Economic Miracle of Post-Soviet Space: Why Uzbekistan Managed to Achieve What No Other Post-Soviet State Achieved

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ECONOMIC MIRACLE OF POST-SOVIET SPACE: 
WHY UZBEKISTAN MANAGED TO ACHIEVE WHAT NO OTHER POST 
SOVIET STATE ACHIEVED 

Vladimir Popov 

ABSTRACT 
Uzbekistan is not usually considered an economic success story, but in fact it is: its GDP increased since 1989 more than in any other post-communist country, except for China, Vietnam and Turkmenistan. The success of Uzbekistan is very much similar to the Chinese – gradual economic reforms with the preservation of the capacity of state institutions, good macroeconomic policy and export oriented industrial policy. What makes Uzbekistan unique is that no other former Soviet republic managed to follow this route. There are countries with healthy state finances and low inflation (most FSU states), there are some countries with reasonable state capacity (Baltics, Belarus, Azerbaijan, Turkmenistan, Kazakhstan), but there are no countries that keep undervalued exchange rate together with strong tax stimuli for export of manufactures. Uzbek example shows that such a policy pays off.
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Vladimir Popov\textsuperscript{2}

After the collapse of the USSR and market oriented reforms in successor states the comparative performance in post-Soviet space varied greatly (fig. 1). In retrospect, it is obvious that rapid economic liberalization did not pay off: many gradual reformers (that were called procrastinators at a time) from the former Soviet Union (FSU) performed better than the champions of liberalization – Baltic States and Central Europe. In Belarus, Turkmenistan, and Uzbekistan, for instance, privatization was rather slow – over 50\% of their GDP is still created at state enterprises (fig.2), but their performance is superior to that of more liberalized economies. Resource abundance definitely helped resource exporters, such as Azerbaijan, Kazakhstan, Russia, and Turkmenistan, to maintain higher incomes recently, when resource prices were high, but was not a \textit{sine qua non} for growth – resource poor Belarus and self-sufficient Uzbekistan did much better than resource rich Russia.

As recent research shows, the crucial factor of economic performance was the ability to preserve institutional capacity of the state (Popov, 2000, 2007a, Popov, 2011b for a survey). The story of transition was very much a government failure, not a market failure story. In all former Soviet republics and in East European countries, government spending fell during transition and the provision of traditional public goods, from law and order to health care and infrastructure, worsened. This led to the increase in crime, shadow economy, income inequalities, corruption, and mortality. But in countries with the smallest decline in government spending (countries very different in other respects – Central Europe, Estonia, Belarus, Uzbekistan), these effects were less pronounced and the dynamics of output was better.

\textsuperscript{1} A version of the paper in Russian: “ЭКОНОМИЧЕСКОЕ ЧУДО ПЕРЕХОДНОГО ПЕРИОДА. Как Узбекистану удалось то, что не удалось ни одной постсоветской экономике”.

\textsuperscript{2} The opinions expressed herein are strictly personal and do not necessarily reflect the position of organizations with which the author is associated.
Fig. 1. GDP change in FSU economies, 1989 = 100%

Source: EBRD Transition Reports for various years. Central Europe is the unweighted average for Czech Republic, Hungary, Poland, Slovakia, and Slovenia.
Uzbekistan – economic star?

Uzbekistan is very much an economic success story in post-Soviet space. Its transformational recession was very mild as compared to other countries of former Soviet Union, its GDP more than doubled in 1989-2012 – better result than even in Central European countries (fig. 1), its life expectancy (now 68 years) did not increase much, but did not fall like in other former Soviet republics in the 1990s, its population increased from 20 mln. in 1989 to 30 mln. in 2013, and its murder rate is low (3 per 100,000 of inhabitants, lower than in the US). In 2009, during economic recession, only Kazakhstan and Azerbaijan showed higher growth rates than Uzbekistan, whereas in most other post communist countries there was a reduction of output.

Uzbekistan’s performance is not as spectacular as Chinese, but is truly exceptional for the post-Soviet space. Partly it is due to good external environment (Uzbekistan is the exporter of commodities – cotton, gold and gas, whose world prices increased in recent
2 decades), but more important reasons are associated with good macroeconomic and industrial policies. Uzbekistan became the only country in post Soviet space that managed to increase the share of industry in GDP, the share of machinery and equipment in total industrial output and in exports. It created competitive export oriented auto industry from scratch. In 2011 it became 15th country in the world to launch high speed train between Tashkent and Samarkand (to be continued to Bukhara and Karshi by 2015). The train is made by Spanish Talgo and runs a distance of 344 km in 2 hours 10 minutes.

