

# “Fiscal Reforms in the BRO Countries, 1996-2002”

<b>AUTHORS</b>	Dmitriy Gershenson Joshua Greene
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# SECTION 1

## MACROECONOMIC PROCESSES AND REGIONAL ECONOMIES MANAGEMENT

### Fiscal Reforms in the BRO Countries, 1996-2002

Dmitriy Gershenson, Joshua Greene<sup>1</sup>

#### Abstract

Most BRO countries – denoting Baltics, Russia, and other countries of the former Soviet Union – have made genuine fiscal adjustments since 1996, with deficits declining notably because of revenue increases and expenditure cuts. Apart from the Baltics, however, only a few countries appear to have achieved fiscal sustainability. This reflects high levels of public debt in a number of countries, heavy reliance on petroleum revenues in some others, compressed social spending, and continuing, if diminished, levels of budgetary arrears and quasi-fiscal activities in a few. Many countries also have high poverty rates; and in several, further revenue mobilization will be needed to fund higher social spending as a means of combating poverty.

**Key words:** Fiscal performance; transition countries; former Soviet Union; Commonwealth of Independent States (CIS).

**JEL Classification:** H20, H50, H60.

#### Introduction

Fiscal reform has been a key component of the transition to a market economy for all the formerly centrally-planned economies. Transition has required divorcing the government from state enterprises and radically changing the tax base. In most cases, the value added tax has replaced turnover taxes. Moreover, new taxes, such as a personal income tax and distinct corporate profits taxes, have been established to replace hidden wage taxes and the wholesale transfer of enterprise profits to the state (Tanzi and Davoodi, 2000). At the same time, governments have absorbed social expenditures previously undertaken by state enterprises. They have also broadened social safety nets to include unemployment benefits, job training programs, and in some cases a minimum income or system of social grants, to assist the many workers and their families whose jobs enterprise restructuring and privatization have eliminated (Tanzi, 1993). In many countries, these changes led to a sharp decline in the revenue base without comparable decreases in expenditure. This resulted in large budget deficits that contributed to rapid monetary expansion and high inflation at the start of the transition process.

Reducing these fiscal deficits has been a central objective for most transition countries that have adopted adjustment programs supported by the IMF. During the first half of the 1990s, many of these countries reduced their recorded budget deficits. In the BRO countries<sup>2</sup>, the deficit of the general government sector, measured as a percent of GDP, fell 8.5 percentage points *on average*, with eight countries reducing their deficits by more than 14 percentage points<sup>3</sup>. To some observers, however, the initial efforts at fiscal adjustment in many countries were more illusory

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<sup>2</sup> BRO countries comprise the Baltics, Russia, and other countries of the former Soviet Union.

<sup>3</sup> Authors' calculations, based on the data reported in Cheasty and Davis (1996).

than real. Cheasty and Davis (1996), reviewing fiscal developments in the BRO countries during 1991-1995, noted that collapsing revenue yields and difficulties in reducing expenditure had led many governments to use sequestration – the deliberate refusal to make cash payments for expenditures incurred – as a way of reducing recorded fiscal deficits. Because the resulting arrears (which included salary payments) would inevitably need to be cleared, these authors questioned whether real adjustment had occurred. Thus, as of the mid-1990s, not many BRO countries had genuinely reduced their fiscal imbalances.

Since 1995, most BRO countries have cut their recorded fiscal deficits further, although the reductions have been smaller. The average decline from 1996 to 2002 was 4.2 percentage points for all 15 BRO countries, and 4.8 percentage points for the 12 CIS countries<sup>1</sup> (Table 1). For Russia, the budget balance improved by 9.7 percentage points. Nevertheless, in view of the experience of the first half of the 1990s, it is worthwhile examining whether these reductions have been more genuine than those of the earlier period, and whether the resulting fiscal positions have become more sustainable. This paper addresses these two questions, focusing particularly on nine CIS countries, drawing on data and recent reports and papers prepared by Fund staff.

Table 1

## General Government Deficit in BRO Countries, 1996-2002 1/ (in percent of GDP)

	1996	1997	1998	1999	2000	2001	2002	Change, 1996–2002 2/
Average (unweighted)	5.1	3.3	3.8	4.5	1.8	00.9	1.1	-4.2
CIS average (unweighted)	5.7	4.3	4.8	4.1	2.0	0.8	1.1	-4.8
Armenia 3/	9.3	5.8	4.2	5.5	4.6	4.0	2.4	-7.0
Azerbaijan	2.8	1.6	3.9	4.7	0.6	-0.9	0.5	-2.3
Belarus	2.0	-7.9	1.0	2.0	0.2	1.9	1.8	-0.2
Estonia	1.9	-2.2	0.3	4.6	0.7	-0.4	-1.2	-3.1
Georgia	7.1	6.1	4.9	5.0	2.6	1.6	1.9	-5.1
Kazakhstan	4.7	6.9	7.7	5.9	0.8	-2.7	-1.4	-6.2
Kyrgyz Republic 4/	9.5	9.2	9.5	11.4	9.3	5.1	5.8	-3.7
Latvia	1.8	-0.3	0.8	3.9	3.2	2.2	2.7	0.9
Lithuania	4.5	3.5	5.9	8.5	2.8	1.9	1.2	-3.3
Moldova	8.0	10.5	6.4	4.6	3.5	0.6	0.9	-7.1
Russia	8.9	8.0	7.9	3.1	-3.1	-2.7	-0.8	-9.7
Tajikistan	5.8	3.3	3.8	3.1	0.6	0.1	0.2	-5.6
Turkmenistan 4/	-0.3	-2.7	-4.2	-0.9	-2.0	-0.7	...	-0.4 5/
Ukraine	3.2	5.6	2.8	2.4	1.3	1.6	-0.5	-3.7
Uzbekistan	7.9	2.0	2.6	2.9	2.7	1.5	1.8	-6.1

Source: Data compiled by IMF staff.

1/ Minus means surplus

2/ Minus means reduction in deficit.

3/ Central government budget.

4/ State budget

5/ Change from 1996 to 2001; data for 2002 are not available.

## Common Trends, 1996-2002

Averaging the revenue and expenditure data across the BRO countries shows an overall trend toward fiscal consolidation over the period of 1996-2002, with most of the adjustment occur-

<sup>1</sup> The 12 countries in the Commonwealth of Independent States (CIS) comprise the 15 BRO countries minus the three Baltic nations (Estonia, Latvia, and Lithuania).

ring during the years 1999-2002 (Figure 1). The unweighted average deficit, after declining from 5.1% of GDP in 1996 to 4.5% in 1999, fell to 1.8% in 2000 and 0.9% in 2001 before rising slightly to 1.1% in 2002 (Table 1). Although revenue performance improved over the period, lower expenditure was the main factor explaining the decline in fiscal deficits. Excluding data for Turkmenistan, average revenue and grants rose by 1.5% of GDP, from 27.0% in 1996 to 28.5% in 2002. Average expenditure declined by twice that rate, falling from 32.6% of GDP in 1996 to 29.6% of GDP in 2002. The greater importance of expenditure reductions mirrors the findings of Purfield (2003) for a broader set of transition countries during 1992-2000.

