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Access to healthcare services and out-of-pocket payments in Kyrgyzstan:

Household survey from 2001 to 2010

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Introduction

Kyrgyzstan gained independence from the Soviet Union in 1991 and since then the level of public spending on health dropped drastically. This resulted in destruction of centralized system of service delivery based on Semashko model thus affecting access to healthcare services. Private expenditures became one of the main sources of health financing in the whole region, including Kyrgyzstan. Evidences derived from literature suggest that this became a major barrier for population to seek health care in the region in general⁴⁵.

Since 1997 Kyrgyzstan has been implementing comprehensive health sector reforms aimed at development of effective health system taking into account scarce resources available in the country. Two extensive National Programs on health system development were designed and implemented: Manas (1996 – 2005) and Manas Taalimi (2006 – 2010). Primary goal of these programs was to improve population health status of the Kyrgyz Republic by means of increased capital in resource distribution, improved financial protection and flexible response to population needs. Several monitoring indicators were developed to assess effectiveness of reforms implemented within the framework of Manas Taalimi, including such indicators as "*% of those who didn't seek care in case of need due to financial and/or geographical reasons*", "*out-of-pocket expenditures on outpatient visits, outpatient drugs and on hospitalization, by consumption quintiles*", etc.

New module on health care utilization and health expenditures was added to the Kyrgyz Integrated Household Budget and Workforce Survey (KIHS) conducted by the National Statistical Committee (NSC) on regular basis for the purpose of poverty monitoring and analysis. In Kyrgyzstan this survey was conducted in 2001, 2004, 2007 and 2010 with technical and financial support from WHO and DFID. This approach makes it possible to link data on health and health care utilization with detailed information on household income and expenditures for previous year, estimate burden of health expenditures and calculate the degree of catastrophic expenditures of health. Hence, these surveys contributed to strengthen monitoring of health system performance.

It is of critical importance for the Ministry of Health of the Kyrgyz Republic to obtain reliable information about health care utilization rate and population awareness about eligibility under SGBP to further improve health policy and assume measures aimed at poverty alleviation.

Current report summarizes findings of 4 surveys (2001, 2004, 2007 and 2010). It has the following structure: Section 1 describes the purpose of these surveys; Section 2 outlines methodological issues including sample, research tools and estimation of health expenditures; Section 3 discusses survey findings of 2010 and previous surveys (2001, 2004 and 2006); and Conclusions include prime inferences on each block of findings. Findings, in turn, are divided into five categories: (1) utilization of health care and expenditures at outpatient level; (2) expenditures on drugs at outpatient level; (3) utilization of health care and expenditures at

⁴ Jakab M., Kutzin J. 2009. Improving financial protection in Kyrgyzstan through reducing informal payments. Evidence from 2001-06, Policy Research Paper No. 57. Bishkek, Health Policy Analysis Unit (DFID/WHO).

⁵ Kutzin J et al. (2009). Bismarck meets Beveridge on the Silk Road: coordinating funding sources to create a universal financing system in Kyrgyzstan. Bulletin of the World Health Organization, 87:549–554.

inpatient level; (4) total health spending; and (5) barriers for access to health services including population awareness about eligibility under SGBP.

1. Objective

Objective of this survey was to obtain information on utilization of health care at outpatient and inpatient levels and health related expenses incurred by households/individuals as well as to collect information on barriers for access to health services. Moreover, it implied comparative analysis of certain indicators for the period of 2000 – 2009 by answering the following questions:

1. What is the level of health care utilization and household/individual health expenditures at outpatient level?
2. What is the level of household/individual expenditures on drugs at outpatient level?
3. What is the level of health care utilization and household/individual health expenditures at inpatient level?
4. What is the level of total health spending including public and private expenditures by level of health service delivery?
5. What is population awareness level about eligibility under SGBP?
6. Are there any barriers for access to health services?

2. Methodology

Kyrgyz Integrated Household Budget and Workforce Survey (KIHS) conducted by the National Statistical Committee (NSC) on regular basis is intended to derive main measures of household income and expenditure. As stated above, four household surveys on health financing and health care utilization were conducted as individual module of KIHS. Inclusion of this module into regular KIHS enables health module variables to be linked with socio-economic variables, particularly with household consumption.

2.1. Sample

Household survey on health financing and health care utilization is a sample-based survey. This survey uses same sample as KIHS. Sample design ensures countrywide representative data while specific weight is used to ensure representativeness of the sample at national and province levels for urban and rural areas. Urban and rural areas in each province were used as strata. Household sampling was conducted in two stages.

Sample framework was designed on the grounds of population census of 1999. Smallest area unit used in electronic database is portfolio. There are 13067 portfolios in the country based on population census data. These portfolios are quite homogeneous in terms of numbers of census forms. This fact enabled two-staged sampling:

- At first stage, census portfolios as primary sampling units and number of households as portfolio size were used to select 456 primary sampling units (PSU) with probability proportional to portfolio size.

- High intracluster correlation of different values was used to determine cluster size in the sample and to ensure efficient time usage of interviewers by minimizing travels from one populated locality to another. A compromise between accuracy of data and efficiency of time span and finances resulted in cluster size comprised of 11 households. At second stage, lists of households in selected PSUs were used for random sampling of 11 households for each cluster with probability proportional to household size.

Hence, overall sample size comprised of 5016 households but only 5001 households (20 225 people) were actually interviewed reaching 99.7% of overall sample. One cluster located in Toguz-Toro district of Jalal-Abad province dropped out from the survey. It was not an unexpected occurrence since transport connection with this remote high mountainous district is closed almost until April or May. It must be emphasized that IHBWS sample design was revised after 2004 with technical support from the UK Department for International Development (DFID).

Table 1 shows actual number of interviewed households and individuals from all 4 surveys. Questions about outpatient visits and related costs cover recall period of 30 days after the visit. Questions about inpatient care/hospitalization and related expenditures cover recall period of 12 months after hospitalization. Hence, questions related to hospital level expenditures were calculated for the years 2000, 2003, 2006 and 2009 respectively.

Table 1. Sample size for 4 surveys

Survey implementation year	Year of analyzed data	Sample size (households)	Sample size (population)
March 2001	2000		12,901
March 2004	2003	3,000	18,690
March 2007	2006	5,005	21,257
March 2010	2009	5,001	20,225

Survey sample was not a self-weighting sample and thus weighting coefficient was applied to adjust for excess sample of certain underpopulated localities. Analysis provided in this report uses mainly weighted data.

2.2. Research tool

Survey questionnaire was designed to collect data about health expenditures at different levels of health service delivery: outpatient, inpatient and on drugs. Research tool is comprised of the following five sections:

- General demographic information about household and household members;
- Health care utilization and expenditures related to health service delivery at primary care level during the last 30 days;
- Health care utilization and expenditures related to health service delivery at secondary care level during the last 12 months;
- Awareness of household head about eligibility under the State-guaranteed Benefit Program (SGBP);

- Health status of each household member over 18, measurement of blood pressure and questions related to risk factors of cardiovascular diseases such as hypertension, overweight, tobacco smoking, etc.

For the purpose of comparative analysis over time neither methodology nor questionnaire were amended except for adding of several questions.

2.3. Estimation of health expenditures

To calculate total spending of each household we added up expenditures for all categories with some adjustments described further. Questionnaire asked detailed questions about direct payments to doctor (at outpatient and inpatient levels), payments for drugs, medical supplies and equipment, food and other items. Moreover, respondents were asked to estimate cost of in-kind contributions such as, for example, gifts to a doctor, etc., as well as cost of food products and drugs brought by family members and friends.

The following approach was used to estimate annual expenditures of households on outpatient care: cost of one outpatient visit was multiplied by 12 months. Expenditures related to hospitalization included only those respondents who were hospitalized during the last 12 months.

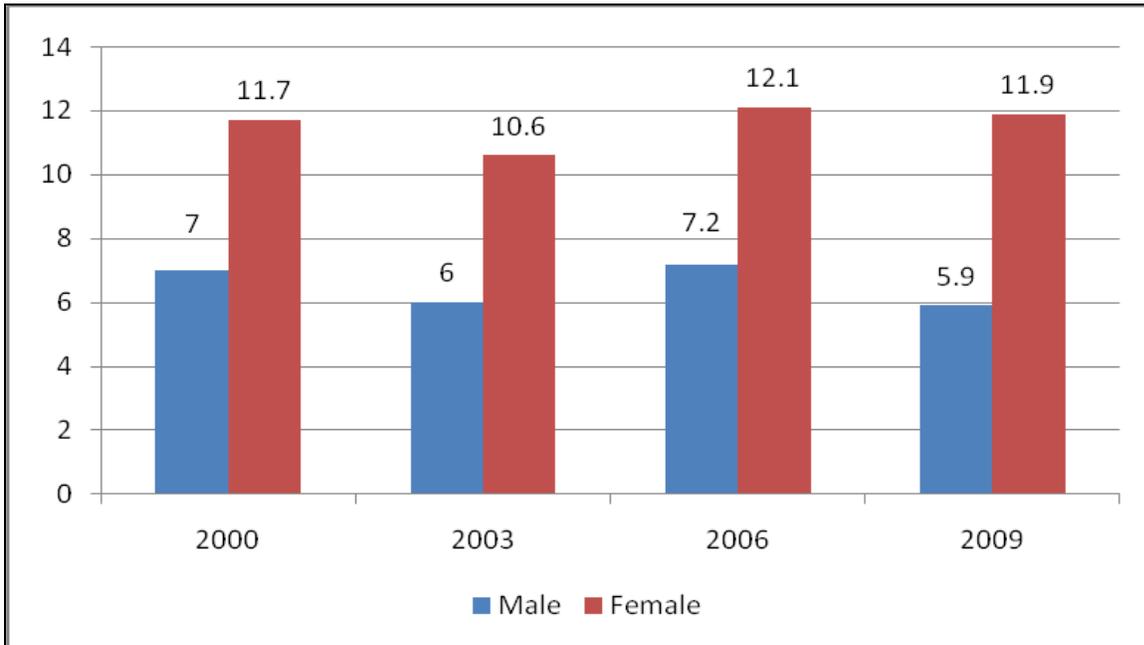
3. Findings

3.1. Outpatient services

3.1.1. Health care utilization

Health care utilization rate seems to be relatively stable throughout the whole survey period: 8% to 10% of people sought outpatient medical care within a month prior to survey implementation. In March of 2009, 6% of males and 12% of females sought health care (Figure 1).