The inclusiveness of growth appears to be higher in Uzbekistan as well. Official estimates for Uzbekistan put Gini in 2012 at just above 30% (WB estimates for 2002-03 – 35-36%), which is lower than in most transition economies. Meanwhile, in more liberalized economies of Russia, Georgia and Kyrgyzstan income distribution is noticeably more uneven.

**Fig. 3. Gini coefficient of income distribution in post Soviet states, %**

Source: WDI.
Another indicator of income distribution at the very top is the number of billionaires. The recent count (Forbes, 2013) puts Russia and Georgia ahead of all the others in terms of billionaire-intensity (number of billionaires per $1 trillion PPP GDP), followed by Ukraine, Czech Republic and Kazakhstan and (table 1). Other former USSR countries do not have any billionaires yet, although their PPP GDP is higher than Georgian. For instance, Azerbaijan and Uzbekistan were supposed to have about 10 billionaires, if they had a Russian level of billionaire-intensity, but in fact they do not have any.

Table 1. Billionaires in former USSR, Eastern Europe China, and Vietnam

<table>
<thead>
<tr>
<th></th>
<th>Number of billionaires</th>
<th>Total wealth</th>
<th>PPP GDP, 2012</th>
<th>Number per 1 trillion PPP GDP</th>
<th>Wealth of billionaires to PPP GDP, %</th>
</tr>
</thead>
<tbody>
<tr>
<td>China</td>
<td>122</td>
<td>260.9</td>
<td>12471</td>
<td>20.9</td>
<td>2.1</td>
</tr>
<tr>
<td>Russia</td>
<td>110</td>
<td>403.8</td>
<td>3380</td>
<td>119.5</td>
<td>11.9</td>
</tr>
<tr>
<td>Ukraine</td>
<td>10</td>
<td>31.3</td>
<td>338.2</td>
<td>92.5</td>
<td>9.3</td>
</tr>
<tr>
<td>Kazakhstan</td>
<td>5</td>
<td>9.2</td>
<td>233</td>
<td>39.5</td>
<td>3.9</td>
</tr>
<tr>
<td>Czech Republic</td>
<td>4</td>
<td>14.0</td>
<td>277.9</td>
<td>50.4</td>
<td>5.0</td>
</tr>
<tr>
<td>Poland</td>
<td>4</td>
<td>9.8</td>
<td>844.2</td>
<td>11.6</td>
<td>1.2</td>
</tr>
<tr>
<td>Georgia</td>
<td>1</td>
<td>5.3</td>
<td>26.6</td>
<td>199.2</td>
<td>19.9</td>
</tr>
<tr>
<td>Vietnam</td>
<td>1</td>
<td>1.5</td>
<td>322.7</td>
<td>4.6</td>
<td>0.5</td>
</tr>
<tr>
<td>Romania</td>
<td>1</td>
<td>1.1</td>
<td>352.3</td>
<td>3.1</td>
<td>0.3</td>
</tr>
<tr>
<td>Uzbekistan</td>
<td>0</td>
<td>0</td>
<td>107</td>
<td>0.0</td>
<td>0.0</td>
</tr>
</tbody>
</table>

Source: Forbes billionaires list (http://www.forbes.com/billionaires/#page:1_sort:0_direction:asc_search:_filter:All%20industries_filter:All%20countries_filter:All%20states); WDI.

The relatively successful economic performance is even more impressive given that Uzbekistan is not a major oil and gas exporter and is one of two double landlocked countries in the world — that is, a country completely surrounded by other landlocked countries — the other being Liechtenstein.
To be sure, Uzbekistan still remains a poor country, with PPP GDP per capita of $US 3600 in 2012 against $24,000 in Russia and over $10,000 in Azerbaijan, Kazakhstan and Turkmenistan, and many Uzbeks are migrating to find a job in Russia and not vice versa. But it is necessary to separate the effects associated with the dynamics of output from the effects of the terms of trade and financial flows. At the end of the Soviet period, in the 1980s, real incomes in Uzbekistan were about half of the Russia level. After the collapse of the USSR real incomes in non-resource republics fell dramatically due to the change in relative prices – oil, gas and other resources became several times more expensive relative to ready made goods (Uzbekistan was a large importer of oil and its trade with all countries, including other Soviet republics, if recalculated in world prices, yielded a deficit of 9% of GDP – Soviet economy, 1990). To add insult to injury, with the collapse of the Soviet Union financial flows from Moscow dried up (in 1990 only inter-budgetary transfers –from the Union budget – amounted to 31% of the revenues of the republican budget –Soviet Economy, 1991).

