PRESIDENTIAL ADDRESS
105TH ANNUAL CONFERENCE ON TAXATION, PROVIDENCE, RI

THE LABORATORY OF STATE AND LOCAL PUBLIC FINANCE

Matthew N. Murray, University of Tennessee

I WOULD LIKE TO USE THIS OPPORTUNITY TO advocate on behalf of the research laboratory of state and local (or more generally subnational) public finance. This is not a reaction to an inferiority complex or maltreatment from someone in the field of federal finance. I have spent the better part of my career conducting applied and academic research in this field and have found it to be a rewarding and fruitful pursuit.

Like many graduate students, I initially had the desire to focus on federal tax policy — federal issues seemed to appear daily in leading papers and on the news and were focal points of discussion among students and faculty while I was at Syracuse University. Importantly, this was the era of Reagan when the role and size of the public sector was at the forefront of popular and intellectual debate. I was fortunate to be at Syracuse at a time when the faculty were engaged in a number of major tax reform projects, the largest being the Jamaican Tax Structure Examination Project directed by my major professor Roy Bahl. There were also ongoing tax reform projects in Burkina Faso and Ecuador that afforded faculty and students the opportunity to conduct impactful research.

These were exciting times, and the experiences further heightened my interests in tax policy, especially central government policy. I recall seeking advice from Professor Jerry Miner who talked about the number and heterogeneity of state and local governments, and the way people and their taxes were closely tied to the services they received at the state and local levels. Others at Syracuse were steeped in state and local public finance, including Roy who was in the midst of writing an influential book on state and local government finances. In the end, I wrote a dissertation that was focused on central government finance. But I did come to appreciate the importance of the state and local tax and expenditure nexus. This conclusion was reinforced following my move to Tennessee. My research agenda in state and local public finance began to unfold and my long-term partnership with colleague Bill Fox was initiated.

Research in state and local public finance has long been well represented in the *National Tax Journal* (NTJ) and at the conferences of the National Tax Association (NTA). However, instruction in the subject is circumscribed other than in that small number of schools that affords the luxury of a dedicated course; I have never taught the course. Textbook offerings are slim, though we are fortunate that NTA member Ron Fisher continues to publish his exceptional book, and we have the new Ebel-Petersen Handbook on State and Local Public Finance to guide inquiry. But look elsewhere. One of the more popular public finance textbooks relegates state and local public finance to a chapter on federalism that begins on page 507.

Admittedly the tools of public finance are the tools of state and local public finance. But the institutional context and heterogeneity of tax structure and expenditure mix varies substantially across levels of government in our federalist system, as well as in other countries. You would not easily draw this conclusion from most textbooks. An understanding of this subnational context and heterogeneity lays a rich foundation for productive research. I have found the NTA to be the go-to place to help establish and enrich this foundation, while keeping me on the frontier of research in the area of federal finance.

Let me step back and offer the broad conceptual framework that guides my thinking on state and local public finance. My views are not unique, and you will find similar perspectives in the writings of others in the field. Public economists of my generation have been greatly influenced by the work of Richard Musgrave, who helped add structure and coherence to the field. His seminal 1959 book, *The Theory of Public Finance*, along with the popular textbook series that he co-authored with his wife Peggy, did much to organize and promulgate the emerging rigor of the field. Prior to this, public finance was largely a descriptive field that had little resemblance to the way we model and think about the world today.

Especially notable were Musgrave's three branches of government — the allocation, distribution, and stabilization branches — that divvyed up the functional areas of government action in a way that had not been done before. The now-familiar allocation branch was about satisfying social wants, i.e. the provision of public goods. Musgrave never laid out a detailed structural framework that would apply the allocation branch to a federalist setting; this was left to others. We have come to recognize local public goods and interregional spillovers as important nuances that help define the respective roles of vertical and horizontal layers of government in the fiscal hierarchy.