Figure 1: Percent of people who sought health care during the last 30 days, 4 rounds of survey



Findings suggest that throughout the whole survey period males sought health care at PHC level less often than females. In 2009, only 9.1% of male population aged 55 – 59 (against 23.3% of females) and 13.4% of males aged 60 – 64 (against 16.4% of females) sought health care. Low level of health care utilization by males at this age can be crucial for detection and prevention of chronic conditions including cardiovascular diseases, especially as control of hypertensive disease in this group is quite acceptable. For example, blood pressure was measured in 81% of retirement age respondents who sought health care.

Differences in the level of health care utilization derived from household economic status still remain but with obvious downward trend: ratio in health care utilization at outpatient level between the poorest and the richest quintiles reduced from 2.4 in 2000 to 1.2 in 2009 (Figure 2).

Figure 2. Health care utilization, by quintiles, in 2000 and 2009

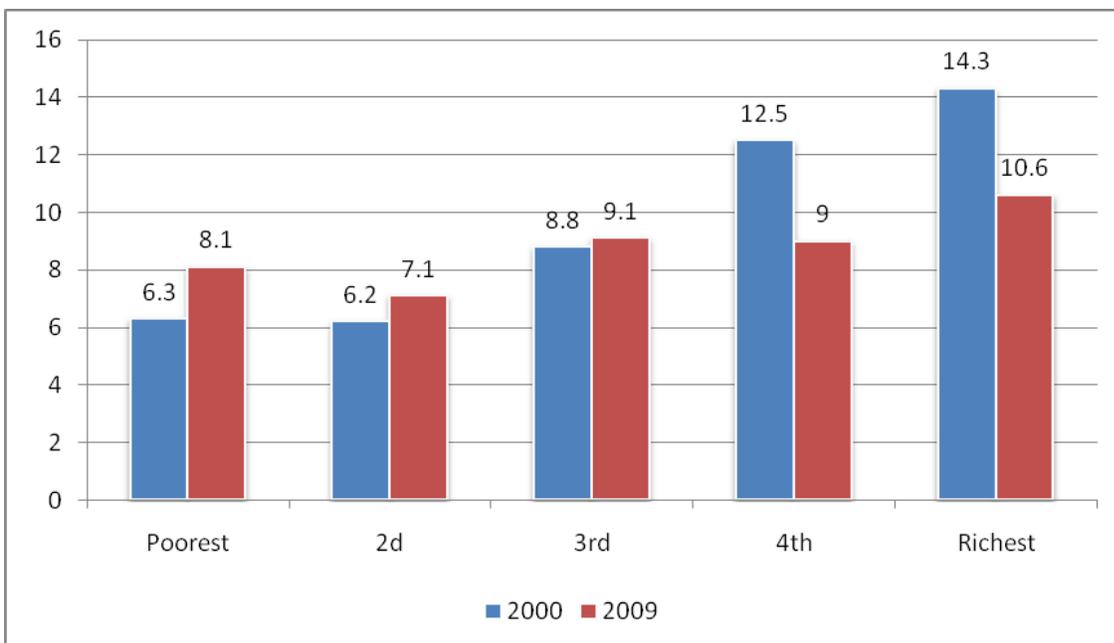
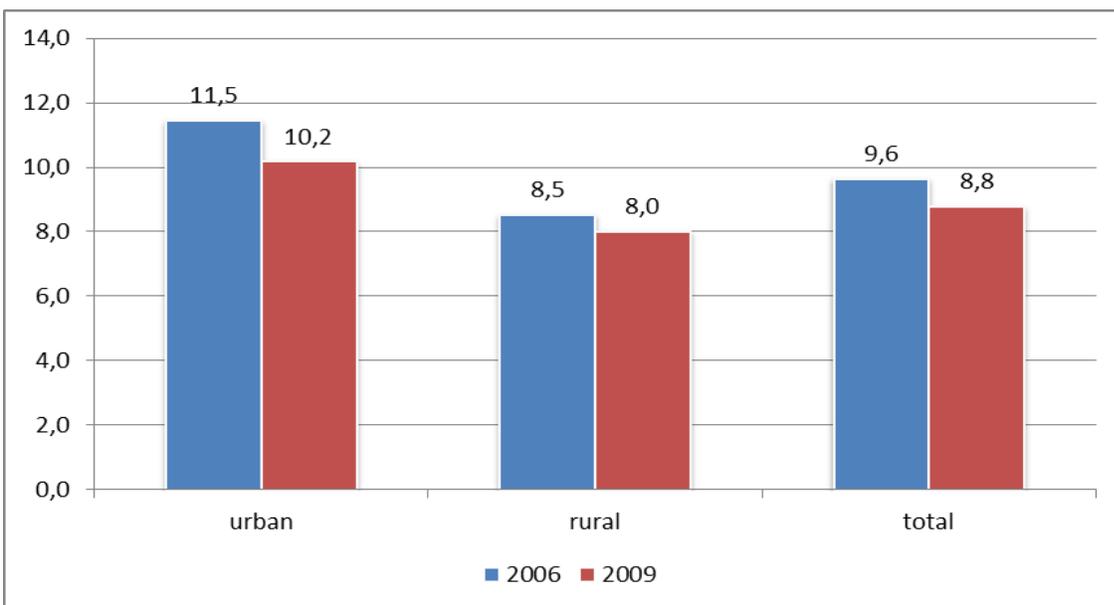


Figure 3 demonstrates moderate downward trend in health care utilization both in urban and rural areas. This pattern can be explained by human resource crisis observed in the recent few years. This is especially obvious in rural area⁶.

Figure 3. Health care utilization, urban/rural, in 2006 and 2009



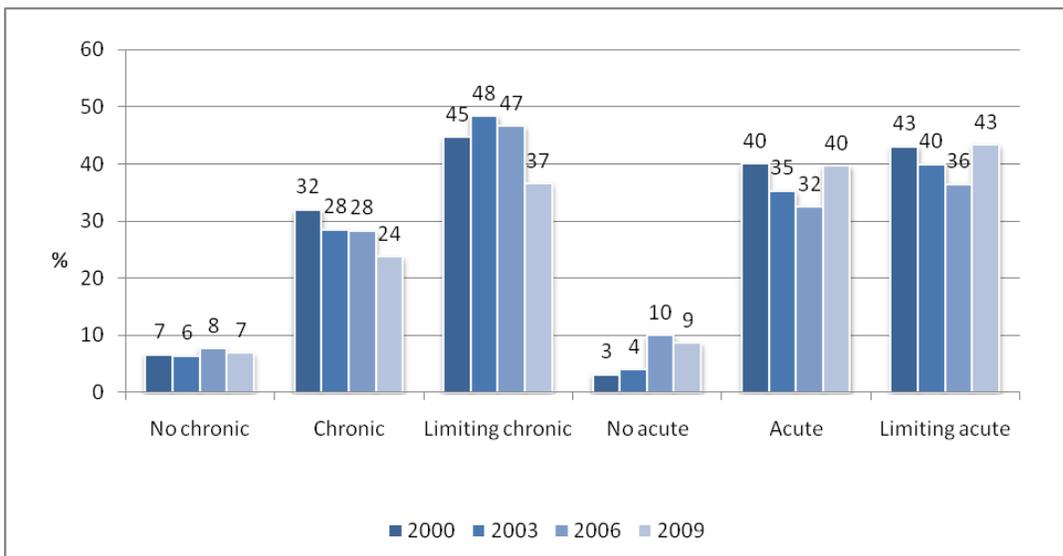
⁶ Kojokeev K. et al. Policy Research Paper № 51 "Why are our doctors leaving? Exploring the reasons behind migration of medical personnel in Kyrgyzstan", HPAC

3.1.2. Health care utilization pattern

People mostly sought health care as a result of ill health rather than prevention.