Hence, the sharp reduction of real incomes in the early 1990s was larger than the reduction of output and was due mostly to poor external environment, to circumstances, not to policies and choice. However, the dynamics of real output, i.e. of physical volume of output (fig. 1) that is dependent not only on circumstances, but also on policies, was better than in all countries of Eastern Europe and former USSR except for Turkmenistan.

Success has many fathers...

In 2002 Stephen Kotkin used the term “Trashkanistan” (Kotkin, 2002, cited in Spechler, 2008) to describe Central Asia: “a dreadful checkerboard of parasitic states and statelets, government-led extortion rackets and gangs in power, mass refugee camps and shadow economies. Welcome to Trashcanistan”. In fact, Stephen Kotkin applied this characterization to all the states of the former Soviet Union with the exception of Estonia, which he called “the great bright spot (approaching the level of Slovenia, the star in East-Central Europe)”. However, other experts were drawing attention to the economic success of Uzbekistan, calling it a candidate for becoming a Central Asian tiger (Spechler, 2000).
Very early in transition continuous good performance of Uzbekistan became a controversial issue. According to the conventional wisdom, non-liberalized post-communist economies with authoritarian regimes that proceeded with very gradual market-oriented reforms were not supposed to exhibit good economic performance. In fact, in 1998, in a paper entitled “The Uzbek Growth Puzzle” Jeronim Zettelmeyer (1998) wondered why authoritarian and non-reformist Uzbekistan was doing better than other former Soviet Union (FSU) countries. He concluded that “Uzbekistan could surely have done better by creating an environment that was friendlier to the private sector entry and private production and marketing incentives, including in particular the cotton sector.” He suggested that Uzbekistan could have been “unusually effective at preventing the collapse of (relatively small) industrial sector by combining rigid state control with subsidies that were in large part financed by cotton exports, and by ensuring an uninterrupted supply of energy” (Zettelmeyer, 1998, p. 32).

The alternative view is that Uzbekistan was able to avoid the collapse of the institutional capacity of the state that occurred in many post Soviet states. Martin Spechler points out that “in the area of human development, the Soviet overall record <in Central Asia> was impressive, at least compared with Muslim and Turkic countries to the immediate south” (Spechler, 2008, p. 28), that Uzbekistan is the most successful state builder among poor CIS countries (Spechler, 2008, p. 55), that there is an evidence of “institutional effectiveness” with regards to state investment and support of the industrial sector with direct subsidies and credits” (Spechler, 2008, p.66).

**Macroeconomic policy**

In 2008-2012 Uzbekistan was growing at 8-9% rate, with barely visible decline in growth rates during 2008-09 recession, had a stable inflation of 7 to 8%³, a positive fiscal balance and rapidly declining debt to GDP ratio, a current account surplus and growing foreign exchange reserves. Foreign reserves for the end of 2012 were estimated at about $40 billion (15 months of imports against 5 months in 2004), not including about $5 billion (2010) in the Reconstruction and Development Fund of Uzbekistan.⁴

³ Alternative estimate of the IMF put inflation in 2012 at 11% (WB, 2013).

⁴ In 2006 Uzbekistan’s Fund for Reconstruction and Development (FRD) was established. It has been used primarily for sterilization and accumulation of foreign exchange revenues, but officially it was presented as a financial institution for providing government-guaranteed loans and equity investments to
However, here Uzbekistan is not exceptional. Many countries of former USSR have managed to put their government finances in order in recent years and enjoy budget surpluses, moderate inflation, and growing foreign reserves. What makes Uzbekistan different and even unique is a policy of low exchange rate. It promotes export oriented development – like in Japan in the 1950s-70s, South Korea in the 1960-80s, China and ASEAN countries since the 1990s (Dollar, 1992; Easterly, 1999; Polterovich, Popov, 2004; Rodrik, 2008; Bhala, 2012). Former communist countries of Eastern Europe and USSR did not carry out such a policy, on the contrary, their exchange rates was and is often overvalued, especially in countries that export resources (they suffer from the Dutch disease).

