

## **TAX SHARING AS A METHOD OF PUBLIC FINANCE: PROS AND CONS**

*The adoption of the Law on 1999 State Budget of Ukraine signified the budget system of Ukraine returning to the practice of so called “tax sharing”. Pros and cons of such mechanism are discussed in the paper written by Wayne Thirsk, Ph. D. of Economics.*

A unique feature of public finance in the former Soviet Union has been its continued reliance in a number of countries, including Ukraine, on the sharing of major revenue sources between governments at different levels. Apart from Germany which shares its wage taxes with local governments, this legacy from the Soviet era has virtually no counterpart in Western public finance and some of the reasons that this funding mechanism may be also inappropriate for new transitional economies are addressed below. First, however, the system of tax sharing is described in general terms and then it is discussed in the context of the recent fiscal history of Ukraine.

### ***I. TAX SHARING: HOW DOES IT WORK?***

Tax sharing is a byproduct of a command economy in which the central government exercised close control over the expenditure levels of subcentral governments acting as agents and extensions of the central government in achieving the goals of a central economic plan. Revenues were classified into three categories, own, fixed and regulating. Own revenues consisted of fees on local activities, such as parking, and comprised only a small share of total revenue, typically less than five per cent. Fixed revenue sources were national taxes assigned exclusively to a particular level of government. Fixed revenues for subcentral governments, for example, consisted of motor vehicle taxes, user fees and the profits tax collected from locally owned enterprises. Regulating taxes, on the other hand, were shared national taxes which comprised the major revenue sources for all levels of government- the turnover sales tax, replaced by a VAT in the early 1990's, the enterprise profits tax, the personal income tax, excise taxes and the land tax. All of these taxes were shared on a derivation basis and allocated to subcentral governments according to the amount of taxable sales or income which occurred within their jurisdiction.

Using centrally determined expenditure norms that guided the calculation of the cost of providing different public services, subcentral governments prepared their expenditure budgets for approval by the central government. Normally, after some negotiation with the central government, expenditure levels were established for each level of subcentral government as part of the annual budget plan and the funds needed to finance this spending were provided by a mixture of fixed and regulating revenues.

The shares of the regulating taxes assigned to each subcentral government were calculated to balance their budgets. Because the size of the tax base varied significantly among different subcentral governments, the shares differed both by tax and jurisdiction, tending to be relatively higher in poorer areas and relatively lower in richer areas. Tax sharing was therefore simultaneously harnessed to the service of two important fiscal goals, balancing the budgets of subcentral governments and equalizing their fiscal capacity.

The equalization component of tax sharing often went only part way towards meeting the entire need for fiscal equalization. Subventions to poor areas and contributions from rich areas therefore played a residual role in equalizing the budgets of subcentral governments. The combination of tax sharing and positive and negative transfers suggests that tax assignment was essentially irrelevant in the Soviet system of public finance. As long as the primary objective was to provide financing for targeted expenditures, any change in the assignment of taxes between levels of government would be exactly offset by compensating changes in sharing rates and levels of subventions and contributions. Moreover, given any particular tax assignment, any change in sharing rates would be matched by changes in the levels of contributions and subventions as the Ukrainian experience, discussed below, illustrates.

## ***II. EXPERIENCE WITH TAX SHARING IN UKRAINE***

In Ukraine, reliance on shared taxes and subventions as the fiscal tool for balancing and equalizing oblast budgets has shifted on a regular annual basis. In 1994, all income taxes were shared at a 50 per cent rate with the oblasts and both the VAT and all excises were shared at the lower rate of 20 per cent. The result of uniform rates across all oblasts was a high degree of dependence on subventions as the residual balancing mechanism for oblast budgets. Twenty-two of the 27 oblasts received subventions in 1994 and the other 7 were contributors.