- Ill health caused health care seeking behavior in 86.7% of cases. General list of reasons for health care seeking behavior suggests that frequency of visits related to catarrhal disease decreased in 2009 as compared to 2006 (42.8% in 2006 and 31% in 2009) while frequency of visits related to acute intestinal infections (0.1% in 2006 and 4.6% in 2009) and tuberculosis (0.6% in 2006 and 7% in 2009) increased noticeably. Increased share of outpatient visits related to tuberculosis indicates enhanced involvement of PHC in TB treatment which represents impact of reforms implemented in the sector.
- Only 13.3% of respondents sought care for prevention: child vaccination – 6.6%, including 22.1% of visits among children under 15; contraception – 0.3%, including 0.5% among respondents of reproductive age; and pregnancy – 6.4%, including 16.4% among fertile age women.
- Share of consultation visits among respondents who did not have acute or chronic diseases was less than 10%. Share of visits among respondents with acute conditions increased notably as compared to previous years while share of visits among respondents with chronic conditions noticeable decreased (Figure 4). Drop in the number of visits related to chronic conditions triggers concern since chronic conditions in Kyrgyzstan constitute larger share of disease burden. This fact may serve as grounds for deeper research to help understand whether decreased number of visits is caused by more effective approach to delivery of health services for chronic conditions which requires only few appointments with a doctor or whether, by contrast, it implies quality problems in service delivery.

Figure 4. Percent of those who sought health care in the last 30 days, 4 rounds

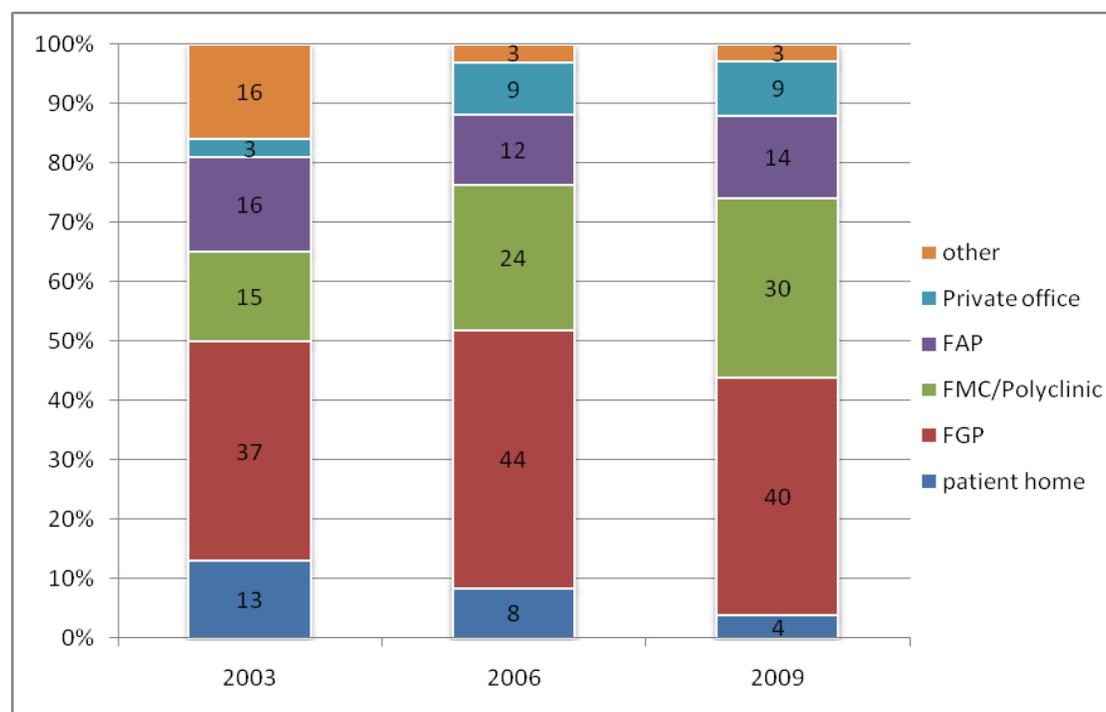


Certain changes took place in health care utilization pattern during the survey period. These changes reflected both impact of undertaken reforms and general situation in health sector (Figure 4).

- One of the most remarkable trends is a growing share of visits to FGPs and FMCs (from 52% in 2003 to 70.2% in 2009). This can be accounted for a decreased share of services delivered at home and visits to "other" health service providers, the majority of which is comprised of secondary level health care facilities.
- Decrease in demand for outpatient care obtained in health care facilities of secondary level (maternity hospitals, inpatient hospitals, etc.) from 16% in 2003 to 3% in 2009 proves the effectiveness of primary care reform.
- Continued decrease in the share of consultations delivered at patient's home and substantial decrease in the share of visits to FGP in the period of 2006 – 2009 may suggest ongoing crisis related to human resources and limited PHC resources which make home visits not possible. This is especially problematic for health care facilities located in catchment areas populated with internal migrants (novostroiki) where workload per doctor is extremely high and newly arrived migrants do not know where to seek care, as well as for facilities that serve remote villages.
- During the survey period, share of at-home consultations delivered by nursing staff (nurses, midwives, feldshers) continued to decrease (from 23% in 2003 to 8.3% in 2009) while share of consultations delivered by public doctors continued to increase (68% in 2003 to 79% in 2009). On one hand, this may indicate growing access for population to FGP and FMC services. On the other hand, this can suggest an imbalance between doctors and nursing staff. Many tasks at PHC level can be performed by nursing staff. Hence, increased demand for their services can help addressing existing problems with availability of human resources in rural area.
- Since 2006, number of visits to private health centers grew substantially both among urban and rural population (Figure 5). This fact indicates growing numbers of private health centers and expanded range of delivered services. Findings from research undertaken by HPAC in 2008 show that private providers of health services for the most part deliver similar services as state-run facilities. However, services of private providers are more demanded and valued by the population because their approach to care is more client oriented⁷.

⁷ Checheibaev E., Jakab M. at al., "Private health sector in the Kyrgyz Republic", Policy Research Paper № 53, HPAC, 2008.

Figure 5. Consultation venue, 2003, 2006, 2009



In 2009, share of visits to FAPs increased by 2% as compared to 2007. Moreover, one in five respondents who sought care in rural area went to FAPs (Table 2). Nonetheless, rate of visits to FAPs suffered from downward trend in the period of 2003 – 2006. Increase in visits to FAPs concurred with implementation of Manas Taalimi health sector reform program which placed high emphasis on strengthening of FAP infrastructure. Starting from 2006 there were 3 places clearly defined where rural inhabitants could receive health care: FAP, FGP and FMC.

Table 2. Type of health care facility, by place of residence (urban/rural), 2009

	Urban	Rural
At home	4,9	3,1
FAP	5,3	20,0
FGP	39,7	40,4
FMC/Polyclinic	37,7	24,7
Private unit	10,4	8,4
Other	1,9	3,4
Total	100,0	100,0

3.1.3. Out-of-pocket payments made by households at outpatient level

Private out-of-pocket payments include payments for consultation, dental services, services of private providers and payment for laboratory tests.

In 2009, 38% of respondents who used health care services at outpatient level incurred some kind of payments. Amount of expenses per person seeking care averaged to 131.1 som. Consultations by health workers fall within 66% of all payments, laboratory tests – 32% and other payments – 2%. Both the share of those who paid and the share of incurred payments in nominal and in real terms increased slightly as compared to similar period of 2006 (Table 3).

Table 3. Rate of private out-of-pocket payments at PHC level, 4 rounds of survey

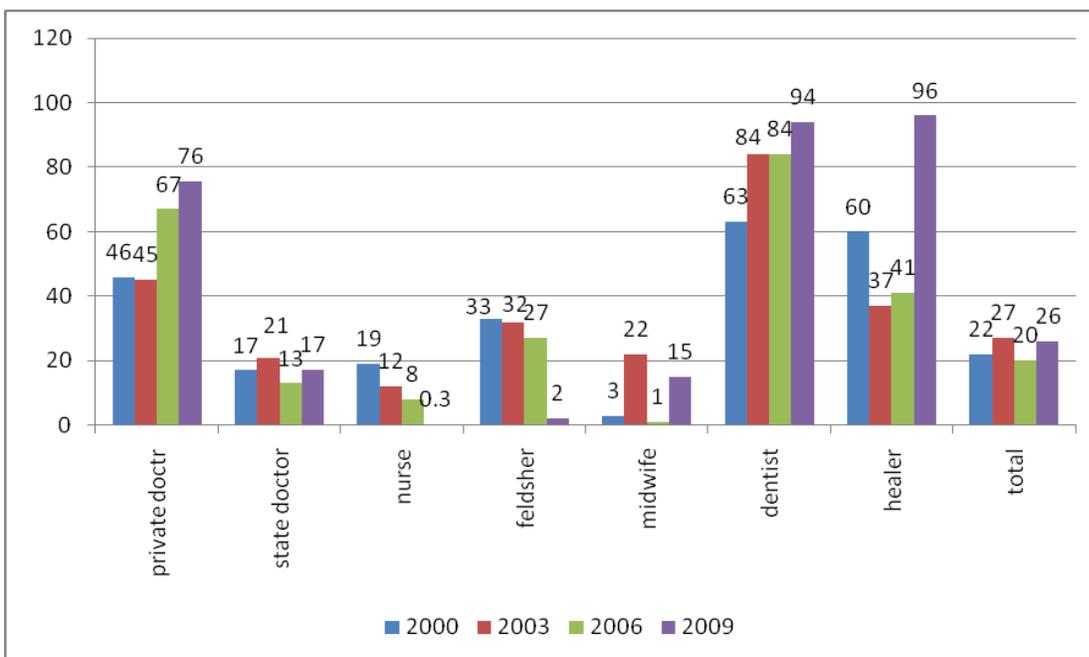
Category	2000		2003		2006		2009	
	Nominal	Real	Nominal	Real	Nominal	Real	Nominal	Real
% of those who paid	45.5%		36.1%		34,9%		38,1%	
Of those who paid (som)	130.8	130.8	129.7	115.3	228,2	176.9	344,7	182.3
Of those who needed health care (som)	61.53	61.5	50.9	45.2	79,7	61.8	131,2	69.4
Among all (som)	6.2	6.2	4.5	4.0	7,3	5.7	11,5	6.1