Since 2000 Uzbekistan is probably the only country in post Soviet space that carries out predictable and **gradual nominal devaluation of the currency** which is a bit larger than needed to counter the differences in inflation rates between Uzbekistan and its major trading partners, so that real effective exchange rate depreciates slowly. The real exchange rate of the som versus the US dollar has appreciated a bit, though not as much as currencies of other countries (fig.4). However, the real *effective* exchange rate of som decreased by over 50% in 2000-07 – a sharp contrast with other countries of the region on which data are available (fig.5).

Exporters in Uzbekistan are forced to submit half of their revenues in foreign currency at a rate that is considerably below the street rate. The rationale is the centralization of foreign currency earnings and import control – it allows the government to prioritize purchases abroad. The Reconstruction and Development Fund of Uzbekistan is now playing the role of both Stabilization Fund and Investment Fund (to finance imports for national projects).

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strategic sectors of the domestic economy. It was established by Uzbekistan’s Cabinet of Ministers, Ministry of Finance and five largest state-owned banks. The equity capital of the fund reached USD 5 billion in 2010. The FRD provides debt financing for modernization and technical upgrade projects in sectors that are strategically important for the Uzbek economy (energy, chemicals, non-ferrous metallurgy, etc.). All loans require government approval. The credit portfolio of the FRD reached USD 871 million in 2010 (BEEBA, 2011).
Fig. 4. Real exchange rate to the US dollar

Source: WDI.

Fig. 5. Real effective exchange rate of Uzbek som

Source: WDI.
Industrial policy and economic diversification

Industrial structure matters for economic development. In theoretical models it is often assumed that there are externalities from industrialization and industrial export (Murphy, Shleifer, Vishny, 1989; Polterovich, Popov, 2004). And there is growing evidence that more industrialized countries and countries with more technologically sophisticated industrial export are growing faster than others (Hausmann, Hwang, Rodrik, 2006; Rodrik, 2006). But not all countries are able to climb the technological ladder and to diversify and upgrade the structure of their economies and exports. In most transition economies there occurred a primitivization of the industrial structure as secondary manufacturing and high tech industries proved to be uncompetitive after deregulation of prices and opening up of the economy and curtailed their output.

The increase in the share of service sector, especially trade and finance, at the expense of industry (deindustrialization) occurred in all post communist economies (previously in the centrally planned economies the service sector, in particular trade and finance, were underdeveloped), but it seems like in many of these economies deindustrialization went too far. In Tajikistan, for instance, the share of services in GDP nearly doubled –
increased from about 30% in the beginning of the 1990s to 57% in 2010 (WDI), whereas the share of manufacturing in GDP fell from 25% in 1990 to 10% in 2010. In Russia the share of fuel, minerals, metals and diamonds in total export grew from 52% in 1990 (USSR) to 67% in 1995 and to 81% in 2012, whereas the share of machinery and equipment fell from 18% in 1990 (USSR) to 10% in 1995 and to 4.5% in 2012.

The structure of exports in most countries of North and Central Asia also became more primitive in recent two decades – the share of manufactured goods in total exports either declined or did not show any clear tendency towards increase (fig. 6). Partly it was caused by the increase in resource prices and resource boom – expansion of fuel production and exports in Azerbaijan, Kazakhstan, Russia, and Turkmenistan.

**Fig. 6. Manufactures exports, % of merchandise export**

![Manufactures exports, % of merchandise exports](image)

Source: WDI.

The only exception to the rule and the only example of relatively successful diversification may be Uzbekistan. It managed to encourage and carry out three important structural shifts in its economy: (1) decrease in cotton production and export and increase in food production, achieving self-sufficiency in food, (2) achieving self-
sufficiency in energy and becoming a net fuel exporter; (3) increasing the share of industry in GDP and the share of machinery and equipment in industrial output and export.

Diversification in agriculture was carried out mostly via state orders (less for cotton, more for cereals), so production of cotton decreased by 50% (as compared to the late 1980s) and output of cereals and vegetables increased several times (fig. 7). Increase in gas output was due mostly via state investments (gas and oil are produced by state holding company “Uzbekneftegaz”). And diversification in industry and expansion of manufacturing exports was the result of government / central bank policy of low exchange rate. Like China, Uzbekistan maintained a low (undervalued) exchange rate due to rapid accumulation of foreign exchange reserves. In addition, there were non-negligible tax measures to stimulate exports of processed goods (50% lower tax rate for manufacturing companies that export 30% and more of their output).