I have to ask myself: What might have happened to the field of state and local public finance had Musgrave's initial allocation branch included these nuances formally, or even by example? It is highly unlikely that state and local public finance would have risen to a position of dominance in the field, reversing the tables with central government finance. (A textbook on state and local public finance with a chapter on federal government taxes and spending programs?) But the fact is that impure public goods and interregional externalities are fundamentally more interesting and numerous than pure public goods, and these are the very market failures that states and localities must resolve on a daily basis.

In its simplest form, the task of the distribution branch was to resolve the question of a just distribution of income that must first be decided upon in order to enable effective demands consistent with the allocation branch. While Musgrave made few references to subnational governments in his early treatise, a perception emerged that states and localities should not be in the business of redistribution. The default thinking was that distributional equity was to be achieved through the amalgamation of national tastes and national resources. Should states pursue redistribution, they would find their efforts defeated by the forces of market mobility. Progressive taxation would lead to factor flight and outmigration while generous transfer programs would lead to inmigration and increased fertility rates.

In reality the states, and to a lesser extent localities, are in the redistribution business. Thirty-four states have nominally progressive income tax rate structures, 13 states have progressive corporate tax structures, 38 states provide some form of relief on food purchases under the sales tax, and Temporary Assistance for Needy Families (TANF) benefits for a family of three range from $923 in Alaska and $753 in New York to only $170 in Mississippi. The states clearly have tastes for redistribution that have been expressed on both sides of the fiscal ledger.

With a small number of exceptions, the empirical evidence would appear to support the capacity of states to engage in this business of redistribution. We do not find broad empirical evidence of large labor supply responses or robust evidence of strong migration responses to state income taxation. And there is mixed evidence on whether state welfare programs serve as a magnet for population immigration. It is clear that there has been no race to the bottom in state income taxation or in the generosity of state transfers to the poor. This is just one example of where the states offer a rich and robust laboratory of policy heterogeneity that is not always afforded by federal fiscal policy.

Musgrave's stabilization branch, like his distribution branch, has been commonly interpreted to fall under the purview of the central government. The basic intuition behind this conclusion is both intuitive and compelling. On the one hand, the federal government has a greater capacity to incur debt and has the power and influence of a central bank at its disposal. On the other hand, there is a fundamental problem of policy coordination across states and the limited practical consequences arising from the actions of a few. Moreover, rather than serving a stabilizing role, observers in the 1940s coined the fiscal perversity hypothesis to describe the pro-cyclical self-interested behavior of states and localities in the midst of the Great Depression. There are ample modern examples of states and localities pursuing pro-cyclical tax and expenditure policies. The likelihood of this behavior manifesting itself over the course of the Great Recession was a primary reason for the massive transfer of purchasing power from the federal government to state and local governments through the American Recovery and Reinvestment Act.

There is a very small body of literature that challenges the fiscal perversity hypothesis, but you can count the contributions on only one or two hands. (This is a common state of affairs in the field — simply too little empirical evidence to properly guide discourse and policy thus yielding ample research opportunities and the opportunity for a significant public policy impact.) Most important are fiscal externalities arising from the self-interested behavior of the states, which impart a countercyclical influence on macroeconomic performance; to be clear, the states generally do not pursue countercyclical stabilization as an independent policy objective.

One example is the state unemployment insurance system that is intended to improve well-being through the partial restoration of household spending power, regardless of the state of the business cycle. Yet effects over the business cycle are terribly important. During periods of expansion unemployment insurance trust fund balances grow, putting downward pressure on economic activity, while during periods of contraction these funds are distributed to the unemployed increasing aggregate spending and demand. I would wager that few, if any, state policy makers identify countercyclical macroeconomic stabilization as a policy goal for their state unemployment insurance system.

A second important example of countercyclical state policy is the rainy day fund. States and localities have likely maintained idle balances to protect against unforeseen contingencies going back to the earliest of times. The wrenching back-to-back recessions of the early 1980s had dramatic effects on state government finances, and formal rainy day funds began to grow in number and their balances began to grow in size. The intent of these funds is to provide fiscal insurance against recession by smoothing expenditure flows, with fund accumulation taking place during periods of growth and fund disbursement taking place when revenues are lagging. This accumulation and disbursement of revenues, like flows through state unemployment insurance systems, has a countercyclical influence on the economy.