At the sub-oblast level, very little has changed since Soviet times. Each oblast finances its subordinate rayons with an amalgam of shared taxes and subventions and each rural rayon, in turn, uses a similar financial recipe to fund its subordinate towns, villages and settlements. All of the shared taxes are divided on a derivation basis that binds the revenue capacity of sub-oblast governments to the financial health of the enterprises located in their jurisdictions.

In 1995, and also in 1996, as shown in Table I, more emphasis was placed on the VAT as the primary regulating mechanism. VAT shares received by different oblasts varied inversely with the relative fiscal capacity of the oblast. Poorer oblasts were allowed to retain all of the VAT proceeds collected within their jurisdiction while the richer oblasts, such as the city of Kiev, kept only a relatively small portion of their VAT proceeds. In both years, more regional diversity in tax sharing was introduced by allowing the

Crimean Republic and the city oblast of Sevastopol to claim all of the personal and enterprise income taxes collected on their territories as well as all excise taxes. Other oblasts were entitled to smaller shares of these taxes, 50 per cent and 70 per cent, respectively, of the personal and enterprise income taxes and 20 per cent of all excise taxes. Because variable VAT rates did much more of the equalization task, the number of subvention recipients among the oblasts declined to 14 in 1995 and 12 in 1996.

**Table I**  
**VALUE-ADDED TAX SHARING RATES**

Oblast	1995	1996	Difference
Aut. Rep. of Crimea	100.0	100.0	0.0
VINNYTSKA	97.6	100.0	2.4
VOLYNSKA	100.0	100.0	0.0
DNIPROPETROVSKA	46.4	24.2	-22.2
DONETSKA	30.1	23.4	-6.7
ZHYTOMYRSKA	100.0	100.0	0.0
ZAKARPATSKA*	100.0	100.0	0.0
ZAPORIZKA	22.9	20.0	-2.9
IVANO-FRANKIVSKA	100.0	89.0	-11.0
KYIVSKA	100.0	91.6	-8.4
KIROVOHRADSKA	100.0	100.0	0.0
LUHANSKA	78.1	72.8	-5.3
LVIVSKA	93.9	59.6	-34.3
MYKOLAIIVSKA	100.0	100.0	0.0
ODESKA	56.4	45.3	-11.1
POLTAVSKA	24.7	20.0	-4.7
RIVNENSKA	100.0	100.0	0.0
SUMSKA	53.8	53.1	-0.7
TERNOPIILSKA	100.0	100.0	0.0
KHARKIVSKA	76.7	44.1	-32.6
KHERSONSKA	100.0	100.0	0.0
KHMELNYTSKA	100.0	100.0	0.0
CHEKASKA	100.0	78.8	-21.2
CHERNIVETSKA	100.0	100.0	0.0
CHERNIHIVSKA	86.6	86.3	-0.3
CITY OF KYIV	20.0	20.0	0.0
CITY OF SEVASTOPOL	100.0	100.0	0.0

With the passage of the 1997 national budget Ukraine came close to abandoning the practice of tax sharing and embracing the notion of tax separation between central and oblast budgets. Revenues collected from the VAT were assigned exclusively to the financing of the central budget and revenues from personal and enterprise income taxes were transferred to the oblasts for their exclusive use. In one sense, the provision of separate sources of funding for different levels of government may be viewed as an extreme form of tax sharing in which the shares of different regulating taxes are set at either zero or one hundred per cent for different governmental levels. This new revenue assignment did not necessarily enhance the revenue autonomy of oblast governments since control over the tax rates and definition of the tax base continued to rest with the central government. In another sense, however, oblast finances were given additional

degrees of freedom from tax separation as the amount of revenues received would now be much more dependent on the performance of tax collections.