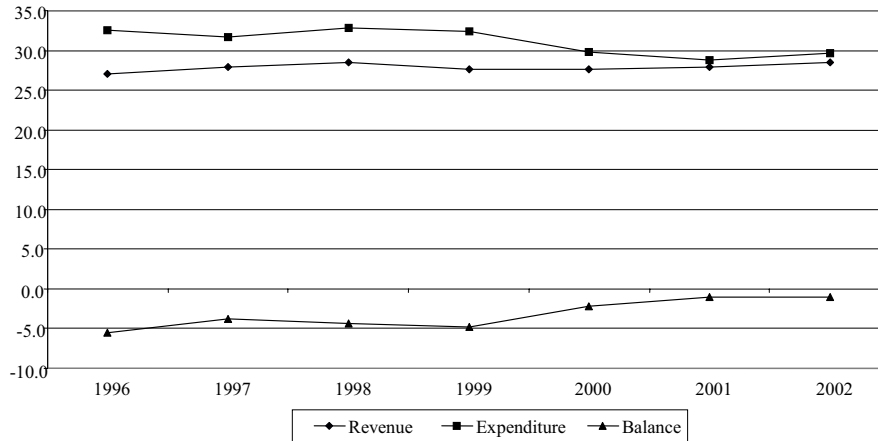


Fig. 1. BRO Countries (excluding Turkmenistan): Average Revenue, Expenditure, and Fiscal Balance, 1996-2002 (in percent of GDP)

The data for individual countries show that all, with the exception of Kyrgyz Republic, reduced their fiscal deficits to 3% of GDP or less by 2002. This observation, however, must be qualified, since in some BRO countries the official data, which exclude extra-budgetary funds, the accumulation of arrears, and quasi-fiscal operations, obscure the true fiscal picture<sup>1</sup>. For example, in Belarus the official deficit did not exceed 2% of GDP during the period. However, the government has maintained significant quasi-fiscal operations, such as credit to state enterprises extended by the central bank (IMF, 2000d). Even for the Russian Federation, some observers contend that off-budget activities mean that the official data may not give a full picture of the fiscal situation<sup>2</sup>. Hence, any quantitative analysis requires an accompanying qualitative assessment.

During this period, the BRO countries relied mainly on the domestic banking sector and foreign financing to cover their fiscal deficits (Table 2). The chief exceptions have been Armenia, which received more than 40% of budget financing from nonbank sources in 2000 and 2002, and Russia, which since 2000 has obtained net nonbank financing of 1.9% of GDP or more despite overall budget surpluses, enabling other debt to be repaid<sup>3</sup>. In Uzbekistan, nonbank financing and privatization supplied about 17% of budget financing in 1998 and 1999 before returning to lower levels from 2000 onward.

It is hard to make further general conclusions about the BRO countries as a whole. The successor states of the former Soviet Union, which started the transition process<sup>4</sup> with a common legacy, now cover a wide spectrum of economic development and vary greatly by the degree of

<sup>1</sup> Markiewicz (2000) argues that the fiscal adjustment in BRO countries through the 1990s was accompanied by an increase in quasi-fiscal operations. Due to their size (sometimes more than 2% percent of GDP), quasi-fiscal operations must be considered significant.

<sup>2</sup> See Ustinov (2002).

<sup>3</sup> Six countries (Azerbaijan, Estonia, Kazakhstan, Lithuania, Tajikistan, and Ukraine) have amassed significant privatization proceeds since 2000. However, in at least three of these (Estonia, Lithuania, and Tajikistan) the funds have been used for specific purposes, such as amassing a reserve to finance upcoming pension reform (Lithuania).

<sup>4</sup> For a review of the main features of economies in transition, see Gros and Suhrcke (2000).

progress in the area of reform. For analytical purposes, it is more useful to divide the BRO countries into three groups, based on the extent of their fiscal reforms.

Table 2

Nonbank Domestic Financing in BRO Countries, 1995-2002 1/ (in percent of total financing)

	1995	1996	1997		1998	1999	2000	2001	2002
Armenia	0,3	6,2	9,3		neg	2,4	65,6	34,7	43,6
Azerbaijan	...	...	...		...	0,0	0,0	neg	0,2
Belarus	...	...	...		...	30,8	77,8	1,0	0,0
Estonia	...	...	11,1	2/	neg	9,1	...	...	...
Georgia	...	...	...		neg	5,4	7,0	neg	2,2
Kazakhstan	...	...	...		12,5	8,5	neg	2/	2/
Kyrgyz Republic	0,0	1,0	3,2		neg	neg	0,9	neg	...
Latvia	2,2	23,2	neg		0,0	1,0	19,3	43,8	6,5
Lithuania	25,9	12,4	neg		15,1	1,5	3,8	5,2	68,0
Moldova	...	24,3	8,1		neg	neg	neg	neg	...
Russia	14,4	9,5	52,3		15,8	neg	2/	2/	...
Tajikistan	0,0	0,0	0,0		0,3	neg	2,0	0,0	...
Turkmenistan	...	...	...		...	...	...	...	...
Ukraine	2,1	27,7	...		...	neg	13,4	5,5	...
Uzbekistan	5,4	2,4	9,9		17,4	17,1	10,3	10,9	neg

Source: Fiscal file compiled by the IMF's Fiscal Affairs Department; and data presented in selected IMF staff reports.

1/ Excludes privatization receipts. "Neg" denotes negative financing (net repayment of past debt).

2/ Non-bank domestic financing positive while total financing is negative (budget surplus).

The first group comprises the three Baltic states of Estonia, Latvia, and Lithuania, where reform is far advanced. This achievement reflects both the political will to implement early on a convincing reform agenda, and the need to meet EU standards before achieving EU membership. The budget process in these countries is generally transparent, and their revenue bases are fairly broad. Since fiscal deficits have been reduced to moderate levels and the ratio of public debt to GDP remains modest, these countries can be considered as having achieved fiscal sustainability, absent further economic shocks. Indeed, recent IMF staff reports for Latvia and Lithuania show that, absent a large drop in revenues, their ratios of public debt to GDP are forecast to remain below 30% and 40% of GDP, respectively, even if major shocks to growth, interest, and exchange rates and the primary budget balance occur<sup>1</sup>.

