



Action Needed: Spiraling Drug Prices Empty Russian Pockets

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Key Messages

- **Spending on drugs contributes to the high level of out-of-pocket (OOP) payments for health care in Russia.** This is mostly due to lack of an outpatient drug benefit under the Mandatory Health Insurance Program and the underfunding of drugs for hospital care.
- **Drug prices in Russia increased substantially during the ongoing economic crisis.** While the official Consumer Price Index (CPI) increased by 15 percent between March 2008 and March 2009, retail drug prices increased by 29 percent.
- **The increased drug prices have had a significant impact on the affordability of medicines, particularly among vulnerable population groups.** As a result of the recent increase in drug prices, the poor, *on average*, may have lost more than 1 percent of their total household expenditure.
- **There are several options for improving access to and affordability of drugs in Russia,** including adopting an essential outpatient drugs benefit package that could be offered through the Mandatory Health Insurance Program.

Spending on Drugs in Russia

High out-of-pocket (OOP) expenditure for drugs in Russia relative to OECD countries.

In large measure, this is due to the relatively low level of public health spending in the country (about 3.6 percent of GDP in 2008) that underlines the significant gap between the constitutional commitment to a range of medical care services and the actual funding to pay for them. While drugs are supposed to be provided to hospital patients free of charge, an estimated 80 percent of inpatients still have to pay part of the costs of their medicines and most outpatients must purchase them from pharmacies. The outpatient drug program under mandatory health insurance covers only around 16 million people (11 percent of the total population in the country), with more than half of them opting to receive cash rather than in-kind benefits under the 2005 ‘monetization’ of prescription drug benefits. Those who continue with the in-kind benefits appear to be the ones greatest in need of drugs. The situation is further aggravated by the country’s ineffective enforcement of controls on wholesale and retail mark-ups for medicines. Household expenditure on drugs accounted for about 30 percent of total health expenditure in Russia, as compared to 12 percent in OECD countries in 2008

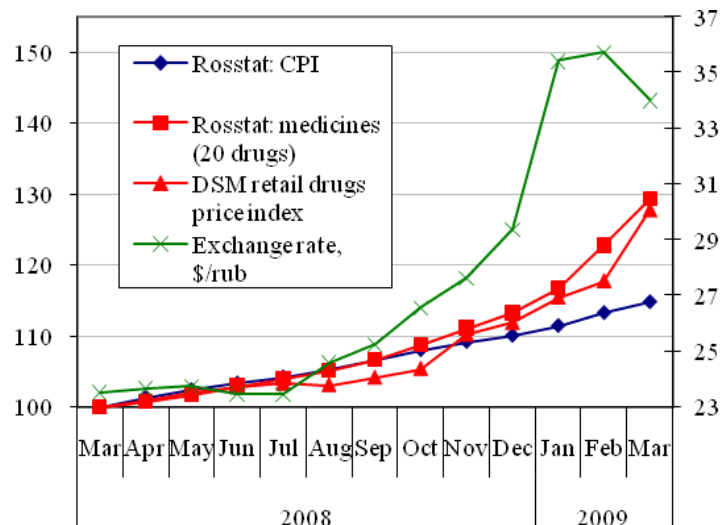
Recent Evolution of Drug Prices in Russia

Drug prices in Russia increased substantially during the ongoing economic crisis, partly reflecting the substantial depreciation of the ruble since the onset of the crisis in September 2008.

While the official Consumer Price Index (CPI) increased by 15 percent between March 2008 and March 2009, retail drug prices rose by 29 percent. As shown in Figure 1, most of the relative increase in drug prices began after the start of the depreciation of the ruble. Early indications are that prices will continue to rise in the private sector.

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Figure 1: Trends in Drug Prices in Russia, March 2008-2009



Sources: Rosstat; www.gks.ru, DSM group: report www.dsm.ru²

Drug prices not only increased substantially as a whole, but also showed significant price variability.

This was true for both brand-name and generic drugs (the latter are generally cheaper than brand-name drugs). An assessment of changes in median, minimum and maximum distributor prices of equivalent drugs in St. Petersburg³ showed that overall, between March 2008 and 2009, median drug prices increased by about 40 percent but maximum prices (usually for brand name drugs) increased by 105 percent on average. On the opposite end of the spectrum, the minimum prices (usually for generic drugs) increased by 14 percent. High overall variability is accompanied by higher variability in prices for the same class of drugs in the Russian market; moreover, drug prices in Russia are much higher than in the international market. While in March 2008, the average ratio of maximum to minimum distributor prices for the same drug was about five times, by March 2009, the ratio had increased almost 10 times⁴. Comparison of median distributor prices in St. Petersburg with the international reference prices for 52 drugs⁵ shows that prices in Russia are on average three to four times higher than international reference prices.

² Rosstat monitors prices of 20 selected drugs. The DSM group publishes Laspeyres retail price index for all drugs on the market, with weights taken proportional to sales volumes in 2007.