Excise taxes continued to be shared on a 50:50 basis in 1997 but in the 1998 budget that practice was also discarded and all excise tax revenues were assigned to the central budget. The 1998 budget also preserved the tax separation arrangements that had been introduced the year before. The 1999 budget that has been submitted by the Ministry of Finance promises to largely undo the system of tax separation that has been in place for two years and return to the traditional system of tax sharing between the central government and the oblasts. Under its provisions, while the VAT would remain exclusively with the central government, all of the income taxes, as well as all excise taxes, would be shared with the oblasts on a non-uniform basis. All oblasts would receive a subsidy from the central budget with the exception of the city of Kyiv which would continue to be a contributor oblast. Below, we examine a host of issues raised by the specter of a return to full-blown tax sharing, as well as the continuation of tax sharing at the sub-oblast level.

### **III. CONCERNS RELATED TO TAX SHARING**

#### ***(a) Tax Sharing and Indirect Taxes***

Tax sharing works better for direct taxes than it does for indirect taxes although, even for direct taxes, the principle of derivation upon which tax sharing is based can create difficult problems of attribution. For example, if the enterprise income tax is shared, revenues from this tax are frequently allocated to the oblast where the enterprise is registered even though the enterprise may operate in several oblasts. A similar, albeit less severe, allocation issue arises when a shared personal income tax is assigned to the oblast where the employee works rather than the oblast in which he or she may reside.

Ukraine's earlier experience in sharing the proceeds of the VAT has confirmed that this tax is inherently non-divisible and can only be operated satisfactorily if it is lodged at the central level. When the proceeds of the VAT were shared between the central and subcentral levels of government several problems emerged which impeded the effective operation of the VAT. The most serious problem was that a shared VAT frequently directed revenues to the wrong jurisdiction. This shortcoming was most obvious in the case of imported commodities. VAT payable on imports was collected by the oblast directly receiving the import. If the import was either a capital or intermediate good, it was often shipped to another oblast where it would be used in production and the enterprise using it would claim an input credit from that oblast for the amount of VAT paid upon import. When imported goods were sold to a consumer, the oblast where the retailer was registered would be responsible for sharing the credit for prior tax paid. Since the oblast responsible for paying the input credit was often not the oblast which collected the tax paid on importation, there was a reluctance to pay input credits that undermined the basic principles on which a VAT is levied and converted the VAT into an effective turnover tax. In the case of exports, the oblast where the exporter was registered would be required to provide input tax credits for taxes that may have been paid to another oblast

For example, an enterprise-agent, registered in the oblast N., bought goods in the oblast M. (obviously, paying there a VAT), and then exported the purchased consignment abroad. And it was the oblast N. that had to repay the input credit.

Problems of a similar nature arose in the case of multi-regional enterprises selling their output in a number of oblasts. In this case VAT would be paid to the oblast in which enterprise was registered rather than to the oblasts in which its sales were made. More generally on internal trade, a reluctance to pay input credits arises whenever purchases are made in other oblasts who collect the tax on the purchase of inputs. On domestic sales, a shared VAT is inherently an origin-based sales tax that allocates revenues according to the place of production rather than the place of consumption and thereby serves to accentuate horizontal fiscal disparities.

Although the 1999 budget does not propose to reintroduce a shared VAT, it does offer the prospect of reintroducing shared excise taxes and thus raises many of the same issues that

beset a shared VAT. In particular, shared excise taxes channel revenues to the oblasts where the good subject to excise are produced. On imported excise products the tax is collected by customs for the national budget and does not go to the oblast budget where the import occurred. For domestically produced excisables, however, oblasts where excisable activities are concentrated would receive too much revenue and oblasts where consumption of these items occur would receive too little. Of course, none of this would matter, if at the same time, the budget also adjusted either the shares of other taxes or subvention or contribution levels so as to maintain the same amount of total revenue in an oblast. Be that as it may, a more rational tax system would assign revenues from excises to the oblast where goods subject to excise are consumed.