A second group comprises three countries in which fiscal reforms remain at an early stage: Belarus, Uzbekistan, and Turkmenistan. These countries have non-transparent budget practices and heavy government intervention in the economy. Thus, whether they have achieved fiscal sustainability is hard to assess, even if official data report low fiscal deficits.

The third group encompasses the remaining nine BRO countries, all of which have undertaken fiscal reforms with varying degree of success. These countries are Armenia, Azerbaijan, Georgia, Kazakhstan, Kyrgyz Republic, Moldova, Russia, Tajikistan, and Ukraine. Our paper focuses on this group of intermediate reformers.

### Fiscal Developments in the Intermediate Group of BRO Countries

Three trends in particular help explain the fiscal performance of the nine intermediate BRO reformers: improved revenue performance, expenditure compression, and higher world energy prices. Relative to GDP, all but one country in the group, Moldova, achieved higher government

<sup>1</sup> See IMF, 2003c, pp. 48-49; and IMF, 2003d, pp. 51-53.

revenues (Table 3), with three energy exporters (Azerbaijan, Kazakhstan, and Russia) benefiting particularly from higher world energy prices since 2000. Six of the nine countries (all but Azerbaijan, Kazakhstan, and Kyrgyz Republic) reduced their expenditures (Table 4). Consistent data on components of expenditure are hard to find, but comparing IMF data bases covering 1996, 1997, 2001, and 2002 suggests that current (but not capital) outlays also decreased in these six countries as a share of GDP, with education and/or health expenditures declining to a lesser extent (Table 5). Overall, fiscal deficits in the nine countries fell, as a percentage of GDP, by amounts ranging from 2.3 percentage points in Azerbaijan to 9.7 percentage points in Russia. The limited data available on government budgetary arrears suggest that the incidence and relative size of new arrears decreased substantially after 2000 (Table 6). Thus, the reported improvements in fiscal data can be considered genuine. However, expenditure arrears remain in a number of countries, and several countries (Armenia, Moldova, and Uzbekistan) have reported sizable tax arrears.

Table 3

General Government Revenue and Grants in Selected BRO Countries, 1996-2002 (in percent of GDP)

	1996	1997	1998	1999	2000	2001	2002	Change, 1996-2002
Average (unweighted)	21,7	22,8	23,0	22,4	23,1	24,0	24,9	3,1
Armenia 1/	17,6	15,8	17,1	19,3	16,5	17,1	18,9	1,2
Azerbaijan	17,6	19,1	19,6	18,5	21,2	21,5	22,5	4,9
Georgia	13,8	14,4	15,6	15,4	15,2	16,3	16,2	2,4
Kazakhstan	13,3	13,6	18,2	17,4	21,7	25,6	22,6	9,3
Kyrgyz Republic 2/	15,9	16,2	18,0	21,5	18,5	20,4	22,8	6,9
Moldova	35,9	38,5	37,6	30,4	30,7	29,1	29,9	-6,0
Russia	34,5	38,3	33,0	34,0	36,9	37,0	37,2	2,7
Tajikistan	12,1	13,0	12,0	13,5	13,6	15,2	16,7	4,6
Ukraine	35,0	36,7	35,9	31,9	33,4	33,5	36,9	1,9

Source: Data compiled by IMF staff.

1/ Central government budget.

2/ State budget.

Table 4

General Government Expenditure and Net Lending in Selected BRO Countries, 1996-2002 (in percent of GDP)

	1996	1997	1998	1999	2000	2001	2002	Change, 1996-2002
Average (unweighted)	28,3	29,2	28,7	27,5	25,2	24,7	25,9	-2,5
Armenia 1/	26,9	21,6	21,3	24,8	21,1	21,1	21,2	-5,7
Azerbaijan	20,4	20,8	23,8	23,2	20,8	20,6	23,1	2,8
Georgia	20,8	20,6	20,5	20,4	17,7	18,0	18,1	-2,8
Kazakhstan	18,1	20,5	25,9	22,7	22,5	23,0	21,2	3,1
Kyrgyz Republic 2/	25,5	25,4	27,5	33,0	27,8	25,5	28,7	3,2
Moldova	43,8	49,0	44,0	35,0	34,1	29,7	30,8	-13,1
Russia	43,4	46,3	40,8	37,1	33,8	34,3	36,4	-7,0
Tajikistan	17,9	16,4	15,8	16,6	14,2	15,3	16,9	-1,0
Ukraine	38,2	42,2	38,7	34,2	34,7	35,1	36,3	-1,9

Source: Data compiled by IMF staff.

1/ Central government budget.

2/ State budget.

Table 5

Selected BRO Countries: Estimated Changes in Elements of General Government Expenditure  
(Figures in percent of GDP)

	Change in Total Expenditure	Change in Current Expenditure	Change in Education Expenditure	Change in Health Expenditure	Change in Capital Expenditure
Armenia	Decrease	-2,6	...	-0,4	0,6
Azerbaijan	Increase	3,7	-0,4	-0,5	3,9
Georgia	Decrease	-3,0	-1,0	-0,5	-1,1
Kazakhstan	Increase	4,0	-1,1	-0,6	-8,0
Kyrgyz Republic	Increase	0,3	-1,3	-1,3	-1,7
Moldova	Decrease	-8,7	-3,6	-2,5	1,5
Russia	Decrease	-8,5	-0,9	-0,9	...
Tajikistan	Decrease	-3,2	0,4	-0,3	-0,5
Ukraine	Decrease	-6,9	-0,4	-0,7	...

Sources: Data provided by the IMF's European II Department (for 2001–2002); the Fiscal Affairs Department (for 1996); and Fund Staff Reports (for Azerbaijan and for Tajikistan, 2001).

1/ Comparison of data for 1996 with 2002 for Armenia, Georgia, and Moldova; and 1997 with 2002 for Azerbaijan.

Table 6

Changes in Budgetary Arrears in Selected BRO Countries, 1996-2002 1/(in percent of GDP)

	1996	1997	1998	1999	2000	2001	2002
Armenia 2/	...	...	0,7	2,0	2,0	-0,2	-1,0
Azerbaijan	...	...	...	...	...	...	...
Belarus	...	...	...	1,1	1,2	0,1	...
Georgia	...	0,9	1,3	1,7	1,4	0,2	-0,4
Kazakhstan	...	...	...	...	...	...	...
Kyrgyz Republic	-0,2	-0,1	1,8	-0,3	-0,6	0,2	...
Moldova	4,1	-2,9	4,9	-0,1	-1,6	0,2	...
Russian Federation	...	...	...	...	...	...	...
Tajikistan 3/	...	-0,5	0,0	0,4	0,0	1,4	0,0
Ukraine	...	...	0,3	-1,0	-3,1	0,1	0,3
Uzbekistan	...	...	...	...	...	...	...