Note: 1. **Nominal** – in nominal terms; **Real** – in real terms

2. Consumer price index (2000=100) was used for calculation of health expenditures.

In 2009, payments for consultation at outpatient level (i.e., payment to health workers excluding payments for laboratory tests) were made by 26.1% of those who sought health care (Figure 6). This figure increased by 6% as compared to 2006 and reached the level of 2003. Increased share of those who paid for consultations was caused by growing share of those who paid for dental services and/or services of private providers. At the same time, share of those who made payments at state-run health care facilities decreased, especially among those who paid for consultations of nurses, feldshers and midwives. Average size of payment to midwife was 48 som, to feldsher – 9 сом and to nurse – less than 1 som.

Figure 6. Percent of people who paid for consultation, by type of health workers, 4 rounds of survey



Payments for visits to private health centers are amongst the highest. Average size of payment there is 444 som. A growing number of patients seeking dental care receive paid services (94.4%). Average size of payment to a dentist was 492 som.

Highest level of payments was observed in Chui (204 som per person seeking care) and Issyk-Kul (110 som per person seeking care) provinces and in Bishkek city (143 som per person seeking care). In other provinces average payment was less than 50 som. Level of payments made by patients for consultations lowered substantially in Osh (from 50.8 som in 2006 to 31.6 in 2009) and Talas (from 31 som in 2006 to 29 som in 2009) as compared to previous period.

Table 4. Average amount of payments among all who sought health care, in som, and percentage for each category, by category of expenditures and province, 2009

Province	Transport		Consultation		Lab. tests		Other payments		TOTAL
	Average	%	Average	%	Average	%	Average	%	Average
Issyk-Kul	68	33	110	27	18	10	2	1	131
Jalal-Abad	34	30	21	11	36	17	1	2	60
Naryn	78	41	27	12	36	12	0	0	50
Batken	28	42	51	18	17	19	2	1	67
Osh	9	22	32	36	38	27	10	2	85
Talas	79	59	29	16	13	20	1	2	45
Chui	34	55	204	43	78	38	0	0	271
Bishkek city	16	54	143	24	66	11	2	1	197
TOTAL	32	40	87	26	44	21	3	1	131

Note: average amounts include expenses for gifts

Drastic reduction of "other payments" related to consultations (such as payment for laboratory tests) in the period of 2000 – 2003 gave place to an upward trend after 2003. In 2000 this figure was 32%, in 2004 – 17 %, in 2006 – 20% and in 2009 – 21%. Moreover, it should be noted that less than two percent of respondents reported making gifts to health workers at time of consultation (Table 5).

Table 5. Average size of payments at outpatient level, 2009

	Consultation	Lab. tests	Other payments	Transport	TOTAL
% of those who paid among those who sought health care	26,1	20,9	1,2	40,0	38,1
Average amounts paid among those who sought health care	86,7	41,4	3,1	32,3	131,2

Therefore, analysis of health care seeking behavior and patient out-of-pocket payments at outpatient level allows to draw the following conclusions:

- Rate of health services utilization remains stable throughout the whole survey period. However, major changes are observed in the pattern of visits which reflect impact of reforms and recent developments in health sector in general. Hence, declining number of visits to secondary level health care facilities including for tuberculosis and gradually rising number of visits to FAPs give evidence about effectiveness of reforms implemented in the sector. At the same time, growing number of visits to FMCs and declining number of consultations delivered by nursing staff denote human resource crisis especially in rural areas.

- Factors that trigger concern include decreased share of visits for consultation among patients with chronic conditions and low level of health care seeking behavior among males above 55. This may have an adverse impact on monitoring efficiency of chronic diseases including hypertensive disease.
- Principal share of out-of-pocket payments constitutes of payments for consultations delivered by health workers. One of the positive aspects is the reduction of payments to health workers. At the same time, growing share of visits to health care facilities with more expensive care (private health centers, FMCs) lead to an increase in the share of those who made payments at outpatient level as well as in the average amount of payments.

3.2. Use of drugs and patient expenditures

In March 2009, one in four respondents purchased drugs (24.5%), while only 5.9% purchased drugs prescribed by the doctor and 20.2% purchased drugs individually. Share of respondents who purchased drugs by doctor's prescription and individually remained more or less the same as compared to 2006. However, amount of money spent on drugs has grown especially on drugs that are not prescribed by a doctor (Table 6). In March 2009, average amount of expenditures on drugs was 227 som among those who purchased drugs.

Table 6. Level of expenditures on drugs 2006, 2009

	2006	2009
% of those who purchased drugs, among all		
% of those who purchased only one drug prescribed by a doctor	6,6	5,9
% of those who purchased only one drug NOT prescribed by a doctor	21,8	20,2
% of those who purchased drugs during the last 30 days	25,4	24,5
Average amount spent on drugs among those who purchased drugs (som)		
Prescribed	93	112
NOT prescribed	71	115
TOTAL	161	227

Drugs were prescribed to 69% of respondents who visited doctor. Share of patients with prescription of 4 and more drugs was 25% just as in 2006. Most commonly more than four drugs were prescribed to patients with cold (35%), including heavy cold with cough and fever (37%), and with diarrhea (34%). Drugs were not prescribed for the majority of pregnant women (71.3%) and children that came for vaccination (89.1%).

90% of patients with prescriptions purchased all prescribed drugs. This level has been considerably high throughout the recent years. Only 3.5% of patients did not purchase a single drug (Table 7). Affordability of drugs during the survey period has been constantly growing: in 2009, 40% of respondents reported not buying drugs because of high price, while in 2000 this

share was 61%. Personal unwillingness was another significant reason for which respondents did not buy drugs.

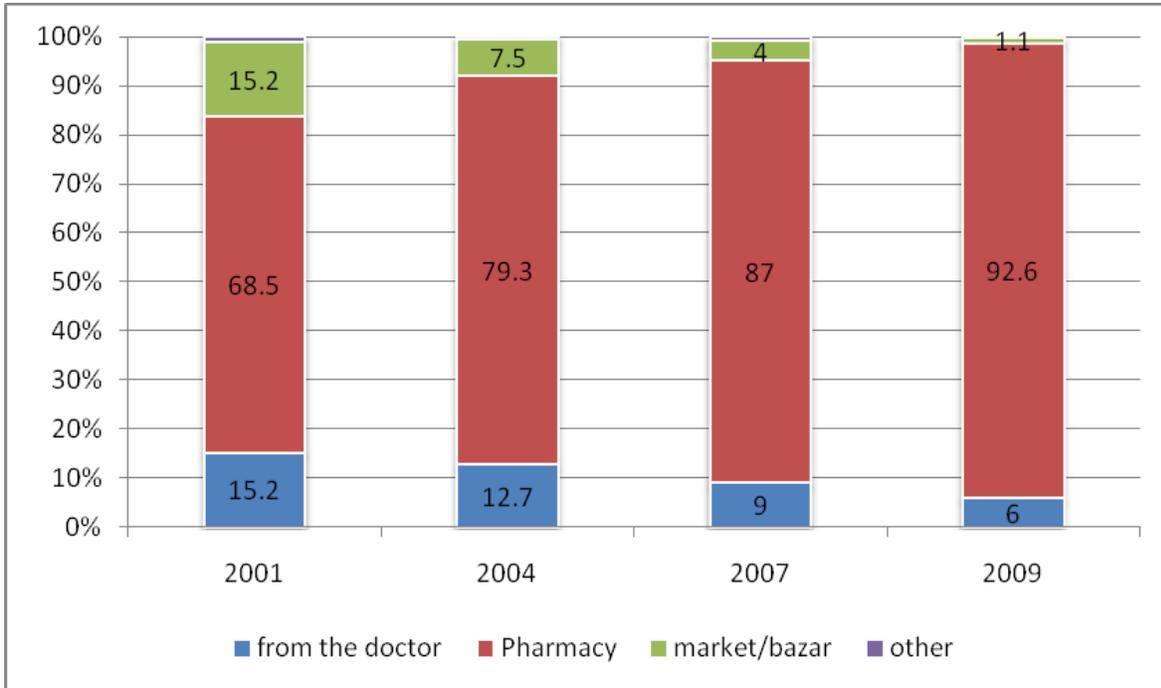
Table 7. Percent of those with prescriptions who reported purchasing of prescribed drugs; and reasons for not purchasing drugs among those who didn't; 4 rounds of survey

	2000	2003	2006	2009
Yes, purchased all drugs	77	91	92	90
Yes, purchased only some drugs	14	6	5	6
Did not purchase at all	9	3	3	4
Total	100%	100%	100%	100%
<i>Reasons for not purchasing drugs among those who didn't:</i>				
Couldn't find	11	17	6	10
Too expensive	61	54	43	40
Didn't want	67	3	47	39
Didn't want	-	-	3	1
Other	22	26	-	10

Survey findings suggest that accessibility of drugs is currently not a problem in Kyrgyzstan. Only 1% of patients who did not purchase drugs reported that this was because of distant location of pharmacy. First health system development program Manas placed great emphasis on development of private pharmacy network with expanded catchment area. Follow up program of health reform Manas Taalimi continued to promote creation of pharmacies in rural area.