**Fig. 7. Diversification in agriculture**

![Production of some agricultural goods, thousand tons](http://www.stat.uz/en/)

Source: State Committee on Statistics of Uzbekistan (http://www.stat.uz/en/)
Although comparable statistics from WDI for Uzbekistan is lacking (fig. 6), national statistics suggests that the share of non-resource goods in exports increased to over 70% against less than 30% in 1990, before independence (Foreign Affairs Department of Uzbekistan, 2013).

Uzbekistan became one of the few transition countries, where the share of industry increased in recent years (fig. 8). It also managed to upgrade of the structure of industrial output – the share of machinery and equipment and chemicals increased at the expense of light industry (table 2). Other post Soviet economies also experienced the decline of light industry together with the decline of machine building that created space for the expansion of fuel, energy, steel and non-ferrous metals.

Fig. 8. GDP structure by sectors of the economy, % of total

Table 2. Structure of industrial output in 1991 and in 2011 in current prices, % of total

<table>
<thead>
<tr>
<th>Industry</th>
<th>1991</th>
<th>2011</th>
</tr>
</thead>
<tbody>
<tr>
<td>Electric energy</td>
<td>2.7</td>
<td>8.0</td>
</tr>
<tr>
<td>Fuel</td>
<td>3.7</td>
<td>17.5</td>
</tr>
<tr>
<td>Steel</td>
<td>0.8</td>
<td>2.6</td>
</tr>
<tr>
<td>Non-ferrous metals</td>
<td>9.7</td>
<td>10.4</td>
</tr>
<tr>
<td>Chemical and petrochemical</td>
<td>4.0</td>
<td>5.5</td>
</tr>
<tr>
<td>Machinery and equipment</td>
<td>11.6</td>
<td>16.1</td>
</tr>
<tr>
<td>Wood, pulp and paper</td>
<td>1.6</td>
<td>1.1</td>
</tr>
<tr>
<td>Construction materials</td>
<td>4.3</td>
<td>5.3</td>
</tr>
<tr>
<td>Light</td>
<td>39.8</td>
<td>13.5</td>
</tr>
<tr>
<td>Food</td>
<td>14.8</td>
<td>14.0</td>
</tr>
<tr>
<td>Other</td>
<td>7.1</td>
<td>6.1</td>
</tr>
<tr>
<td>Total</td>
<td>100.0</td>
<td>100.0</td>
</tr>
</tbody>
</table>

Source: State Committee on Statistics of Uzbekistan (http://www.stat.uz/en/)

Auto industry was created in Uzbekistan from scratch after independence behind the protectionist wall. The car production was supported by the government and the Korean auto company Daewoo. After Daewoo went bankrupt, US General Motors became the partner of the government. The government also bought a stake in Turkey's Koc in SamKochAvto, a producer of small buses and lorries. Afterwards, it signed an agreement with Isuzu Motors of Japan to produce Isuzu buses and lorries. In 2013 Uzbekistan will produce 274,000 cars, including 142,000 for export. In 2011 the engine plant in Tashkent became operational (joint venture of State Auto Company and General Motors) with the capacity of 360,000 engines a year.

Uzbekistan’s exports increased dramatically – from $2 billion in 1992 to $15 billion in 2011, or from $100 per capita to $500 (fig. 9). The share of former USSR countries in exports fell from over 60% in 1992 to less than 40% in 2012 (fig. 10).
The share of cotton in export fell from 65% in 1992 to only 9% in 2012, whereas the share of fuel (mostly gas) and oil products increased from 4 to 38%, the share of machinery and equipment – from 2 to 7%, the share of chemical products – from 6 to
9%. In imports the share of food fell from 43 to 10%, whereas the share of machinery and equipment increased from 10 to 46% (fig.11).

**Fig. 11. Commodity structure of export and import, % of total**

![Diagram showing commodity structure of export and import](source)


Economic success of Uzbekistan is very much similar to the Chinese – gradual economic reforms with the preservation of the capacity of state institutions, good macroeconomic policy and export oriented industrial policy. What makes Uzbekistan unique is that no other former Soviet republic managed to follow this route. There are countries with healthy state finances and low inflation (most FSU states), there are some countries with reasonable state capacity (Baltics, Belarus, Azerbaijan, Turkmenistan, Kazakhstan), but there are no countries that keep undervalued exchange rate together with strong tax stimuli for export of manufactures. Uzbek example shows that such a policy pays off.
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