the first time during the 1990s (see Fox and Luna, 2002). The majority of states does not impose entity–level taxes or tax withholding on LLCs and generally follows federal classification for taxing members on their distributive shares. Because of the allowance of single member LLCs after adoption of the check the box rules at the federal level, LLCs offer new means for corporations and other businesses to engage in tax avoidance. Fox and Luna find evidence that LLCs have caused a significant reduction in corporate tax revenues. First, the LLC structure potentially permits multistate corporations to shift income to non–taxing or lower–taxing jurisdictions. For example, an LLC with two corporate members, a domestic member in State A owning a 1 percent interest and a Delaware corporation owning the other 99 percent interest, can be formed to operate in State A. Delaware does not tax the ownership of intangibles, and the LLC ownership interest is considered an intangible interest under Delaware law. Without an entity level state income tax or assertion of nexus over the Delaware corporation by State A, this formation effectively removes 99 percent of the income from the tax base.

Second, issues regarding nexus for LLCs and their members are yet to be settled, and the resulting uncertainties increase the risk that firms will aggressively seek to lower tax liabilities in the gray areas. Whether out–of–state members that do not otherwise have nexus in a state have nexus through ownership of LLCs is a key concern in determining the effect of LLCs on corporate tax revenues. Assume the LLC in the above example is organized pursuant to North Carolina law. The issue is whether North Carolina can assert nexus on the Delaware corporation if the only connection the Delaware corporation has to North Carolina is having an interest in the LLC (Fay and Amitay, 2001). In seeking to deal with this issue, some states have sought to apply partnership law to taxing LLCs, treating the corporate partner as having a ratable share of the partnership items, and therefore, possessing nexus where the partner-

[25] Increasing the sales factor weight is a specific type of tax incentive that has been offered by states. It is discussed separately because of the attention it has received in recent years.

[26] This refers to the initial incidence of the tax. As noted above, the tax becomes more like a destination–based sales tax (with a rate equal to the corporate income tax rate times the rate of profitability) as more weight is placed on the sales factor.

ship is engaged in activities that create nexus.[27] Even if nexus does exist, the issue remains as to whether the out of state member is paying the tax and whether the state can identify where the member is located.

Third, there are state specific avoidance mechanisms. For example, apportionment of multi–state income for Kentucky LLCs follows partnership law that provides for a single sales factor apportionment formula. A common technique is to site a business's manufacturing operations, with very high payroll and property, in Kentucky (where such factors do not affect apportionment), but locate its sales office across the border (e.g., Ohio). By keeping the sales out of Kentucky, little income is apportioned to Kentucky because most of the sales activity takes place elsewhere. Furthermore, if Ohio (or the state with the sales operations) uses the traditional 3–factor formula, the sales office will attract relatively little income because the property and labor–intensive manufacturing operations remain in Kentucky. The effect is to reduce the company's overall state tax liability.

Deterioration because of Corporate Strategies

State and local tax planning has become more important, as evidenced by the size of SALT (State and Local Tax) groups at the large public accounting firms. Also, corporations use sophisticated computer models to determine the effect of location decisions on their overall state tax liability. The models allow them to become more adept at exploiting tax structure differences between states. Corporations have devised ways to avoid nexus and have also aggressively exploited the Delaware holding company and the classification of income from business income to nonbusiness income as ways to minimize their corporate income tax liability. The effects of these tax minimization schemes have been dramatic. For example, New Jersey found that 30 of the 50 largest employers in the state paid only the minimum tax of $200 per year, and 71 percent of almost 800 subsidiaries of those companies also paid the minimum.[28] For corporations flexible enough to take advantage of the various planning options available, the corporate income tax seems to have become almost optional in states like New Jersey. This section addresses several of the issues related to business avoidance of state corporate income taxes.