### **Case Study 1**

*The oblast allowance, presented in the Budget'99, to deduct a share of excise tax to the local budget has impacted the budget behavior of some oblasts yet in January. In particular, the oblast authorities something unfavorably perceive "the export of tax burden" to their oblasts, thus the administrative efforts are made to prevent this process. We are dealing, particularly, with decisions adopted in Lvivska and Ternopil'ska oblasts concerning the sales in local outlets of spirits produced exclusively at the local plants. In other words, the administrative attempts to hold the excised hryvnia in a local budget preventing its flow to another oblast budget are made in regions.*

*Here you have the telltale quotations from some regional papers:*

- **Ternopil'ska Hazeta** of February 18, 1999: "The unavailability of products of the Ternopil oblast vodka distilleries is a massive fact. Instead, we consume a substitute and **replenish budgets of other oblasts** (highlighted by the FAO). According to a head of the trade and services department of the oblast state administration, Mr. P. Andriyevsky, all oblast trade enterprises are bound to draw up contracts on the prior delivery of own spirits to the commercial network up to the end of month."
- **Podoliya** (Vinnytsia) of March 2, 1999: "Trade in the oblast is realized by strange merchants **who pay taxes somewhere** (highlighted by the FAO). Thus the regions are recommended (ordered) to do business with those who'd registered their structures in Vinnytska oblast".
- **Den'** (Kyiv) of March 2, 1999: "The new-formed oblast agency "Zaporizh-spetsmonopoliya" is going to arrange matters in the field of production, storage, transportation and sales of alcohol. A head of the agency, Ihor Yaroshenko, is sure that in the interests of population the local spirits and wine distilleries have to start working to capacity and **replenishing the local budget**. Until now, the situation is awkward... hundreds of thousands of hryvnias **go out of the region** (highlighted by the FAO)."

*The oblast administrations' concerns for the oblast budget replenishment is understandable, although is not worthy to be followed referring to these specific cases. In fact, it deals with the establishment of the regional monopoly for production and sales of excisable goods. That is an example how a budget decision can lead to economic inefficiency*

***(b) Tax Sharing and Adverse Tax Collection Incentives***

Unless tax sharing rates are uniform for all shared taxes, the incentive to collect different taxes may be altered by tax sharing. In principle, non-uniform tax sharing should not matter because State tax collectors are responsible for collecting all of the taxes assigned to different levels of government. In practice, it does appear to matter because the State's tax collectors are subject to dual subordination to the central government which employs them and to the oblast in which they live and work. Consequently, if the oblast's share of some taxes is higher than others, collectors may face some pressure to concentrate their efforts on collecting those taxes at the expense of collections in which the oblast share is lower. Some countries, such as Kyrgyzstan have responded to this problem by adopting uniform sharing rates for all shared taxes and letting subsidies carry more of the burden of fiscal equalization.

This problem is more severe where tax separation occurs since the oblast receives all of the revenue from some sources and none from others. Since tax separation was introduced in 1997, the unexpected buoyancy in profits tax collections and the unanticipated shortfall in VAT collections has been attributed in part to the ability of local governments to bend the energies of tax collectors towards bringing in more profits tax at the expense of VAT revenues. Cash strapped Ukrainian enterprises that are unable to afford to pay both their VAT and profits tax obligations may be pressured to pay their profits tax first.

Table II offers some modest empirical support for the existence of adverse collection incentives in Ukraine. Ukrainian oblasts are divided into two groups in that table. The first group contains all of the oblasts which received one-hundred per cent of VAT revenues in 1996. The second group consists of the oblasts which received a much smaller share of VAT in 1996, typically less than 20 per cent. The hypothesis is that, because it lost less, the second group suffered less of a disincentive to collect VAT when it became entirely a central government revenue source and, therefore, revenue collections should be observed to fall more sharply in the first group of oblasts. The figures in Table II provide some weak confirmation of this proposition as VAT revenues in 1998 declined to 91 per cent of their 1996 levels in the first group compared to smaller decline of 97 per cent in the second group. However, within each group one observes a tremendous amount of diversity in revenue performance as VAT revenues did not decline in all of the oblasts in the first group while, in the second group, VAT revenues fell significantly in some oblasts.