One of Manas Taalimi indicators is the number of villages with FGPs which don't have pharmacies or pharmaceutical outlets working on Additional Drug Benefit program. This indicator shows reduction in the number of villages from 121 to 99 in the period of 2005 – 2009. These data also support the assumption of good accessibility of pharmacies and drugs. Another positive achievement includes the fact that vast majority of respondents (92.6%) purchased drugs in pharmacies while in 2006 this figure was 87% and in 2000 – 68.5% (Figure 7). Remaining share of respondents purchased drugs from health workers or in the market which is considered to be illegal in both cases. Distribution of uncontrolled poor quality drugs poses potential threat to people's health.

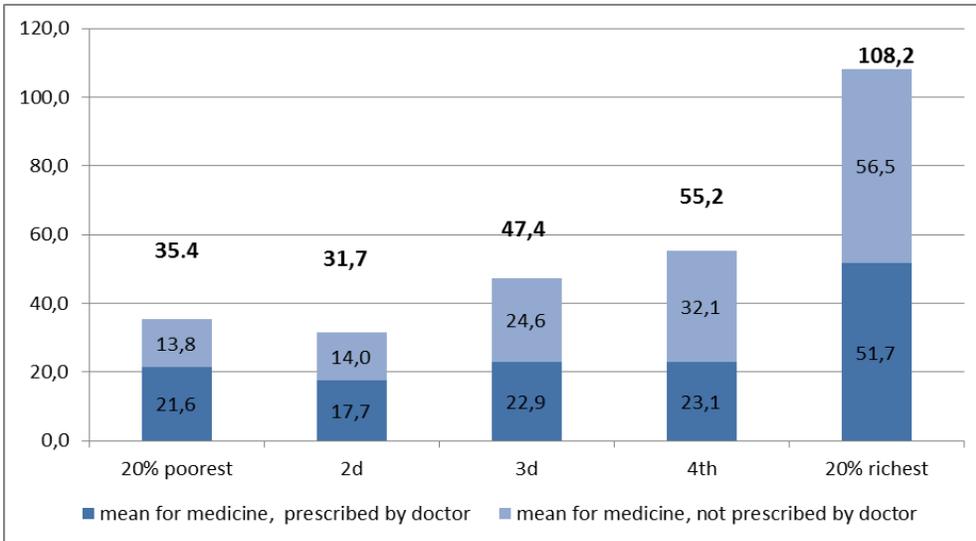
Figure 7. Points of drug purchase, 4 rounds of survey



As mentioned earlier, lion's share of drugs are purchased without prescriptions: 24% of respondents purchased drugs prescribed by a doctor and 84% purchased drugs without any prescription. Even among those respondents who had appointment with a doctor and purchased prescribed drugs, 28% purchased additional drugs without prescription. Overall, level of expenses on nonprescribed drugs is almost the same as on prescribed drugs (115 som and 112 som accordingly). Average level of expenditures on prescribed drugs was 312 som and on nonprescribed – 51 som among those who visited doctor. Presumably, people tend to buy various biologically active supplements (BAS) (e.g., tea, capsules, spray, etc.) with relatively low price in addition to prescribed drugs. Besides, quantity of individually purchased drugs is smaller than quantity of prescribed drugs.

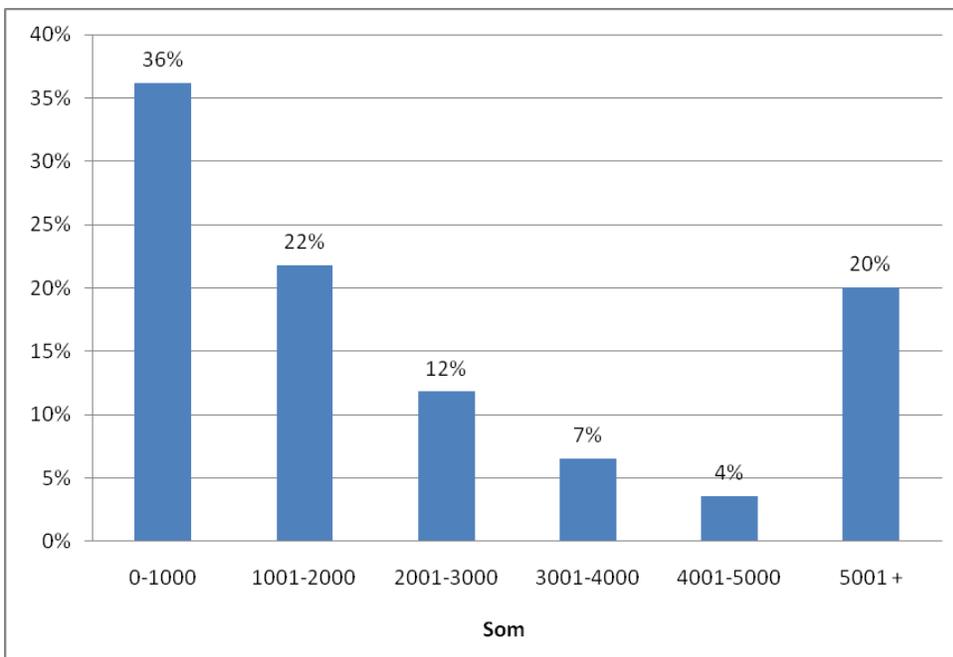
Analysis of drug related expenditures by quintiles reveals the following: expenditures in the poorest quintile amount to 35 som and in the richest quintile – 108 som (Figure 8). Yet, in two poorest quintiles larger share of expenditures falls to prescribed drugs while in two richest quintiles we get the opposite situation: they spend more funds on nonprescribed drugs.

Figure 8. Average payments for drugs for the whole population (som), 2009



Average level of expenditures on drugs conceals the real burden of these expenditures on specific categories of people. Average level of expenditures on drugs is 4403 som per year among those respondents who reported having expenditures while the median of expenditures is 1560 com. This shows that great many people incur great spending: 25% of these people spend more than 3600 som; 10% spend more than 7800 som; and 5% – 15120 som (Figure 9). Half of those who spend great amounts of funds belong to the richest quintile. Probably, they prefer to purchase more expensive drugs with brand names. Nevertheless, 20% of those who incur great spending belong to two poorest quintiles and, most likely, these very high expenditures were rather a necessity than their choice.

Figure 9. Percent of people who had some drug expenditures



About 0.4% of respondents reported buying drugs for special price based on MHIF prescription form. This indicator looks at effectiveness of Additional Drug Benefit Package. According to this package drugs are purchased on the basis of special prescription form which is distributed among health workers at PHC level. Average level of expenditures on drugs with use of special prescription forms was the same as on other drugs. This, however, doesn't mean that ADBP has no effect on financial protection, since there is not information about possible level of expenditures without subsidized drugs. Frequency at which representatives of different quintiles used prescriptions of MHIF Additional Drug Benefit Package suggests that when distributing these prescriptions health workers were guided not by patient's economic welfare but by other factors like, e.g., severity of illness. Yet, it should be noted that sample size for this kind of analysis is not large enough to make such far-reaching conclusions on these issues. It would require additional research to be conducted to analyze effect and equity of MHIF Additional Drug Benefit Package.

Therefore, analysis of situation related to purchasing of drugs allows to draw the following conclusions:

- Affordability and accessibility of drugs improved significantly: 90% of those who had prescriptions purchased all prescribed drugs and over 92% purchased drugs in pharmacies.
- Selfmedication is widespread among people. This is evidenced by the fact that majority of drugs were purchased without doctor's prescription. Spending on drugs purchased individually is almost the same as spending on prescribed drugs.