Nexus

The existing nexus standards allow for tax avoidance opportunities. A state can only impose a tax on corporations that have sufficient nexus under the Commerce Clause and the Due Process Clause of the U.S. Constitution. All states except Kentucky determine taxability using a "doing business" type standard, which is broader than mere physical presence. It is unclear, however, whether a mere economic or intangible property presence will establish corporate income tax nexus, and as a result, litigation continues in this area (See Frieden, 2000). Public Law 86–272 further limits a states' power to impose taxes based on income from interstate business if "the only business activities carried on within the state are the solici-

[27] In addition, if the distributive share constitutes taxable income to the corporate owner, the corporate partner can potentially use one of three methods to allocate the income earned by the LLC—(1) apportioned at the flow through entity level (income apportioned to states where the LLC conducts business), (2) aggregation of the flow through income with the corporation's other business income/loss (income apportioned to states where the corporate partner conducts business), (3) apportionment through a combination of the LLC and corporate partners' sales, property, and payroll factors. The methods can and generally do result in significant differences being reported to the states.

[28] See Costenbader, Guariglia, and Wilson (2002).

tation of orders for tangible goods, provided that the orders are sent outside the State for approval and the goods are delivered from out–of–state." Therefore, Public Law 86–272 establishes a threshold for nexus and allows corporations to create "nowhere income." Nowhere income arises because the state where the sales factor should be sitused cannot assert nexus and collect taxes related to the transactions. The importance of nowhere income will grow as more weight is placed on the sales factor and as corporations become more sophisticated in tax planning.

PICs

Some corporations have used the nexus restrictions to form passive investment companies (PIC) to reduce the multistate corporation's overall state tax liability. For example, Toys R Us incorporated a subsidiary (Geoffrey) in Delaware and transferred to it various intangibles, including trademarks and the trade name "Toys R Us." Geoffrey licensed the intangibles to its parent, allowing the parent to use the trademarks as well as other intangibles in 45 states. In exchange, the parent agreed to pay Geoffrey a royalty based on the net sales in each jurisdiction. Geoffrey had no other presence in the 45 states. The parent company's payment of the royalty generated tax deductions for the parent, which were apportioned to the various states where Toys R Us had stores. The desired advantage was to deduct the royalty expense without paying tax on the royalty income in Delaware.[29] PICs are often formed in Delaware, but the same tax treatment can be achieved by incorporating the PIC in any state that does not tax intangible income or impose a corporate income tax. A similar arrangement is to have the parent company borrow money from a Delaware subsidiary, generating deductible interest payments for the parent borrower but exempting the subsidiary's interest income from Delaware income tax.

The case of *Geoffrey, Inc. v. South Carolina Tax Commission*, 114 S. Ct. 550 (1993), challenged the avoidance mechanism available through PICs. In this case, the South Carolina Supreme Court held that the taxpayer (Geoffrey) had established a minimum connection through the use of its intangibles. The Court held that the licensing of intangibles to be used in South Carolina met the substantial nexus requirements under the Commerce Clause. Similarly, the New Mexico Court of Appeals recently ruled that K–Mart Properties, Inc. (KPI), a Michigan domiciled corporation whose only function was to license trademarks to the K–Mart stores, established sufficient nexus to subject it to the corporate income tax.[30] Only about one–third of all states are asserting that they would seek to uphold the Geoffrey decision for companies with an intangible property presence in their state, and few state courts have actually ruled on the issue. Further, states may have difficulty in observing whether such royalty arrangements exist.

Business Income

The definition of business income provides corporations with an additional loophole. UDITPA defines business income as "income arising from transactions and activity in the regular course of the taxpayer's trade or business and includes income from tangible and intangible property if the acquisition, management, and disposition of property constitute integral

[29] Delaware §1902(b)(8) provides an exemption from income taxes for corporations whose activities within the state are confined to the maintenance and management of intangible investments and the collection and distribution of income from intangible investments, which include investments in stocks, bonds, notes and other debt obligations, patents, patent applications, trademarks, and trade names.

[30] See *K–Mart Properties, Inc v. Taxation and Revenue Department* (Docket #21,140, New Mexico Ct. App., November 28, 2001).

parts of the taxpayer's regular trade or business operations." Nonbusiness income is "all income other than business income." The distinction is important as only business income is apportioned while nonbusiness income is allocated to the state in which the transaction occurred. Therefore, a tax savings can be realized when nonbusiness assets are located in a state without the corporate income tax or which provides favorable treatment for passive income. For example, if structured properly, the different treatment of business and non–business income can create ordinary apportionable depreciation deductions during an asset's useful life but non–business income when the asset is sold and allocated entirely to a zero or lower–taxing state.