Sources: Data in various Fund Board documents; and data provided by Fund staff.

1/ Data reflect gross position of government sector vis-à-vis economy and exclude tax arrears.

2/ Data for 2002 reflect changes through end-June.

3/ Rise in 2001 reflects arrears on external debt service.

Levels and forecasts of public debt relative to GDP suggest that only three or four of the nine countries – Kazakhstan, Russia, Ukraine, and perhaps Azerbaijan – can be considered to have achieved fiscal sustainability, using the Fund's approach to assess sustainability through hypothetical shocks to growth, interest and exchange rates (Table 7). Debt-to-GDP levels are expected to be stable or declining in these countries, although the ratio could still reach and 45% for Ukraine under some circumstances, a level that in some other non-industrial countries have led to crises<sup>1</sup>. For Tajikistan, the debt to GDP ratio could rise sharply absent strong fiscal correction. Moreover, debt-to-GDP levels are already quite high in Armenia, Georgia, the Kyrgyz Republic, and Tajikistan. In addition, the energy sectors of most non-Baltic BRO countries – especially Azerbaijan and Belarus – have large-

<sup>1</sup> See Reinhart, Rogoff, and Savastano (2003).

scale quasi-fiscal activities, including major implicit subsidies and arrears to the budget and other entities, thus complicating the assessment of sustainability<sup>1</sup>.

Table 7

## Indicators of Fiscal Sustainability for Selected BRO Countries

	Publ. Debt/GDP	Forecast Debt/GDP	Chg in Debt/GDP
	2002 (Prel.)	for Medium-term 1/	Forecast for 2003 2/
Armenia	45.9% 3/		-5,1%
Azerbaijan	22.7% 4/		-1,9%
Georgia	55.0% 5/	41.1-50.9 percent	-0,7%
Kazakhstan	17,6%	lower	-2,9%
Kyrgyz Rep.	104,5%		1,9%
Moldova	65,0%		-3,6%
Russia	35.6% 5/	max. 35; prob. less	-8,6%
Tajikistan	227% 7/		7,4%
Ukraine	34.7% 5/	max. 45; prob. less	-3,0%

Sources: Data in recent Fund staff reports, and calculations by authors.

1/ Ratios are taken from recent Fund staff reports.

2/ For Georgia, actual changes. For Kyrgyz Rep., Moldova, and Tajikistan, forecasts by authors, based on the standard formula that the change in public debt/GDP equals  $(1+r)/(1+g)*\text{public debt/GDP}$ , minus the forecast primary balance. Calculations are available from the authors on request.

3/ Ratio of government and government guaranteed debt to GDP at end-2002.

4/ Ratio of external public and publicly-guaranteed debt to GDP at end-2002.

5/ Ratio of general government debt to GDP at end-2002.

6/ Ratio of external debt to GDP at end-June 2002.

### Countries with Notable Revenue Increases

For four countries in the group (Azerbaijan, Kazakhstan, Kyrgyz Republic, and Tajikistan), higher revenues were the key to better fiscal performance. Each raised government revenues by at least 4.5% of GDP, with Kazakhstan and Kyrgyz Republic achieving respective increases of 9.3 and 6.9% of GDP (Table 3)<sup>2</sup>. In two of these countries, Azerbaijan and Kazakhstan, higher energy prices contributed particularly to this result. In Azerbaijan, Fund staff estimate that higher revenue from the oil sector more than explains the rise in total revenue and grants, from less than 20% of GDP in 1998 to an estimated 28% of GDP in 2002<sup>3</sup>. In the case of Kazakhstan, Fund staff estimate that higher oil revenue explained about two thirds of the rise in total revenue and grants between 1999 and 2002.

Kazakhstan's experience shows how large oil revenues, combined with careful expenditure monitoring, can lead to a much improved fiscal position. Following a sharp rise in both revenue and expenditure relative to GDP during 1998, expenditure was cut by more than 3% of GDP in 1999, as the revenue-to-GDP ratio declined. Expenditure was then kept largely unchanged as a share of GDP during 2000 and 2001, despite revenue increases of about 4 percentage points of GDP in each year (Figure 2). As a result, the overall budget balance improved from a deficit of about 5% of GDP in 1999 to a surplus of about 3% of GDP in 2001 (IMF, 2003b, p. 91). In 2002, the revenue-to-GDP ratio fell by 3 percentage points. However, the fiscal balance remained in sur-

<sup>1</sup> For a detailed discussion of quasi-fiscal activities in the energy sectors of these countries, see Petri et al. (2002).

<sup>2</sup> In addition to raising revenue, Tajikistan has also reduced expenditures as a share of GDP. However, this reduction may not prove sustainable, because of continuing civil strife and pressures to increase social spending for poverty alleviation (IMF, 2001b).

<sup>3</sup> As reported in IMF (2003a). According to the data compiled by the Fund's European II Department, 2002 revenue was 22.6% of GDP (Table 3). See also Kwon (2003), p. 12.



plus, as expenditures declined by 1.5 percentage points of GDP. Moreover, the non-oil balance of the general government sector showed a net improvement of 3 percentage points of GDP relative to the non-oil deficit estimated for 1999 (IMF, 2003d, p. 7).

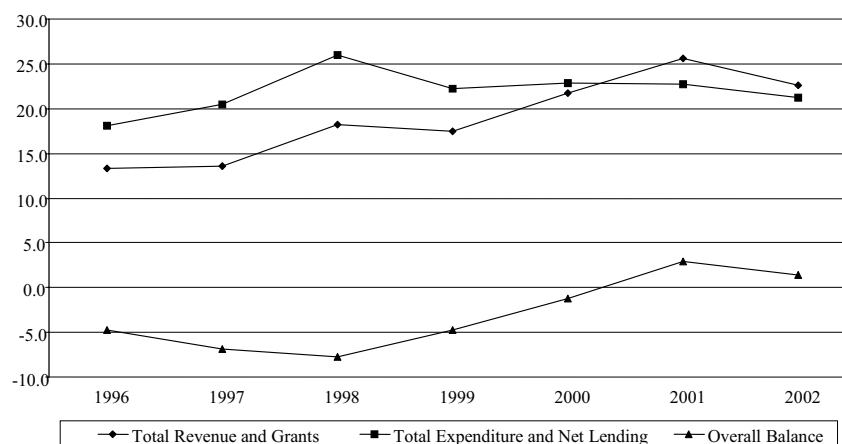


Fig. 2. Kazakhstan: Fiscal Trends, 1996-2002 (in percent of GDP)

In both Kazakhstan and Azerbaijan, fiscal performance appears to have benefited from the creation of special funds for oil-sector revenues. In Kazakhstan, the National Fund for the Republic of Kazakhstan (NFRK), established in 2001, helps stabilize the use of oil sector revenue. Under law, oil and gas revenues in excess of the annual baseline budgetary target are transferred to the NFRK, while transfers from the NFRK are allowed if budgeted revenues fall below projections. In Azerbaijan, the State Oil Fund of the Republic of Azerbaijan (SOFAZ) helps moderate expenditures from oil revenues. The rules for SOFAZ provide that all revenues from oil and gas production fields developed since the end of the USSR flow into the Fund, with outflows in any year limited to the amount of inflows. Thus, SOFAZ will likely accumulate savings, if not all inflows are used for expenditure. Despite the creation of SOFAZ, Azerbaijan's energy sector has had sizable quasi-fiscal subsidies, such as the sale of natural gas to state enterprises at prices below international levels and arrears on fuel and utility bills, that have taken time to address. Nevertheless, structural reforms to improve transparency and efficiency in the sector are estimated to have lowered these subsidies from 22% of GDP in 2000 to 11% in 2002, with further reductions expected in 2003 (IMF, 2003a).