3.3. Inpatient services

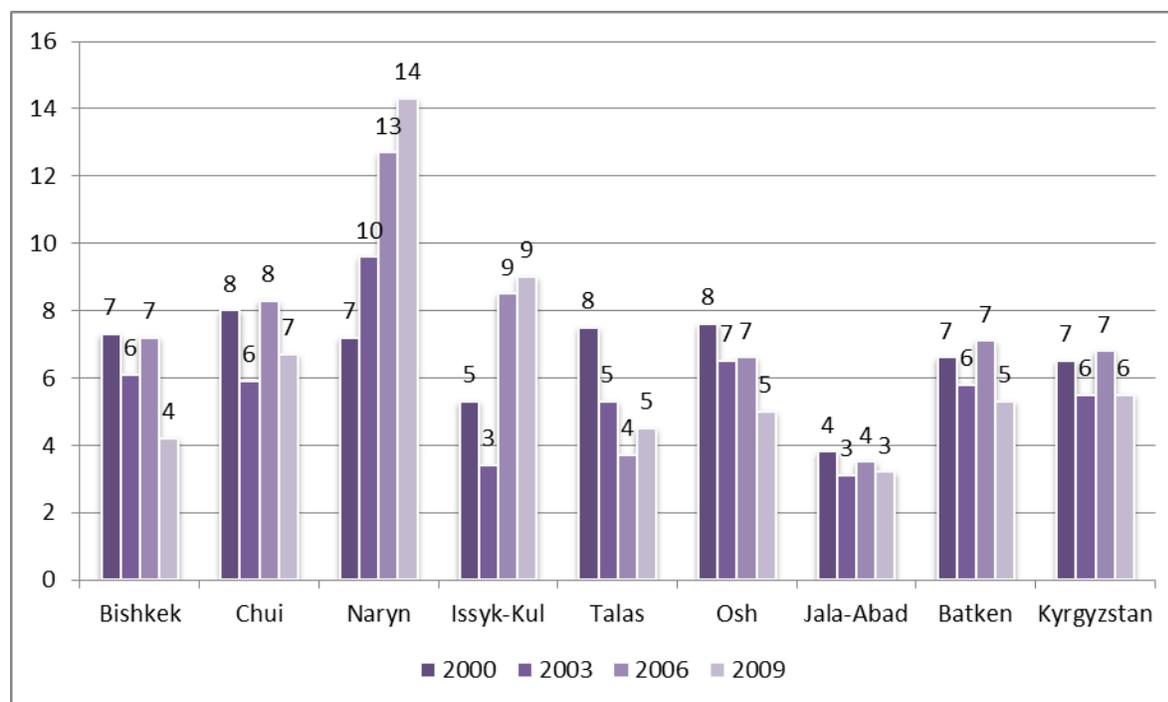
3.3.1. Utilization of inpatient services

Rate of hospitalizations in general population remained almost unchanged throughout the survey period and ranged from 6% to 7%. Within 12 months prior to survey implementation (February 2008 – February 2009), 5.5% of respondents reported at least one hospitalization. Frequency of hospitalizations also remained stable: about 10% of those who sought inpatient care were hospitalized two times and 3% - three and more times.

Throughout the whole survey period several social characteristics of respondent groups were identified. Hospitalization rate varied within these groups.

- Hospitalization rate was higher among people of retirement age and women of reproductive age throughout the whole survey period. In almost 50% of women aged 15 – 55 hospital admission was related to childbirth.
- Hospitalization rate varies significantly by regions (Figure 10). Highest rate of hospital admissions throughout the whole survey period was registered in Naryn province (14.3% in 2009) and lowest rate was in Jalal-Abad (3.2% in 2009). No major difference in hospitalization rate between urban and rural population was observed. Rate of hospitalizations increased in the period of 2003 – 2006 in all regions of the country but in 2009 utilization of inpatient care went down in Bishkek city, Chui, Osh and Batken provinces.

Figure 10. Inpatient care utilization rate, 4 rounds of survey (%)



Pattern of inpatient care utilization in different socio-economic groups underwent drastic change in the period of 2006 – 2009. In 2000-2006, hospitalization rate in the richest quintile was higher than in the poorest one. One of the objectives of health system reform program is to narrow down variations in inpatient care utilization between the poorest and the richest quintiles⁸. KISH findings show that inpatient care utilization rate in the richest quintiles declined significantly while in the poorest quintile visit for hospital care was higher than in the richer quintile. (Table 8).

Table 8. Hospital care utilization during the last year, by household per capita expenditures quintiles (%), 4 rounds of survey

Hospitalization during the last year (%)	Poorest 20%	2	3	4	Richest 20%	All	Q1: Q5
2000	5.2	5.0	6.3	7.8	8.8	6.5	0.59
2003	5.1	4.6	5.4	6.8	5.8	5.5	0.88
2006	5.6	4.9	5.1	7.0	9.6	6.4	0.58
2009	5.9	5.1	5.9	5.6	5.2	5.5	1.1

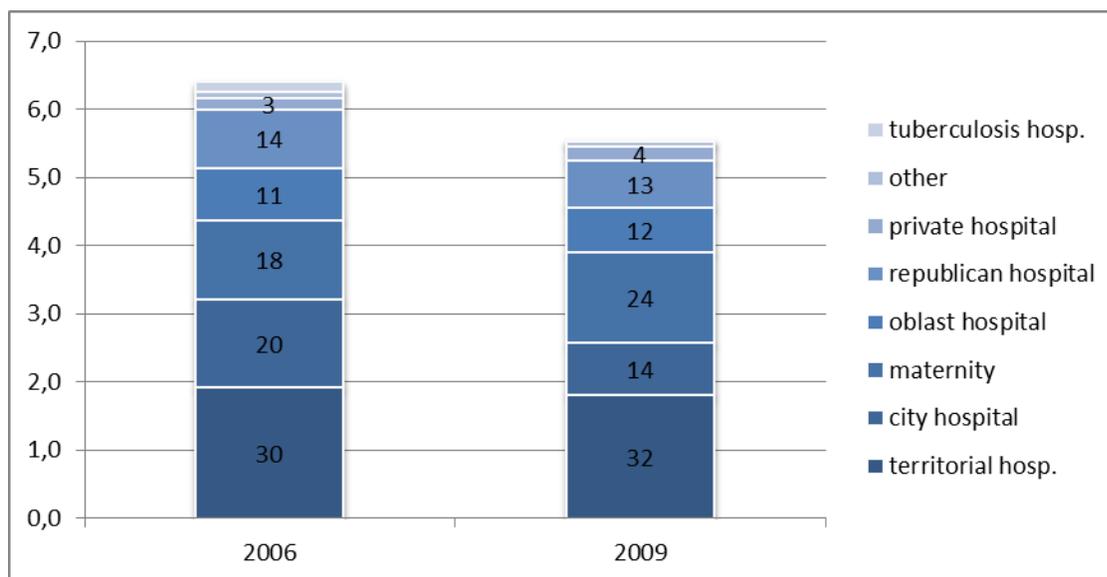
Average length of hospital stay is reducing gradually: in 2000 it was 15.3 days and 2009 – 11.6 days. Length of stay significantly reduced in almost all types of health facilities excluding maternity hospitals where average length of stay is 5 days (8 days in 2000 and 5 days in 2006). Therefore, efforts of the Ministry of Health aimed at reduction of length of hospital stay prove to be effective. However, it is worth mentioning that alongside with stable reduction of hospital stay we observe growing rate of hospital admissions which are oftentimes unjustified. This trend was revealed by the research undertaken by HPAC in 2009. Findings of this research suggest that

⁸ Manas Taalimi midterm review, Ministry of Health, KR,

this is closely linked with quality of delivered services, namely with ensuring adequacy of health care to objective condition of patient at inpatient level of health system⁹.

Structure of visits for hospital care by type of health facility almost didn't change: major share of population came to local hospitals (erritorial and municipal) and 12% of people came to province and republican facilities (Figure 11). Residents of Bishkek city (28%) and Chui province (26%) come to Republican hospitals most often unlike residents of Southern provinces which are more removed from the capital city – Osh (1.2%), Jalal-Abad (3.2%) and Batken (3.9%).

Figure 11. Structure of visits for hospital care by type of health facility, (% of those who sought care), 2006 and 2009



Discrepancies in visits for inpatient care by type of health facility are also related to socio-economic status. Representatives of the poorest quintile went to local hospitals where copayment and other expenses related to hospitalization are lower in costs. This quintile represents the highest share of those who sought care in territorial hospitals (40.8%) and smallest share of those who sought care in republican hospitals (4.1%). Of the richest quintile 19% of respondents sought care in republican hospitals and 25% sought care in territorial hospitals. Hence, the gap between the rich and the poor in utilization of inpatient care generally reduced while services of tertiary care level still remain hardly accessible.