Separate Reporting

The creation of separate corporations is an effective avoidance mechanism in a number of states. Most states allow (or require) each corporation to be treated as a separate taxable entity, as only 13 states require related companies to file combined reports. There are situations where separate taxation of each corporation under an umbrella raises the combined business's total liability because the losses in one company cannot offset the gains in another. However, separate reporting allows easy avoidance opportunities through transfer pricing, PICs, and other means. The problem is made worse in the 12 states that allow firms to elect whether to file combined reports.[31]

FIXING STATE BUSINESS TAX STRUCTURES

The analysis provided above suggests that about one–third of the corporate tax base has been lost since the late 1980s. States are confronted with two options if they want to replace the revenues with greater taxation of business: find a new means for taxing business or fix the corporate income tax to overcome the existing problems.

A New Scheme for Taxing Business

A different approach to taxing business is appealing given the difficulties with the corporate income tax. The obvious question is will state legislatures be any more effective at protecting the base of a new tax than they have been with the corporate income tax? No compelling reason exists for expecting legislatures to devise and retain a base that is more consistent with good tax policy than has occurred with the profits tax, though a lower rate tax would reduce the marginal incentives for firms to seek concessions. Also, would incentives for tax avoidance and evasion be as great under a new scheme as under the existing structure? Again, a lower rate reduces the incentives to engage in avoidance and sheltering activities.

Design of a new tax base should follow from the goals for imposing state taxes on business. Oakland and Testa (1996) summarize three justifications for imposing state business taxes: a) ease of raising revenues, b) ability to export taxes, and c) intent to impose a tax on public service benefits. They conclude that the last argument, that businesses should be taxed according to their benefits received, is the best justification for imposing sub–national business taxes.

Fox, Luna, and Murray (2002) examine the case for a state origin VAT and like Oakland and Testa argue that a tax structured on the benefits received principle is generally preferred to a profits tax. A precise measure of benefits is difficult to develop, so Oakland and Testa argue for

[31] The election is often required for a minimum number of years (eight years in Kentucky), but this still allows manipulation to lessen business taxes.

employing either input usage or output production as a proxy. They note that intermediate inputs would be an inappropriate choice because their usage need not be linked to any activity within the state. Other specific inputs, such as capital or labor, could serve as the base. Franchise taxes, often using a measure of corporate value as the base, are currently used in 26 states. But in the absence of evidence that capital–intensive firms are heavier consumers of public services than labor–intensive firms, broad taxation of inputs appears to make the most sense. Broad taxation of inputs requires that they be aggregated in some form, and the obvious option is to aggregate inputs based on factor payments. Following this option simply leads to business taxation on the basis of an origin VAT.

Either a gross receipts or a VAT basis can serve as the benefit surrogate on the outputs side. Again, the VAT base appears preferred since actual business production should be more highly correlated with receipt of public services than are business revenues. Further, business revenues are dependent on the degree to which intermediate inputs are used in the production process, and the VAT base avoids the cascading that would otherwise occur. In sum, a VAT is the preferred benefit base from both the input and output perspective. The VAT could be operated as a minimum tax, with the corporate income tax retained, but this raises compliance and administration costs.

The VAT offers several other advantages as well.[32] The VAT rate could be one–third or less of the corporate income tax rate, and the lower rate reduces incentives at the margin for avoidance behavior. Corporate profits, representing only about 8.6 percent of the VAT base, probably offer the easiest opportunities for avoidance through overstatement of costs or understatement of revenues. The VAT depends most heavily on wages (which represent about 49.0 percent of the VAT base) and other factors and should be more difficult to avoid than the profits component (though legislatures could create opportunities through the wage and other components as well). Also, states would be less susceptible to reductions in the federal corporate tax base since only the profits portion of the VAT base would be affected. Further, the VAT would be more stable across the business cycle than the profits tax (see Kenyon, 1996).

Enhancing the Corporate Income Tax

The three basic causes of corporate tax deterioration must be addressed if the corporate income tax is to be fixed. First, states need look no farther than at their own propensity to give away the tax base if there is an intent to limit further erosion of corporate revenues. Many states are discussing the need to bolster the corporate income tax at the same time they are taking actions that operate counter to their espoused goal. A halt to the practice of granting tax concessions that narrow the base and create non–neutralities must be the first step in addressing base erosion, but states have shown little evidence that they intend to stop.