For the Kyrgyz Republic, a drop in revenue performance during 2000 led to an ambitious fiscal adjustment program aimed at cutting the budget deficit almost in half (from 12% to 7% of GDP<sup>1</sup>) and clearing a portion of accumulated fiscal arrears. Cuts in health, education, and social security spending played a significant role in the adjustment. However, the government's failure to expand the tax base<sup>2</sup>, its expensive Public Investment Program, imperfect expenditure targeting, and high level of public debt (112% of GDP) required additional fiscal effort on the part of the authorities. New initiatives helped raise revenue by almost two percentage points of GDP in 2001. In 2002 real growth slowed appreciably, reflecting an accident at a major gold mine and reduced hydropower production. However, measures were taken to strengthen tax collections, reduce arrears, and improve customs administration, and revenues rose even more, by about 2.4 percentage points of GDP. These measures and a shortfall in spending for public investment kept overall fiscal performance in line with targets under the country's Fund-supported PRGF program. But with widespread poverty, a fiscal deficit exceeding 5% of GDP, and revenue dependent on highly vari-

<sup>1</sup> As reported in IMF (2000b). According to data compiled by the Fund's then European II Department, deficits were 9.3% of GDP in 2000 and 5.8% in 2002 (Table 1).

<sup>2</sup> For example, the agricultural sector, which accounts for almost 40% of GDP, is not taxed.

able gold output, the country's fiscal position remains vulnerable, even if conventional sustainability analysis suggests that the debt-to-GDP ratio is unlikely to rise sharply.

### Countries Where Expenditure Reduction Was Key: Armenia and Moldova

Expenditure compression was the main source of improved fiscal performance in two countries – Armenia and Moldova. In both countries expenditures fell by more than five percentage points of GDP, although for Armenia the figures are tempered by a buildup in arrears between 1998 and 2000 (IMF 2002a, p. 22)<sup>1</sup>. In Armenia, most of the decline in expenditure occurred between 1996 and 1997. However, fiscal performance also improved significantly after 1999, the year in which a sharp jump in expenditure led to a much larger deficit. Between 1999 and 2001, total expenditure fell by more than 3 percentage points of GDP, with declines in both current and capital expenditure. In current expenditure, outlays for every major category of spending declined as a percentage of GDP: wages, other purchases of goods and services, subsidies, transfers, and interest<sup>2</sup> (IMF 2002a, p. 22).

In Moldova, the drop in outlays reflected particularly a decline in spending for the social sphere – mainly health and education – together with decreases in miscellaneous and Social Fund outlays (IMF 2002b). The rationalization and comprehensive reduction in spending lowered outlays from 43.8% of GDP in 1996 to 30.8% in 2002 (Figure 3). On the revenue side, between 1994 and 1999 the Moldavian government introduced important reforms of the tax system, “broadening the tax base, simplifying tax administration, and bringing tax rates in line with the ones prevailing in other countries,” in the view of IMF staff (IMF, 2001a, p. 46). These reforms reduced revenue as a share of GDP, but expenditure cuts were nearly twice the 5.5% of GDP decline in revenue. Moldova's fiscal reforms led to the clearance of non-interest expenditure arrears and the establishment of purely cash payments for revenue<sup>3</sup>.

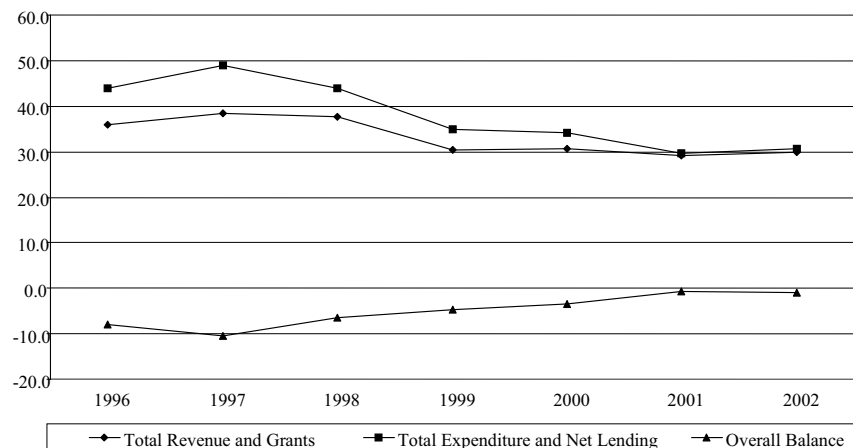


Fig. 3. Moldova: Fiscal Trends, 1996-2002 (in percent of GDP)

In the view of IMF staff, the size and composition of Moldova's fiscal adjustment were considered “consistent with a long-lasting budget consolidation” (IMF, 2001a, p. 54). At the same time, the sustainability of public sector wage freezes and the haphazard nature of cuts in public investment remain cause for concern (IMF, 2001a). Moreover, poverty is still widespread. The World Bank's 2001 Dynamic Poverty Study showed a rise in Moldova's poverty rate from 50% in

<sup>1</sup> In Moldova, available data indicate a noticeable decline in arrears between 1996 and 2000, although some new external arrears were incurred during 2001. See IMF, 2002b, pp. 6-7.

<sup>2</sup> Interest outlays decreased because lower inflation allowed a decline in interest rates on domestic debt.

<sup>3</sup> Better fiscal performance in 2000 and 2001 may also have reflected the first period of real economic growth since the beginning of transition.

1997 to nearly 70% in 1999. While the poverty rate declined to about 65% at end-2000, about 87% of the population was estimated to have disposable income below the country's subsistence minimum (IMF, 2002b).