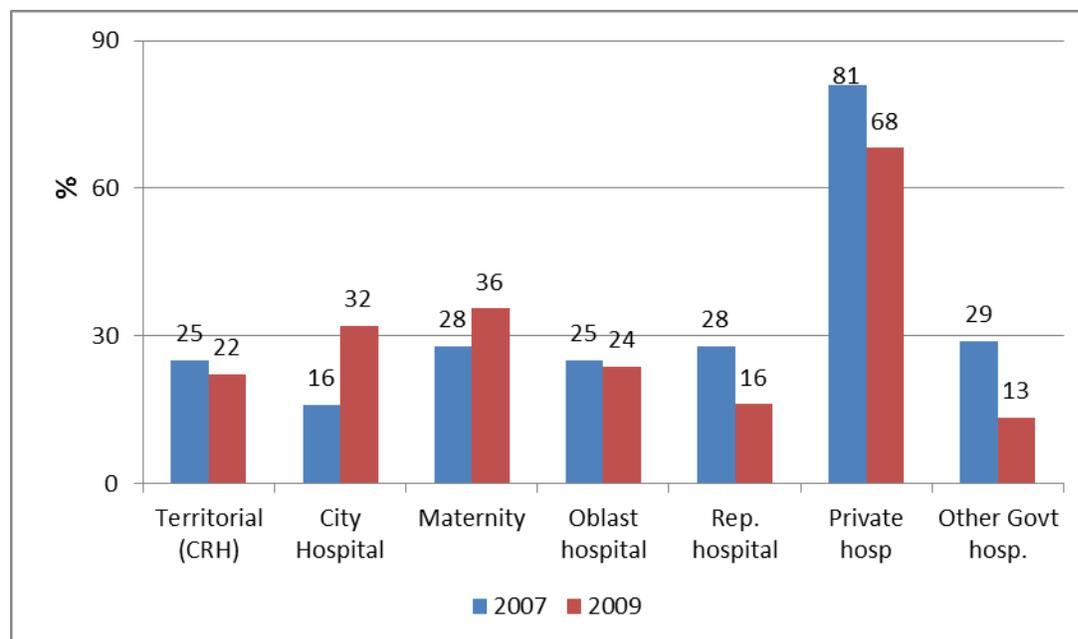
Issue of referrals is very important for monitoring of reform efficiency. Almost 2/3 of hospitalized patients in 2009 were referred from primary care facilities: FAP (14%), FGP (32%) and FMC (17%). Share of self-referral is growing: from 19% in 2004 to 28% in 2009. In the period of 2000 – 2006¹⁰ major share of self-referrals fell on health facilities of tertiary level. In 2009, share of

⁹ Murzalieva G., Cholurova R., Zurdinova A. "Situational analysis on validity of hospitalizations among children under 5 and pregnant women", Policy Research Paper № 68, HPAC, 2009

¹⁰ Falkingham J., Akkazieva B., Bachiyev A. Health, health care seeking behavior and patient out-of-pocket expenditures in Kyrgyzstan, 2007

self-referrals to municipal hospitals and maternity hospitals increased and share of self-referrals to republic health facilities reduced (Figure 12).

Figure 12. Percent of self-referred hospitalizations, by type of health facility, 2006 and 2009



Share of self-referrals among representatives of the poorest quintile was the highest (29%) similar to previous periods. The reason for this could be (1) the fact that people from poor household are less aware about health sector reform process and the relation of cost of treatment to presence of referral, or (2) poor people cannot afford to undergo initial examination at PHC level and thus prefer to "speed up" the process by going to hospital directly. In any case this means that people at the lower end of wellbeing distribution often face higher level of copayment since copayment in territorial hospital for non-exempt patient with referral is 2.5 times less than for patient without referral.

Majority of patients were admitted to hospitals located not far from their homes – median distance was 8 kilometers. But 43% of hospitalized patients spent more than 1 hour to get to a hospital. Ambulance cars transported only 10% of respondents and this figure has not changed since 2003. Transportation to hospital in an ambulance car is possible to a greater degree for residents of Bishkek city (27%) and Chui province (16%). In other provinces, share of patients transported by ambulance car is far less (from 4% to 7%). Share of patients who used own transportation (14% in 2006 and 22% in 2009) and taxi (34% and 41% accordingly) to go to a hospital increased as compared to 2006.

3.3.2. Out-of-pockets payments of households, by types of expenditures

As a rule, hospitalization implies heavy costs for the majority of households. This section looks at two types of expenditures: direct expenditures related to in-cash payments and indirect

expenditures related to compensation of some expenses on hospital services though assistance of family members.

Total expenditures

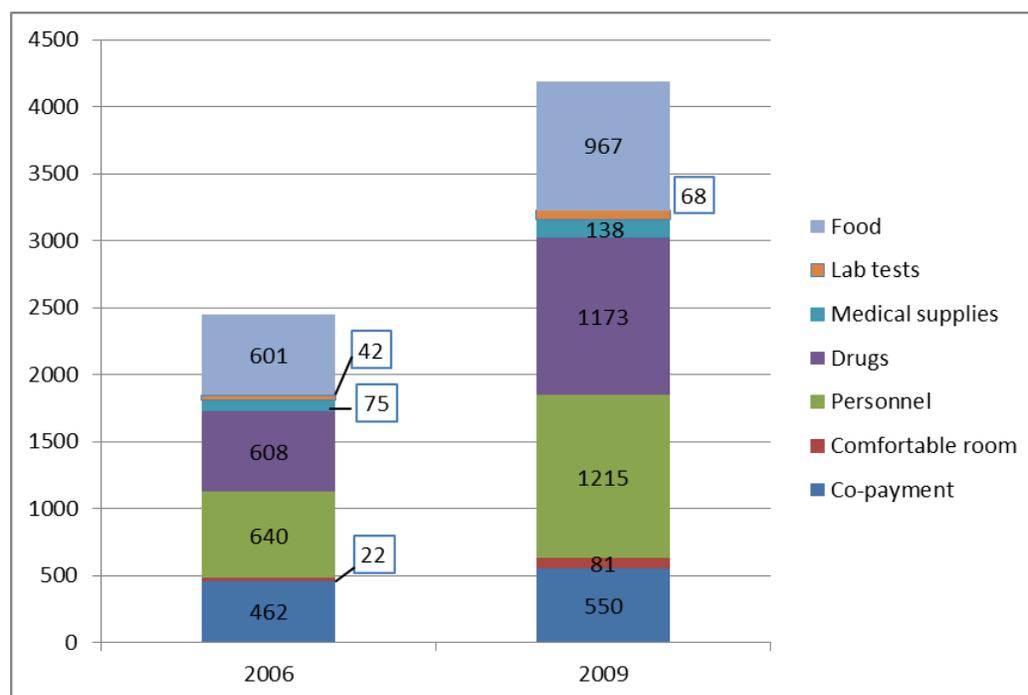
In total, 97.8% of respondents hospitalized in the period from February 2009 to February 2010 made some sort of payments in hospitals. Share of patients who paid for drugs and laboratory tests during hospital stay reduced significantly (Table 9) during the survey period (from 2000 to 2009) which can be attributed to introduction of the single-payer system and restructuring. However, level of informal payments to health workers and foods expenses remains very high. It must be admitted that purchase of additional food products is rather a tradition than a necessity. Thus, general analysis of household expenditures does not take into account expenses on food despite the fact that they comprise 23% of total expenditures related to hospitalization.

Table 9. Percent of those who made payments in hospital (out of total number of hospitalized patients)

	2001	2004	2007	2009
Copayment	48	58	64	57
Comfortable ward	-	-	4	4
Health workers	47	46	53	55
Drugs	83	70	65	64
Medical supplies	67	47	67	52
Laboratory tests	55	39	31	28
Food	93	82	65	91
All categories	65	57	50	50

Notable increase of the average amount of expenditures related to hospitalization was observed in 2009 as compared to 2006 (4 205 som in 2009 and 2 450 som in 2006). Greater expenditures were registered in all categories of payment (Figure 13). Substantive share of expenditures in general expenditure structure is accounted for payments to health workers (26% in 2006 and 29% in 2009), payments for drugs (25% and 28% respectively) and payments for food (24% in 2006 and 23% in 2009).

Figure 13. Average total expenditures for hospitalization among all patients (incl. zero value), 2006 and 2009



Average amount of expenditures for hospitalization increased by 79% in 2009 as compared to 2006 (excluding food expenses). Expenditures increased more than twofold in Jalal-Abad, Osh and Batken provinces and Bishkek city (Table 10). Lowest payments at hospital level were registered in Talas province and highest – in Bishkek city and Chui province.

Table 10. Average expenditures for hospitalization (excluding food) among all patients, by region, 2006 and 2009

Region	2006		2009	
	mean	median	mean	median
Chui	3 202	2 050	4 538	2 700
Bishkek	2 054	1 450	4 912	2 500
Talas	1 704	1 110	1 950	700
Issyk-Kul	1 684	960	2 659	1 100
Osh	1 535	850	3 104	2 020
Naryn	1 387	631	2 754	760
Batken	1 194	720	2 439	1 330
Jalal-Abad	958	550	2 394	890
Total	1 850	1 070	3 306	1 550

Total expenditures for hospitalization also vary by socio-economic status of patients (Table 11). Amount of payments made at hospital level increased by 71% for the poorest quintile and by 130% for the richest quintile. Moreover, the average expenditure for hospitalization is also vary across the type of hospitals, in particular in 2009 the highest expenditures were recorded in the

republican hospital (7,287 som), in the territorial hospitals it was moderate (2,391 som), and the lowest expenses were in the maternal hospitals (1,399 som).

Table 11. Average expenditures for hospitalization (excluding food) among all patients, by quintiles, 2006 and 2009

	2006		2009	
	average	median	average	Median
Poorest 20%	1 035	700	1 778	860
2-й	1 577	840	2 193	1 200
3-й	1 736	1 150	3 207	1 760
4-й	1 669	1 030	4 040	2 230
Richest 20%	2 373	1 700	5 448	2 600
Total	1 778	1 080	3 306	1 550

Payments to health workers

All together, 54.5% of all hospitalized patients reported making additional payments to health workers, including 59% of those who didn't pay the copayment and 52% of patients who paid the copayment. Average amount of payments to health workers was 1 215 som, including 1 134 som in cash and 81 som in-kind (as gifts, etc.).