³ A pre-selected list of 80 essential drugs from the PharmIndex magazine, between March 2008 and March 2009; for each of the 80 drugs, the minimum, median and maximum price of a daily dose of the drug were documented.

⁴ For five cases, the maximum price was more than 50 times higher than the minimum published price: Ciprofloxacin - 56 times, Acetylsalicylic acid - 58 times, Loperamide - 67 times, Omeprazole - 144 times, Diclofenac - 119 times. These medicines typically have very high brand premiums.

⁵ International Drug Price Indicator Guide, <http://erc.msh.org>

Impact of Drug Price Increases on Households

As a result of the recent increase in drug prices, the poor, on average, may have lost more than 1 percent of their total household expenditure.

Rosstat data for 2006 indicate that about 95 percent of survey respondents who purchased medical drugs in the last three months of the year, paid out of pocket. The increase in drug prices can therefore have a significant impact on the budgets of families with chronically ill members who require a daily drug intake. According to data from the 2005 Russian Longitudinal Measurement Survey (RLMS), over 75 percent of households had a member with one or more chronic illnesses⁶, with two illnesses reported on average per household member. The average budget share of expenditures on drugs for the poorest 10 percent of the households that had to purchase drugs regularly was about 9 percent. However, as discussed below, this average hides the grim reality that the amount could be significantly higher for many households--actual spending on drugs greatly depends on the particular illnesses to be treated and the kinds of drugs that are prescribed.

The cost of treatment of liver cirrhosis, for example, has risen from less than 50 percent to more than 110 percent of a hypothetical household's budget.

Table 1 provides a conservative estimate of the potential monthly expenditures for treating several common chronic illnesses for a typical household consisting of two pensioners, each receiving a typical subsistence minimum pension of 4000 rubles (this estimate is conservative as the real retail mark-ups are estimated to be much higher than the ones used here). The last two columns show the median price increases for the recommended drug treatment, and the additional expenses that will have to be incurred by the household due to the price increases for several drugs. For example, the median price of 'ademetionine', one of the drugs commonly used for the treatment of liver cirrhosis, increased by almost 2.5 times. This would result in almost 4,800 rubles of additional expenditure for the monthly treatment of liver cirrhosis, relative to what Russians were to pay if the price of 'ademetionine' increased at the same 15 percent rate as the CPI.

In this context, recent evidence indicates that drug affordability has likely fallen, with the contributing factors being the increase in drug prices and a nine-year high unemployment rate of 10.2 percent.

⁶ The questions asked were about heart, lung, liver, kidney, gastrointestinal, spinal and other chronic illnesses

Table 1. Estimated Expenditure on Drugs Using Median Distributor Prices

Condition	Suggested Treatment	Suggested daily dose	Average monthly expenditure, rubles	Share of subsistence minimum budget for two pensioners, %	Median Price 2009/ Median Price 2008	Effect of price increase above the CPI increase, rubles
Liver Cirrhosis	Ademetionine	1200 mg	8874	111	2,48	+4757
Stroke prevention	Clopidogrel	75 mg	3478	43	2,51	+1882
Stroke prevention	Aspirin	100mg	90	1	1,10	-45
Arthritis	Diclofenac	100mg	87	1	2,11	+39
Hypertension	Enalapril	20 mg	186	2	1,40	+33
Diabetes	Insulin soluble	50 ME	1384	17	1,03	-168
Gastric ulcer	Omeprazole	20 mg	143	2	1,53	+36
Prostatitis	Tamsulosin	400 mcg	1595	20	3,06	+996
Prostatitis	Terazosin	10mg	1250	15	1,38	+216
Ischemic heart disease	Trimetazidine	50 mg	238	3	0,97	-44

Source: Distributor prices published in 'Pharmindex' on March 2009. A retail mark-up of 10 percent was used to estimate retail prices and calculate average expenditures. According to federal legislation in Russia, the maximum mark-up over the manufacturer's price is 25 percent, and retail prices should not exceed wholesale prices by more than 30 percent for essential drugs; the limit is higher for other drugs. *It is estimated that in general actual mark-ups are much higher than the official ones.*

How Can Essential Drugs Become More Accessible and Affordable?

Russia's public spending on health over the medium-term needs to increase above the current level of 3.6 percent of GDP. The major long-term drivers of health care spending--rising incomes, technological change and demographic change--all point to a significant, long-term rise in health care expenditure. It is reasonable to assume that part of this increase could and should be met by public provision of health services. The Russian Government can consider several options for improving access to and affordability of drugs in Russia.

Change drug policies and prescription practices: A typical household's drug expenses or the cost of a subsidized drug program could be substantially lowered, thereby raising affordability. This could happen if drug policies and prescription practices are based on the evidence of demonstrated efficacy and safety of equivalent drugs, as well as on comparisons of their costs. For example, the evidence on the demonstrated efficacy and benefits of 'clopidogrel', a drug used in Russia for stroke prevention at a cost of 1,481 rubles per month, is scant. The alternative would be to use the lower cost and efficacious and safe generic 'aspirin' costing only 50 rubles per month as the 'best buy' first-line drug for stroke prevention in most patients. This would result in a major saving of 1,431 rubles per month, while ensuring the demonstrated benefits of an alternative drug.