### Russia: Expenditure Cuts and Revenue Gains, Underpinned by Oil

Russia's fiscal position has shown the most remarkable turnaround of all the BRO economies, moving from a deficit exceeding 7% of GDP in 1996 – 1998 to a surplus of roughly 3% of GDP in 2000 – 2001 and 0.8% of GDP in 2002. Both higher revenues and lower expenditures contributed to the improvement, with expenditure compression being especially important. Revenues rose moderately as a share of GDP during this period, increasing from 34.5% of GDP in 1996 to 37.2% in 2002. However, expenditure fell by 7 percentage points of GDP, from 43.4% in 1996 to 36.4% in 2002, after reaching even lower levels in 2000 and 2001 (Table 4 and Figure 4).

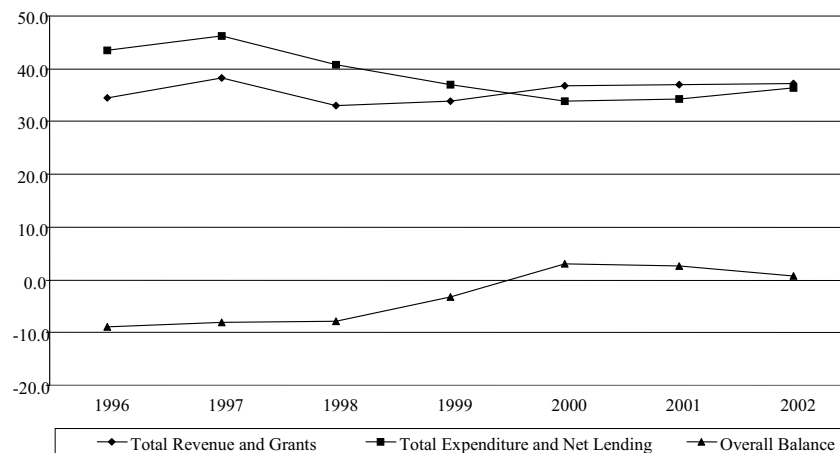


Fig. 4. Russian Federation: Fiscal Trends, 1996-2002 (in percent of GDP)

Russia's higher revenue yields have reflected not only improved economic performance, but also changes in tax policy and administration. These changes included the reintroduction of export taxes on petroleum in 1999 (a move aimed at capturing the windfall gains from higher energy prices, estimated at 2 percent of GDP<sup>1</sup>), a centralization of tax receipts, and better tax compliance, including an end to tax offset schemes that had allowed many large taxpayers to pay taxes through noncash means<sup>2</sup>. Among the measures introduced to improve tax compliance, in 2000 the graduated personal income tax was replaced with a flat rate tax of 13% on a much broader tax base. This last reform contributed to higher than expected personal income tax revenues during 2001, even though the effective tax rate on personal income fell slightly, from 14 to 13%<sup>3</sup>.

On the expenditure side, both the federal and local governments have reduced outlays, with the largest cuts involving defense, education, health, and housing (IMF, 2000a). Thus, combined expenditures for health and education fell from 7.6% of GDP in 1997 to 5.2% and GDP in 2000<sup>4</sup> (IMF, 2000a). Because budget arrears are also believed to have decreased during this period, these can be considered true cuts in expenditure, unlike many of the cash reductions during 1992-95, which accompanied large increases in arrears<sup>5</sup>.

<sup>1</sup> See IMF (2000a).

<sup>2</sup> See Chua (2003).

<sup>3</sup> See Mansoor and Spatafora (2002, p. 71).

<sup>4</sup> Calculated as a sum of expenditure at the federal and local levels.

<sup>5</sup> However, Ustinov (2002) contends that significant arrears remain in unrecorded activities.

However, Robinson (2003) contends that the Russian government could be pressured into running pro-cyclical expenditure policies, noting that the recent restraint in spending came more from *ad hoc* measures and a favorable political environment than from institutional strength.

Underlying these positive developments is the fact that Russia's fiscal performance remains highly dependent on oil prices. A recent study, for example, suggests that up to 80% of the improvement in general government revenues, and about half the gain in federal government revenues, from 1998 through 2001 can be attributed to the oil sector (Kwon, 2003). In view of the most recent increase in expenditures and a rise in revenues due to higher oil prices and personal income, Fund staff estimate that the non-oil deficit in Russia's general government sector nearly doubled in 2002, to 6.9% of GDP from 3.5% in 2001 and 2.8% in 2000 (IMF, 2003g).

In sum, Russia's fiscal position has improved dramatically in recent years and currently appears sustainable, in view of its recent public debt level (IMF, 2003g). However, further efforts, both on the revenue and the expenditure side, are needed to maintain macroeconomic stability in the face of volatile oil prices. In this regards, the Fund's Executive Directors have "endorsed the view that medium-term fiscal policy should aim for a roughly balanced budget based on a conservative oil price benchmark" (IMF, 2003b).

### **Countries with Structural Difficulties: Tajikistan, Georgia, and Ukraine**

The remaining three countries in the group – Tajikistan, Georgia, and Ukraine – face particularly important structural problems in the fiscal area. Tajikistan and Georgia suffer from low levels of revenue – about 17% of GDP in 2002. In such an environment, deep expenditure cuts alone are unlikely to yield a sustainable fiscal position. In Tajikistan, improved revenue performance (albeit from a low base) helped reduce the overall budget deficit from 5.8% in 1996 to near zero in 2001 and 2002. Yet poverty remains high, and social expenditures (for health and education), averaging about 7% of GDP, are noticeably below the average for the CIS countries (IMF 2003c, p. 10). In addition, the economy has large quasi-fiscal activities in the energy sector, estimated at 5-6% of GDP in 2001, reflecting low tariff rates and collection levels in the electricity, gas, and heating sub-sectors (IMF, 2003f). In Georgia, low revenues leave the fiscal position vulnerable to external shocks and hamper poverty reduction efforts. IMF staff estimate that even a rise in revenues of 2-3 percentage points of GDP, added to measures already taken in 2002, would close only about half the gap in health and education outlays between Georgia and other CIS countries and raise pensions to about half the poverty level (IMF, 2002c, p. 8). Thus, the fiscal situation remains delicate in both countries.

In Ukraine, a variety of structural problems has hindered fiscal performance. From 1996 to 2002, Ukraine's overall fiscal balance on a cash basis strengthened by 3.7 percentage points of GDP, the second smallest improvement among the nine intermediate countries, although the budget recorded a small surplus of 0.5% of GDP in 2002. Expenditure reductions equivalent to about 2.3% of GDP explain most of the improvement, with revenue increases responsible for the rest. However, the revenue to GDP ratio has not risen noticeably since 1997, largely reflecting weaknesses in tax policy. Moreover, the underlying fiscal position is worse than the cash outcome would suggest, because the government accumulated arrears totaling about 1% of GDP on refunds of VAT taxes during 2001 and 2002, while adding to arrears on social expenditure. Significant quasi-fiscal deficits remain in the energy sector. However, their relative size – estimated at 2.5% of GDP in 2002 (IMF, 2003h, p. 10) – was less than in Azerbaijan and Tajikistan.