Second, narrowing of the base that arises because of federal actions (or poor enforcement) must be limited or eliminated. In many countries, such as Australia and Canada, the national government either is required to or chooses to consider effects of some changes in national tax policy on state tax structures (or cannot make changes without state consent) of some changes in national tax policy. Not only are there no corresponding requirements in the U.S., but it is difficult to find evidence that the U.S. government considers the effects on state governments when the corporate tax structure is altered. In

[32] Only Michigan and New Hampshire have adopted VATs, despite their well–known advantages.

any event, states do not control their own destiny in this area unless they are willing to decouple from the federal base to a much greater extent than has historically occurred. The problems with the federal tax base that were described above, such as accelerated depreciation and greater tax sheltering, can only be eliminated at the national level. States could consider decoupling themselves from the federal government in circumstances where federal policy or administration is not sound, as some have in the past. But, the additional revenues must be weighed against the added administrative and compliance costs that would arise from decoupling.

Third, states need to undertake a series of technical fixes in their tax systems to help close existing loopholes. Hines (2002) develops a model of tax avoidance and concludes that on–going efforts by government to eliminate the latest avoidance mechanism may lead to greater rather than lesser avoidance. The model was not developed in a fiscal federalism environment and it need not apply to efforts by individual states to limit avoidance of their tax since each can be expected to have a limited effect on the overall incentive to pursue a new avoidance technique. The following is a discussion of several potential fixes. Still, a potential outcome is that if states close loopholes, thereby making it more expensive to engage in avoidance, little new revenue will be raised as businesses find newer, more complicated avoidance maneuvers. At a minimum, states will generally need comprehensive changes in their corporate tax structures if they are to stop the growing extent of avoidance, and not a few quick fixes.

Throw–back Rules

A potentially undesirable solution is to enact or expand "throw–back" rules. In simple terms, the rules say that income that is not taxed in any other state because of constitutional restrictions is "thrown–back" to the home state and subject to tax there. At first glance, the rule seems appropriate. The home state simply captures all "nowhere" income and reduces the effectiveness of tax planning strategies that shift income into states where a business does not have nexus. However at their core, throwback rules are simply revenue raising measures. Throw–back rules cannot be defended as part of a benefit tax because the income thrown back into the home state is certainly not related to a sale in the home state, and the firm is already paying a tax related to its payroll and property in the home state. Further, throw–back rules probably raise the effective tax rate[33] on corporate headquarters (which are likely to be more footloose than manufacturing plants) and increase the chance that taxes will influence the location of headquarters (which most states try to aggressively recruit).[34]

Combined Reporting

Required combined reporting offers a reasonably effective means to reduce the base loss arising from PICs and other transfer pricing problems.[35] Combined reporting requires companies with common ownership to file a single tax return and essentially requires companies with multiple separately incorporated subsidiaries to ignore the different corporate entities and file their return as if each separate subsidiary was only a division of the parent, similar to the familiar federal consolidated return. In other words, inter–company transactions are eliminated, and the profits and losses, and revenue, payroll, and property of the various related businesses are combined for state income

[33] Throw–back regulations can be thought of as imposing origin based sales taxes on sales to states that do not otherwise impose a corporate income tax.

[34] Mazerov (2002) makes a case for throw–back rules and argues that there would be no locational effects.

[35] McIntyre, Mines, and Pomp (2001) provide a comprehensive evaluation of combined reporting.

tax reporting, apportionment, etc.[36] Companies that have legitimate business reasons for creating separate corporations could experience lower aggregate tax burdens as loss making corporations are combined with profit making corporations, but the potential for using transfer pricing is significantly reduced.

Combined reporting would reduce the effectiveness of the PIC structure. For example, the profits of a Delaware company, earning only untaxed intangible income, do not simply disappear. Under combined reporting, the profits are apportioned to all states (including Delaware) in which the entire group of companies operates. The problem with PICs does not lie with some states, such as Delaware, not taxing the income but with corporations being able to arbitrarily avoid taxation of profits with the form of their organization. While state revenue departments can use the reasoning in the K–Mart and Geoffrey cases to immediately challenge intangible income siphoned from their state through the use of a PIC, combined reporting achieves a similar result without legal action. In the same way, the ability to reduce tax liabilities through transfer pricing is limited with combined reporting. Under combined reporting, states disregard form over substance, and each business is taxed as if the various subsidiaries are treated as a combined unit.