The comparison of tax debt shares to be entered the State budget and local budgets illustrates vividly as well the interest of local executive bodies in the separate and indirect enhancement of levying mainly the taxes introduced into regional budgets. As the Table 9, added to this quarter report on the local budget execution last year, shows, the tax debt share introduced into local budgets is significantly lower than the

State Budget's one. Clearly, more than changes in tax sharing is required to explain the behavior of VAT revenues during the last three years.

**(c) Tax Sharing and Fiscal Decentralization**

A system of tax sharing tries to solve the problems of vertical fiscal imbalance and horizontal fiscal disparities through continual tinkering with the sharing rates for regulating taxes and the level of subventions and contributions. The fiscal instability that is created by the nearly annual adjustments to tax shares and subventions is clearly inimical to the process of fiscal decentralization. It is difficult for subnational governments to exercise any meaningful fiscal autonomy if they never know in advance from one year to the next how much revenue they will have at their disposal. Without stable funding sources and clear, transparent, rules for revenue determination, subnational governments face such a high degree of revenue uncertainty that realistic budget planning is ruled out and expenditure arrears are more likely to occur as expenditure commitments are made in the absence of any knowledge of whether they are truly affordable. One consequence of this instability has been the incentive given to local governments to create extra-budgetary funds that, however undesirable on grounds of budget transparency, at least offer some shelter from the effects of unforeseen revenue fluctuations.

In addition, tax sharing also discourages responsible fiscal behavior on the part of local governments. Tax sharing enables revenue "claw-backs" by higher level governments whenever local governments either mobilize more revenue from their own efforts or reduce inefficient expenditures and is thus inimical to the promotion of efficient decision-making by local governments.

**Case Study 2**

*There is a kindergarten, among the network of such establishments financed by the Town Council of Vyshneve (Kyivska oblast), that doesn't come under any criterion of rationalization of economic decisions and the budget efficiency. The unfavorable demographic situation, the economic condition when a number of families cannot send a child to the pre-school establishments led to the abrupt decline of the kindergarten attendance. As a result, one staff employee of the mentioned kindergarten is accounted for every two children. However, the Town Council of Vyshneve is not in hurry to close the kindergarten. What is the reason? If the establishment is closed and the budget funds are saved in such a manner, the Rayon Council will reduce simply the deduction rate for the town, and the town will not benefit by it.*

Moreover, tax sharing, as opposed to either tax separation or the creation of independent revenue sources for subnational governments, also endows the central government with the fiscal clout to be the ultimate arbiter of subnational expenditure levels. Holding subvention levels constant, the central government can adjust tax

sharing rates to either stimulate or depress the amount of subnational spending. Tax sharing means that subnational governments have no control over marginal or incremental sources of funds. Even if a subnational government was financed in large part by grants from a higher level government, it would have greater fiscal autonomy if it could supplement those grants with revenues from taxes under its control. Tax sharing effectively wrests this revenue control from subnational governments and puts it in the hands of the central government.

***(d) Tax Sharing, Derivation and Equalization***

Tax sharing enshrines the principle of derivation, that local governments should be financed, at least in part, from the proceeds of tax revenues collected within their geographic jurisdiction. Tax sharing also strives to achieve equalization by assigning larger tax shares to poorer jurisdictions. However, realization of the equalization goal may be compromised by the inability to accurately forecast the revenue yields of share taxes. Random, or unanticipated revenue fluctuations, will accentuate geographic inequalities in expenditure in comparison with the alternative of pooling these resources at a higher level of government and using transfers to fund lower level governments.

At the sub-oblast level, rayon budgets are often financed in large part by the proceeds of the enterprise income tax collected from local enterprises. In many rayons there is one dominant enterprise that accounts for the bulk of the enterprise income tax that is collected. The fiscal health of the rayon is thus tied very closely to the economic fortunes of a single enterprise. If the enterprise thrives and is profitable, the rayon will have the resources to meet its expenditure needs. However, if the enterprise falters and becomes unprofitable, the rayon will be unable to meet its expenditure needs and will have to adjust to an unexpected revenue shortfall by either cutting its expenditures, running arrears, or appealing to the oblast for financial assistance. No matter what happens, this system of local public finance has a large potential to create significant regional disparities in nationally important expenditure areas such as health and education.