As noted above, Ukraine has weaknesses in tax policy that limit revenue yields (IMF, 2003i, pp. 23-37). Income from important sources such as agricultural revenue, interest income from bank deposits, and capital gains on sales of company shares are exempt from personal income tax. Poorly targeted exemptions have also reduced VAT yields. After adjusting for overdue refunds, the ratio of VAT revenue to GDP in 2002 was less than in most other BRO countries. Moreover, the failure to adjust specific duty levels for inflation has lowered real yields from excise taxes. Generous incentives for agriculture and other specific industries, research and development activities, and a large number of free economic zones and priority development zones have eroded revenues from both VAT and profit taxes. Altogether, the main tax expenditures are projected to

reduce revenue by about 3.5% of GDP in 2003. Rationalizing these and other tax preferences would raise revenues in general and yields from indirect taxes in particular. This would allow Ukraine to rely less on direct taxation and permit some decline in its high payroll tax rates.

### The Sustainability of Expenditure Reductions

As noted above, expenditure compression has been important for the improved fiscal positions of a number of BRO countries, particularly Armenia, Moldova, and Russia (Figure 5). During the first few years of transition, similar cuts in expenditure were arguably unsustainable, because they reflected mainly sequestration and arrears, rather than reductions in purchases and expenditure orders (Cheasty and Davis, 1996). While the more recent spending cuts represent genuine reductions, one can still ask if they have been so great as to seriously weaken essential public services. In this case, they, too, may prove unsustainable.

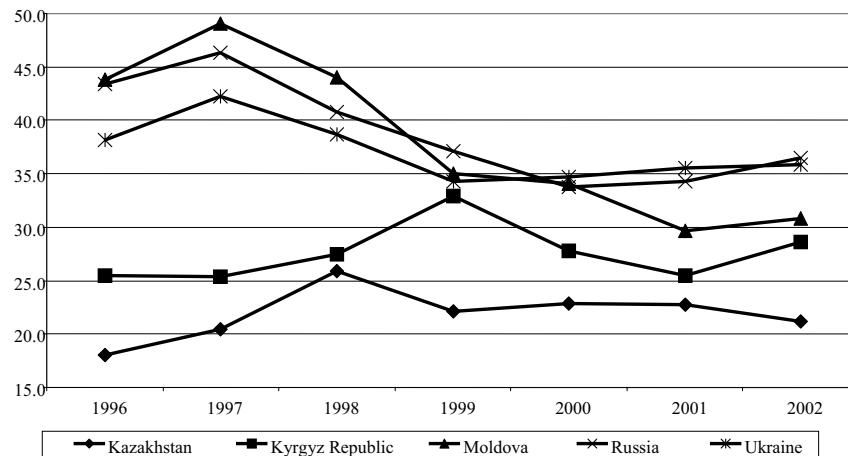


Fig. 5. Total Expenditure and Net Lending in Selected BRO Countries, 1996-2002 (in percent of GDP)

Mackenzie, Orsmond, and Gerson (1997) note that government can contribute to economic growth by investing in infrastructure, spending on education, health care, and by the adequate provision of basic public services, such as the rule of law and the social safety net. Similarly, Easterly (1998) has shown that certain types of public expenditure, particularly on infrastructure, contribute to growth. Gupta and others (1999) show that spending on health and education contributes to development in the long run. What matters, therefore, is whether spending cuts affect the level of service delivery, as opposed to rationalizing expenditure.

In many transition countries, a bloated civil service and other forms of inefficiency make it possible to reduce spending considerably over time, as part of a broader reform of public expenditures, without compromising the provision of public services. Lower outlays may simply reflect a rationalization of public expenditure programs, although reform programs may have transitory costs. In the Kyrgyz Republic, Fund staff have argued that the 40% reduction in education expenditure and the comparable reduction in spending for health between 1995 and 1999 did not have a detrimental effect on service provision. Indeed, "a further streamlining of activities, better targeting, and improved resource management should allow the quality of education and health services, even under tightened resource allocation, to be maintained" (IMF, 2000b, p. 80). Similarly, in the case of Moldova, the IMF staff has argued that expenditure efficiency has been low, even compared to other transition economies. As a result, "the same performance indicators [in education and health care] could be achieved with substantially lower spending on social programs" (IMF, 2001a, p. 78).

Nevertheless, expenditure compression may have weakened the delivery of important public services in other countries. The adjustment has been particularly strong in the poorer CIS countries, which under the previous Soviet system had received large transfers and must now rely

on their own revenue efforts (Lorie, 2003). Decreases in education or health spending as a share of GDP appear to have been small in most countries as a percent of GDP (Table 5). However, relative to the ratios of education or health spending to GDP in 1996 or 1997, the declines between then and 2001 or 2002 have often been 25 to 33%, since education and health outlays typically average less than 5% of GDP in these countries. Indeed, Lorie (2003) notes that health appears to have been the sector most affected by expenditure compression, with health care expenditure averaging about 2% of GDP, and about 7% of total government expenditure, in the CIS, not much above the average for emerging market countries.

As for other categories of expenditure, high inflation during the early years of transition and shrinking real revenues have made it hard to preserve the real level of public pensions. The indexation of these benefits has not kept up with the cost of living. Thus, in Russia, by 1996 the average pension had fallen to 65%, and the minimum pension to 30%, of its real level in 1991 (Lopez-Claros and Alexashenko, 1998). These developments dramatically reduced living standards for the elderly and contributed to a substantial rise in poverty rates in many BRO countries. As noted earlier, the percentage of the population below the national poverty line rose from 50 to nearly 70% in Moldova between 1997 and 1999, before declining to an estimated 65% in 2001. In Azerbaijan, the State Statistics Committee has estimated that nearly half the population was below the poverty line in 2002 (IMF, 2003a, p. 10). In Russia, by contrast, the poverty rate is estimated to have fallen from 45% in 1995 and 55% just after the 1998 crisis to about 36% in 2000 and 27% in 2001 (Russia Longitudinal Monitoring Survey, 2002). Using international standards, at least one third of the population in seven of the BRO countries (Armenia, Kyrgyz Republic, Moldova, Tajikistan, Turkmenistan, Ukraine, and Uzbekistan) was estimated to live on less than US\$2 per day during the World Bank's most recent national poverty surveys (Table 8).