One can expect the influence of rainy day funds on the macro economy to grow in the future for two reasons. First are the pressures from the bond rating vigilantes who have called for much larger rainy day fund balances. Second, it is hard to imagine that the states would be so naïve as to expect another bailout from the increasingly strapped federal government like the one they received in recent years through the American Recovery and Reinvestment Act. So in the end, the states will likely find it in their own best interest to expand the size of rainy day funds, which will further enhance their role as a countercyclical stabilizer.

I am currently working with two colleagues to address the question of optimal state rainy day funds and their consequence for macroeconomic performance; we presented a preliminary version of our paper at the annual conference in Chicago two years ago. Optimal in this context refers to the choice of the insurance package and the degree of smoothing of taxes and spending consistent with state preferences, which in turn imparts a fiscal externality on the performance of the macro economy. Our research agenda on state rainy day funds serves as an excellent example of a focal area that few public finance economists outside of the state and local arena would have even considered.

My storytelling up to this point has largely been conceptual, with few references to data and empirical motivations for the study of state and local public finance. Policy and jurisdictional heterogeneity across subnational governments offers a rich empirical laboratory for research in the field. There are certainly data limitations on both fiscal and sociodemographic data for cities, townships, and local school districts, especially when one tries to make linkages to micro-level data. But there are also abundant data to support a highly productive research agenda.

The Census Bureau reports that there are over 89,000 subnational governments in the U.S., a figure that includes over 3,000 counties, nearly 20,000 municipalities, over 16,000 towns/townships, and just over 50,000 special purpose jurisdictions. (Of course not all of these units of government have independent tax and/or spending authority.) These different government units display significant institutional variation, most obviously mechanisms for collective action that include both direct and representative democracy, with the usual important roles played by bureaucracies and lobbyists. This structure offers the clever researcher the opportunity to examine the determination of both tax and expenditure policies by similar or dissimilar units of governments in the fiscal hierarchy of the federalist system — in other words, the opportunity to conduct research on why government does what it does. How are spending programs and tax structures determined? And how do the policies of one government react to the policies of other governments?

The diversity of subnational governments also allows one the opportunity to study how policy affects the behavior of individual economic agents. Combined state and local sales tax rates, for example, range from zero in five states to over 10 percent. Four states have no corporate income tax and of those that do tax corporate income, rates vary from 1 percent in the first bracket in Arkansas to a high flat rate of 9.99 percent in Pennsylvania.

Excise tax rates show dramatic variation: New York's tax on cigarettes stands at $4.35 compared to the 17 cent tax in Missouri. Annual reports from the Minnesota Taxpayers Association and the District of Columbia document large differences in nominal and effective property tax rates across places and property types.

Expenditures also vary dramatically. For example, New York spends $12,984 per pupil on elementary and secondary education compared to $3,861 per pupil in Utah. Expenditures are not outputs; state and local public finance has helped pave the way for production function analysis of public service provision.

Looking forward, I see rich research opportunities in the field state and local public finance. There are many areas where we simply know too little and allow policy decisions to be overly influenced by proof by anecdote — we need better empirical evidence. A good example is the state inheritance/estate tax where critics have made hay out of stories of people fleeing the tax for low- and no-tax states, despite little or no rigorous empirical evidence to support the case. We have some evidence of mobility responses, but the evidence is thin and the behavioral effects are small.

Perhaps most exciting is the emergence of behavioral public finance and the need to re-evaluate what we think we know, both theoretically and empirically. My ongoing work with colleague Rudy Santore using other-regarding preferences finds cases where median voters with above-average income may support redistributive taxation consistent with the behavior of the states. Raj Chetty's provocative work on the sales tax suggests that statutory incidence may in fact affect economic incidence, which in turn has important implications for how we measure the welfare cost of fiscal policy.

In closing, let me express my thanks to the NTA and its membership. I have been a member since 1984 and still recall my first presentation many years ago. I have learned greatly from the research and friendship of my fellow members. And I look forward to many more years of fruitful collaboration. Thank you and have a good evening.