Combined reporting is not a panacea but can close some loopholes. Nonetheless, several limitations should be noted. First, the combination must include all companies with common ownership and not just companies that individually have nexus in the state if the effect of PICs and other cross state avoidance is to be reduced. Second, the ability to require companies to file a combined report is limited, because their combination can only be required if the companies are unitary. There is no simple definition of unitary, meaning litigation may be necessary in some cases to reach agreement on the unitary firm. Third, worldwide combined reporting may be necessary if the major avenues to tax avoidance are to be limited to a substantial extent. Otherwise, companies can avoid taxes through the use of off shore subsidiaries rather than domestic subsidiaries. Further, an arbitrary ownership requirement for combination, such as an 80 percent rule, may still allow companies to avoid taxes by establishing 79 percent ownership or some other manipulation of the intent. Finally, combined reporting raises the complexity of corporate tax compliance and administration (for example, companies must determine what portion of their business is unitary for every state in which they must file a tax return).

Taxing LLCs

Two steps should be considered to bring LLCs into the tax fold. First, most states did not update their tax laws to reflect the creation of LLCs, and should do so now. For example, LLCs are not subject to the Kentucky franchise tax law and are subject to a different apportionment formula for the income tax than corporations. State specific tax laws must be investigated and the statutes modified to ensure that LLCs are appropriately taxed and are not simple avoidance mechanisms. Second, consideration should be given to an entity level tax on LLCs or a withholding tax on non–resident members' distributive shares. Doubt exists regarding whether or not a member's distributive share can be taxed if the member does not otherwise have nexus in the state where the LLC is organized, and even if nexus exists whether the tax revenues are collected. States such

[36] Unitary reporting seeks to accomplish a similar goal except that a functional test rather than an ownership test is used to determine which companies are to be combined. See *Container Corporation of America v. Franchise Tax Board,* (463 U.S. 159, 103 S.Ct. 2933 (1983), for the meaning of a "unitary business."

as California, Georgia, Indiana, Iowa, Louisiana, Minnesota, Missouri, New Jersey, North Carolina, Ohio, South Carolina, and West Virginia have protected themselves from the nexus problem by requiring withholding on a nonresident member's distributive share, unless the member's share is included in the LLC's composite return. The withholding tax effectively imposes an entity–level tax on the out–of–state owners and makes collection of the tax much easier.

Defining Business Income

Mazerov (2002) suggests closing the "business income" loophole by expanding the definition of taxable business income to include corporate profits from irregular transactions. Based on the Supreme Court's decision in *Allied Signal v. New Jersey*, 504 *U.S.* 768 (1992), states may choose to include in business income any profit associated with any asset that serves an "operational function." Hellerstein (2001) recommends that states should amend the definition of business income to be all income, which is apportionable under the Constitution of the United States. Currently, 26 states do not define business income using this definition and, by doing so, could minimize future adverse and unnecessary litigation as well as raise additional corporate tax revenue.

Acknowledgments

The authors wish to thank Raquel Alexander, Donald Bruce, Dan Bucks, Kelly Edmiston, and Matthew Murray for comments on an earlier draft.

REFERENCES

Bruce, Donald, and William Fox.
"E–Commerce in the Context of Declining State Sales Tax Bases." *National Tax Journal* 53 No. 4, Part 3 (December, 2000): 1373–88.

Cline, Robert.
"Can the Current State and Local Business Tax System Survive the New Economy Challenges?" *State Tax Notes* 24 No. 3 (April 15, 2002): 241–6.

Costenbader, Charles M., Michael A. Guariglia, and Margaret C. Wilson.
"Scrutiny of Governor's Tax Proposals Begins." *State Tax Notes* 24 No. 3 (April 15, 2002): 211–4.

Desai, Mihir A.
"The Corporate Profit Base, Tax Sheltering Activity, and the Changing Nature of Employee Compensation." NBER Working Paper No. W8866. Cambridge, MA: National Bureau of Economic Research, 2002.

DRI / WEFA.
"The U.S. Economic Outlook." April, 2002.

Edmiston, Kelly D.
"Strategic Apportionment of the State Corporate Income Tax." *National Tax Journal* 55 No. 2 (June, 2002): 239–62.