Table 8

## BRO Countries: Poverty Rates

Country	Year	Percent of Population Below National Poverty Line	Year	Percent of Population Below	
				US\$1 per day	US\$2 per day
Armenia	1998	55.0	1998	12.8	49.0
Azerbaijan	2002	Almost 50 1/	2001	3.7	9.1
Belarus	1998	33.0	2000	Less than 2	Less than 2
Estonia	1995	8.9	1998	Less than 2	5.2
Georgia	1997	11.1	1998	Less than 2	12.4
Kazakhstan	1996	34.6	1996	1.5	15.3
Kyrgyz Republic	1997	51.0	2000	0.2	34.1
Latvia	...	...	1998	Less than 2	8.3
Lithuania	...	...	2000	Less than 2	13.7
Moldova	2001	65 1/	2001	22.0	63.7
Russian Federation	2001	27 1/	2000	6.1	23.8
Tajikistan	...	...	1998	10.3	50.8
Turkmenistan	...	...	1998	12.1	44.0
Ukraine	1995	31.7	1999	2.9	45.7
Uzbekistan	...	...	1998	19.1	44.2

Source: World Bank, *World Development Indicators, 2003*; and data reported in IMF Country Reports.

1/ Official estimates reported in IMF Country Reports.

Social indicators (Table 9) for the group of nine intermediate reformers suggest that lower social spending and other economic changes have had a mixed impact on the quality of life. Average life expectancy at birth fell by two years during the 1990s, although the decline slowed be-

tween 1995 and 2001. Secondary school enrollment fell, too, by about 10% for males and 12% for females, with the decline in the early 1990s exceeding a small recovery between 1995 and 2001. Other social indicators (immunization rates, infant mortality) showed improvement over the course of the decade. Of course, the deterioration in the first set of indicators may have resulted mainly from the initial shock of transition and its consequences, rather than the fiscal adjustment of the late 1990s.

Table 9

Change in Average Social Indicators for the Intermediate Reformers 1/

	Change 1990-2001		Change 1990-95		Change 1995-2001	
Life expectancy at birth, total (years)	-2,0		-1,8		-0,2	
Immunization, DPT (% of children under 12 months) 2/	13,5	3/	8,9	4/	4,6	
Immunization, measles (% of children under 12 months) 5/	3,9	3/	4,6	4/	-0,7	
Mortality rate, infant (per 1,000 live births)	-1,5		-0,5		-1,0	
School enrollment, secondary, female (% gross)	-12,0	6/	-13,9		1,9	7/
School enrollment, secondary, male (% gross)	-9,9	6/	-10,3		0,4	7/

Source: World Bank, *World Development Indicators* 2003 online database.

1/ Armenia, Azerbaijan, Georgia, Kazakhstan, Kyrgyz Republic, Moldova, Russia, Tajikistan, and Ukraine

2/ Excluding Moldova.

3/ Change 1992-2001.

4/ Change 1992-95.

5/ Excluding Azerbaijan and Georgia

6/ Change 1990-95.

7/ Change 1995-96.

Some countries are better positioned to combat poverty than others. In Kazakhstan, the prospect for further increases in oil revenue will create opportunities to address poverty and provide additional funds for health, education, and social insurance, for which combined expenditures during 2001-2002 were more than 8 percentage points of GDP below the CIS average in 2001 (IMF, 2003c, p. 13). In countries such as Armenia, Georgia, and Kyrgyz Republic, where the revenue to GDP ratio is lower, addressing poverty will depend on the ability to raise additional revenue. Thus, reforms aimed at mobilizing further revenue will inevitably play a part in their adjustment and poverty reduction programs.

## Conclusions

In the early 1990s, the 15 BRO countries started on the path of transition to a market economy. Their experiences, both in fiscal adjustment and in the reform effort in general, differed over the course of the decade, and by the end of the 1990s the countries could be classified into three broad groups. These can be described as the advanced reformers (the three Baltic states), slow reformers (Belarus, Uzbekistan, Turkmenistan), and intermediate reformers (Armenia, Azerbaijan, Georgia, Kazakhstan, Kyrgyz Republic, Moldova, Russia, Tajikistan, and Ukraine).

This paper concentrates on fiscal adjustment in the last group of countries. The available information indicates that by 2002, many had genuinely improved their fiscal performance. Reforms in revenue and expenditure policy and administration were the main reasons for the improvement. In a few cases (Azerbaijan, Kazakhstan, and Russia), higher oil sector revenues, reflecting higher world oil prices, were also an important contributing factor. This experience stands in sharp contrast with the developments in 1991-1995, when the nominal fiscal adjustment was attained largely by disorganized expenditure cuts and the accumulation of arrears.

At the same time, it is hard to say that many of these countries have achieved a sustainable fiscal position, in the sense of achieving a moderate public debt-to-GDP ratio that can be maintained, under current policies, in the face of foreseeable shocks. By this criterion, the closest is probably Kazakhstan, where the ratio was less than 20% at end-2002 and has been forecast to decline further in 2003. Azerbaijan, where the ratio at end-2002 was about 23%, with a forecast of about 20% for 2003, may also qualify. Both countries are major oil exporters with relatively low per capita gross national incomes (in 2002, about US\$1,500 for Kazakhstan and US\$710 for Azerbaijan – see World Bank, 2003). Thus, both may face challenges of keeping expenditures in line with revenues while trying to address poverty and boost growth through social expenditure. Fund staff have also argued that debt dynamics are sustainable in the Russian Federation, where the public debt to GDP ratio approached 36% at end-2002 and has been forecast to fall to about 27% in 2003 (IMF, 2003g). However, the fiscal position appears vulnerable to a sustained, sharp drop in oil prices. In a fourth country, Ukraine, the public debt-to-GDP ratio approached 35% at end-2002. Stress tests suggest that the ratio could exceed 40% under conceivable circumstances, and arrears on VAT tax refunds remain to be addressed. Thus, Ukraine's sustainability is questionable.

For the other five countries, where public debt-to-GDP ratios exceed 40%, fiscal sustainability is more in doubt. Budgetary arrears remain a problem in Armenia, while Moldova continues to incur external arrears (including arrears on debt service). The public debt-to-GDP ratio in Georgia exceeded 50% at end-2002, and Fund support for the government's adjustment program was suspended in September 2003 because of difficulties in achieving agreed improvements in the fiscal position. However, a new three-year arrangement under the Fund's Poverty Reduction and Growth Facility was approved in June 2004 (IMF, 2004b). In the Kyrgyz Republic and Tajikistan, public debt-to-GDP ratios exceed 100%, despite active adjustment programs. Moreover, poverty rates remain high in all five countries. Thus, the ability to strengthen revenue performance, to allow higher spending on effective poverty reduction programs, remains an important concern.

In summary, while fiscal performance in the nine countries has clearly improved, it is too early to conclude that most have achieved a sustainable fiscal position. This may explain why many of these countries have continued to seek Fund support for their adjustment and anti-poverty efforts, and why their fiscal positions bear watching over the medium term.

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