***(e) Tax Sharing and Mutual Settlements***

Mutual settlements, or the mutual clearing of debts between the private and public sectors through barter arrangements, is a mixed blessing in a transitional economy. In the short term, mutual settlements provide a means for local governments to survive some of the pressures of a cash-straitened economy. In the long run, however, mutual settlements may delay the process of structural adjustment and prolong the existence of unprofitable enterprises.

If it is accepted that mutual settlements are desirable methods of local finance in the short term, the practice of tax sharing will impede the ability of local governments to

conduct mutual settlements. With tax separation, local governments can negotiate directly with the parties involved in making a mutual settlement and do not need the approval of a higher level government. When taxes are shared, however, governments at all levels are involved in approving the terms of a proposed settlement and the local government must secure the approval of the higher level government with which it shares the tax.

That approval might be withheld, for example, if the effect of a local settlement would result in a hijacking of central government revenues. For example, if a local enterprise supplied services to a local budgetary organization in exchange for a reduction in its enterprise profits tax arrears, and only 20 per cent of the profits tax was allocated to the local government, the local government may be unable to secure permission to proceed with this settlement because 80 per cent of the local expenditure would be financed by funds that should accrue to the central budget and the central government would be put in the position of making a forced loan or transfer to the local government

***(f) Tax Sharing and Intergovernmental Payments Compliance***

One of the unforeseen consequences of the move towards tax separation in 1997 was that it left the central government without an enforcement tool for exacting payments from contributor oblasts. In the absence of tax sharing, the central government could not compel contributor oblasts to make the payments to the central budget that were required in the 1997 and 1998 budget laws. As a result, many contributor oblasts underpaid their contribution obligations and the central budget was deprived of some funds to finance its own expenditures. With tax sharing, the central government has an effective mechanism for making the contributor oblasts honor their payments obligations. When taxes are shared, the central government automatically receives a portion of any tax deposit that is made at a bank.

***(g) Tax Sharing, Budget Transparency and Accountability***

Variable tax shares inevitably obscure the basic public finance question of how public services are paid for and who pays for them. Different tax sharing rates for different taxes and regions create a complex set of implicit transfer payments that destroy any link between the taxes paid by individual taxpayers and the amount of public services which they receive. As a result, citizens are deprived of any opportunity to hold local public officials accountable for the expenditure decisions which they make. When these decisions escape local scrutiny, there is much less pressure on local officials to be responsive to the needs and wishes of their local constituents and a consequent loss of economic efficiency. With a system of tax separation, on the other hand, in which citizens are aware that the taxes they pay are being used entirely to fund the provision of local public services, the question of “how are you spending my taxes” is much more likely to occur and to impose greater discipline on local expenditure decisions.

#### **IV. A SUMMARY VIEW OF TAX SHARING**

From the preceding discussion of the merits and demerits of tax sharing, only two advantages were ascribed to tax sharing. Vis-a-vis the alternative of tax separation, tax sharing may impart fewer disincentives to collect different taxes and it may provide a tool with which to compel payments to the State budget on the part of oblasts which are designated as contributors to the State budget. Neither advantage, however, may be an inherent feature of tax sharing. If the State Tax Administration, for example, were reorganized in ways that eliminated the dual subordination of its officials, it is conceivable that tax collection incentives could be maintained under a system of tax separation. And if, for example, the enterprise profits tax were shifted up to the central government and a system of formula-based transfers compensated for the revenue loss, the problem of contributors to the State budget would disappear. On balance, the damage that tax sharing inflicts on the process of fiscal decentralization and equalization, the achievement of efficient budgetary practices, and the inculcation of accountable local governments makes it an unattractive method of funding the activities of local governments.