Provide an essential outpatient drugs benefit package:

One option to explore for dealing with this challenge under current fiscal constraints would be adopting an essential outpatient drugs benefit package for priority, high-burden diseases, to be provided as part of the Medical Program of State Guarantees. It could include approximately 70-100 different essential medicines for high-burden chronic diseases--such as, cardiovascular diseases, mental disorders, diabetes, chronic respiratory problems, digestive disorders, and frequent infections,⁷--selected on the basis of therapeutic efficacy, efficiency, and value for money criteria.

The proposed essential drug benefit program could be funded through an improved allocation of overall public expenditures, including a shift toward long-term needs of social sectors such as health and away from less productive categories of public expenditures (for example, untargeted subsidies and transfers, general administration expenditures and unproductive public investments). Other funding options include increasing taxes on cigarettes (the current price of cigarettes in Russia is very low compared to major international cities) and liquor, and taxing high sugar soft drinks.

⁷ The 2005 World Bank report, "Dying Too Young: Addressing Premature Mortality and Ill Health Due to Noncommunicable Diseases and Injuries in the Russian Federation," provides health and economic arguments to concentrate on these diseases.

Promote Rational Drug Use: A critical measure that would need to be supported in Russia as part of health system restructuring efforts to complement the introduction of outpatient drug benefits is the development of new methods and approaches to strengthen rational drug prescription processes. These could be in the form of new or revised evidence-based clinical guidelines to treat some diseases, therapeutic pocket guides that offer quick consultation guidance to the doctors on how to treat the most common health problems, and continuing in-service medical education programs. Additionally, there are electronic modules that can be incorporated as part of the development of health information systems that could facilitate on-line consultations by physicians before prescribing. Given the ever growing number of drug therapies, if physicians do not have access to scientific information and do not have enough technical knowledge for making a critical appraisal of new medicines, the prescription process will be vulnerable to marketing techniques by the pharmaceutical industry and decisions will not be taken in terms of the best option for the patient and the health system as a whole. To promote rational drug use for priority, high-burden diseases on an outpatient basis, a tiered co-payment arrangement could also be developed to fully reimburse the cost of generic drugs but set high co-payments for brand name drugs to cover the cost differential. This would create a powerful incentive to shift toward higher use of generic equivalents.

Improve the incentive framework for physicians by regulating perverse financial incentives: These include prescribers earning money from the sales of medicines, which only encourages over-prescription of medicines. Generic drugs could be promoted by setting up incentives in the form of performance-based payments, as is currently done in some Russian regions such as in the Chuvash Republic⁸ to reward doctors for achieving program targets, improve health outcomes and lower overall medical spending.

Educate patients about generic medications: There is a widespread perception among patients in Russia that generic drugs are cheaper because they are lower quality and not as efficacious or safe as their equivalent brand name drugs. Broader efforts by health insurance agencies, policy makers and providers are needed to educate patients about generic medications, help them make informed decisions,

⁸ Developed as part of the health system restructuring program supported under the World Bank-funded Health Reform Implementation Project over 2004-2008.

and influence personal preferences for generic use, which in turn could result in improved adherence to essential medications.⁹

Develop drug pricing and procurement reforms to support the implementation of demand side priorities as defined by the adoption of an outpatient essential drug list targeting priority, high-burden diseases and related rational drug use measures: Proper consideration also needs to be given to supply side practicalities such as wholesaler/pharmacist mark-ups and differential margins for the establishment of a uniform drug pricing framework; enforcement of price controls; procurement and tendering processes, including possible negotiated arrangements with producers and suppliers to contain drug price inflation; the competitiveness of the generics market; and the availability of pharmaceuticals in rural regions.

Conclusion

There is plenty of evidence worldwide to show that timely access to essential medicines yields large overall savings through fewer hospitalizations, tips the balance in favor of survival when a person is affected by a chronic disease or prevents the disease altogether, and contributes to higher productivity when the patient is at work.¹⁰ Also, from an ethical and medical point of view, protecting and/or increasing expenditures on medicines is critical for continuing to treat conditions such as tuberculosis and HIV/AIDS, and hence prevent the onset of (sometimes untreatable) drug resistance among patients. While the current economic downturn imposes rigid budgetary constraints, improved access to and better use of pharmaceuticals under public subsidy arrangements should not be delayed because it could, in the medium term, contribute towards improving the health status of the Russian population, reducing the risk of impoverishment of vulnerable population groups, and enhancing overall social welfare.

About the Authors

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⁹ W.H. Sharank et al, "Patients' Perception of Generic Medications," Health Affairs (March/April 2009): 546-556.

¹⁰ "Prescription for Change. A Survey of Pharmaceuticals," The Economist, June 18, 2005.