Enrich, Peter D.
"The Rise–and Perhaps the Fall—of Business Tax Incentives." In *The Future of State Taxation*, edited by David Brunori, 73–88. Washington D.C.: The Urban Institute Press, 1998.

Fay, Elisa, and Sharlene Amitay.
"Attention LLC Members: Is Nexus a Foregone Conclusion?" *State Tax Notes* 64 No. 37 (September, 2001): 821–6.

Fox, William F., and LeAnn Luna.
"Does the Advent of LLCs Explain Declining State Corporate Tax Revenues?" Working paper. 2002.

Fox, William F., LeAnn Luna, and Mathew Murray.
"Issues in the Design and Implementation of Production and Consumption VATs for the American States." *State Tax Notes* 23 No. 4 (January 21, 2002): 205–12.

Fox, William F., and David Mayes.
"Are Tax Incentives Too Large?" In *Proceedings of the Eighty–Seventh Annual Conference on Taxation,* 203–9. Washington, D.C.: National Tax Association, 1994.

Frieden, Karl.
Cybertaxation: The Taxation of E–Commerce. Chicago, IL: Commerce Clearing House, 2000.

Hellerstein, Walter.
"The Business–Nonbusiness Income Distinction and the Case for Its Absolution." *State Tax Notes* 21 No. 10 (September 3, 2001): 725–39.

Hellerstein, Jerome R., and Walter Hellerstein.
State and Local Taxation: Cases and Materials. St. Paul, MN: West Publishing Co, 1997.

Hines, James R.
"On the Timeliness of Tax Reform." NBER Working Paper No. 8909. Cambridge, MA: National Bureau of Economic Research, April 30, 2002.

Inman, Robert P., and Daniel L. Rubinfeld.
"Designing Tax Policies in Federalist Economies: An Overview." *Journal of Public Economics* 60 (1996a): 307–34.

Kenyon, Daphne A.
"A New State VAT? Lessons from New Hampshire." *National Tax Journal* 49 No. 3 (September, 1996): 381–401.

Lav, Iris J., and Nick Johnson.
"How Much Revenue will the Corporate Tax Reductions in the House Stimulus Bill and Senator Baucus' Stimulus Package Cost Each State?" Center on Budget and Policy Priorities. Washington, D.C., October 25, 2001.

Mackie, James B.
"The Puzzling Comeback of the Corporate Income Tax." In *Proceedings of the Ninety–Second Annual Conference on Taxation*, 93–102. Washington, D.C.: National Tax Association, 2000.

Mazerov, Michael.
"Closing Three Common Corporate Income Tax Loopholes Could Raise Additional Revenue for Many States." *State Tax Notes* 24 No. 5 (April 29, 2002): 421–34.

McIntyre, Michael, Paul Mines, and Richard D. Pomp.
"Designing a Combined Reporting Regime for State Corporate Income Tax: A Case Study of Louisiana." *Louisiana Law Review* 69 61 No. 4 (2001): 699–761.

Moore, John R., C. Warren Neel, Henry Herzog, Jr., and Alan M. Schlottman.
"The Efficacy of Public Policy." In *Industry Location and Public Policy*, edited by Henry W. Herzog, Jr. and Alan M. Schlottman. Knoxville, TN: University of Tennessee Press, 1991.

Oakland, William H., and William A. Testa.
"State–Local Taxation and the Benefits Principle." *Economic Perspectives* (January / February, 1996): 2–19.

Pomp, Richard D.
"The Future of the State Corporate Income Tax: Reflections (and Confessions) of a Tax Lawyer." In *The Future of State Taxation*, edited by David Brunori, 49–72. Washington D.C.: The Urban Institute Press, 1998.

Schmenner, Roger W.
Making Business Location Decisions. Englewood Cliffs, NJ: Prentice Hall, 1982.

State Review.
Commerce Clearinghouse. (May 6, 2002): 3.

Talisman, Jonathan.
"Statement of Jonathan Talisman: Testimony before the House Committee on Ways and Means Hearing on Corporate Tax Shelters." Washington, D.C.: U.S. Government Press, November 10, 1999.

Wasylenko, Michael.
"Taxation and Economic Development: The State of the Economic Literature." *New England Economic Review* (March / April, 1997): 37–52.