Analysis of data by socio-economic status of respondents shows that frequency of informal payments to health workers was almost the same for rich and poor patients. But, in absolute terms there are significant differences in payment amounts depending on economic status: richer patients pay 4 times more than poorer patients (Table 12).

Table 12. Percent of hospital patients and average size of payments depending on socio-economic status, 2009

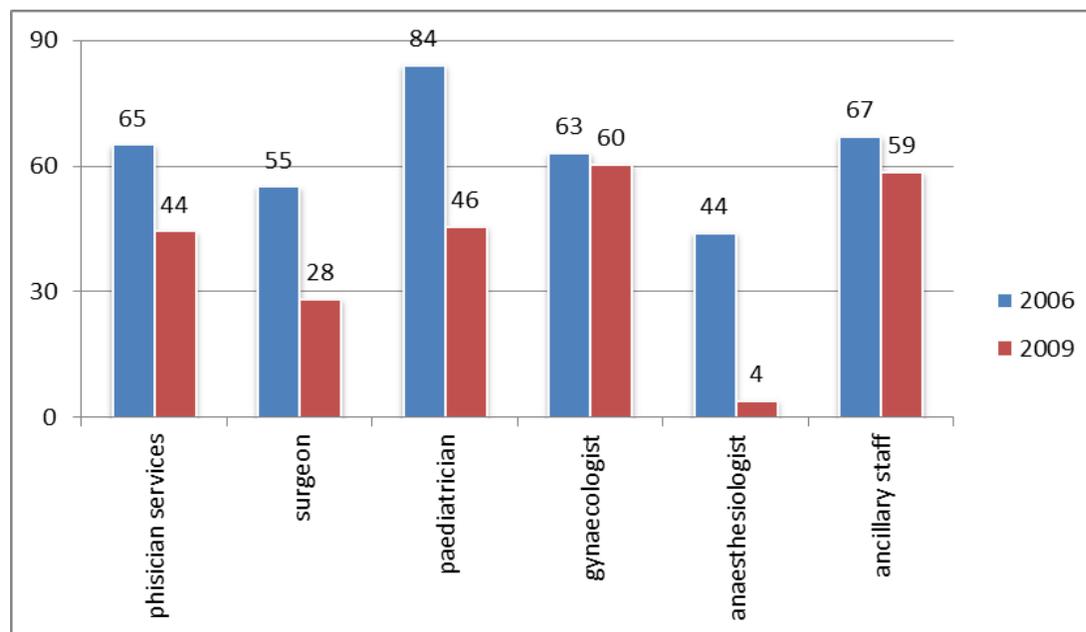
	% of those who paid	Average payment to staff	% of those who presented gifts	Average cost of gifts to staff	Total amount of payments to staff
Poorest 20%	44,4	521	15,8	40	561
2	48,8	572	21,2	101	673
3	40,9	588	14,7	60	648
4	54,2	1 903	20,3	103	2 006
Richest 20%	52,1	2 168	15,5	109	2 277
Total	47,9	1 134	17,4	81	1 215

In most cases payments to health workers in hospitals in 2009 were not initiated by patients of their family members but requested by the doctor, which means that these payments are informal (Figure 14). Data about price of surgery oftentimes charged by surgeons and anesthesiologists¹¹ find confirmation: only 4% of respondents who paid anesthesiologists

¹¹ Falkingham J., Akkazieva B., Bachiry A. Health, health care seeking behavior and patient out-of-pocket expenditures in Kyrgyzstan, 2007, page 35 Available by link

reported this payment being a gift while 86% reported that doctor requested this money and 9% - that doctor made a hint. Payments to obstetrician-gynecologists and auxiliary health personnel are often made on patient's own initiative to express gratitude.

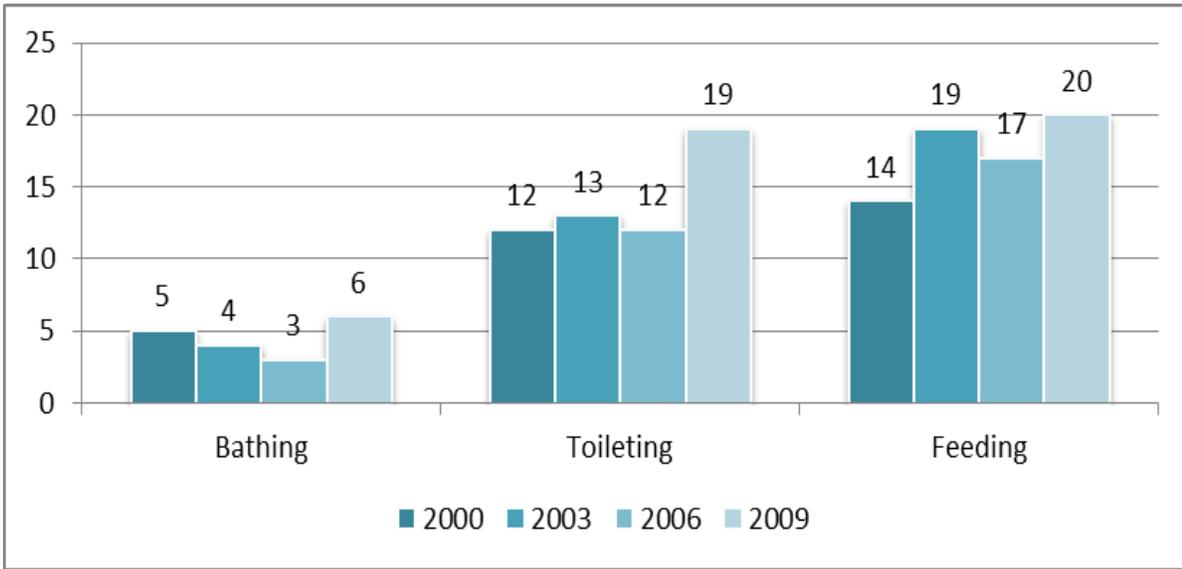
Figure 14. Percent of respondents making payment to health workers who reported it being a gift, 2006 and 2009



Family assistance

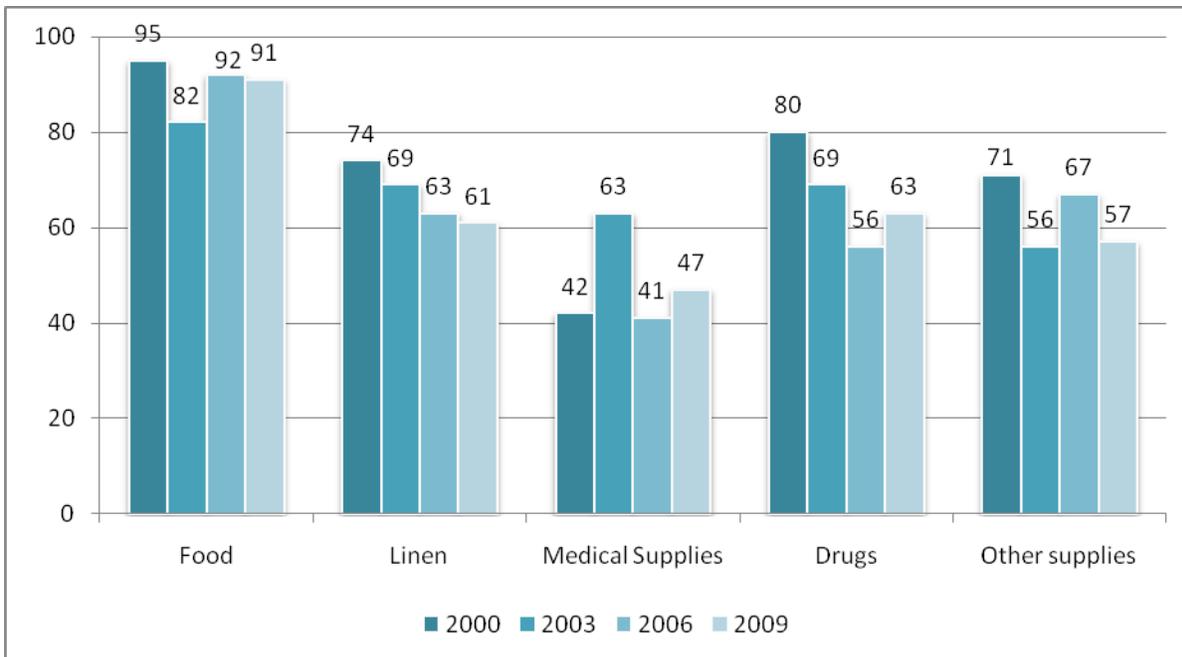
It is generally accepted for family members of a patient to compensate for some expenditures by providing food and linen as well as taking the responsibility for delivery of personal care such as bathing and feeding the patient. Some families assume other responsibilities which usually should be performed by doctors and nurses: administering drugs and injections. Data analysis shows that family members delivered personal care to about 20% of hospitalized respondents (Figure 15). Basic types of care, specifically, include feeding and escorting to toilet.

Figure 15. Percent of those who reported family assistance in delivering personal care during hospital stay, 4 rounds of survey



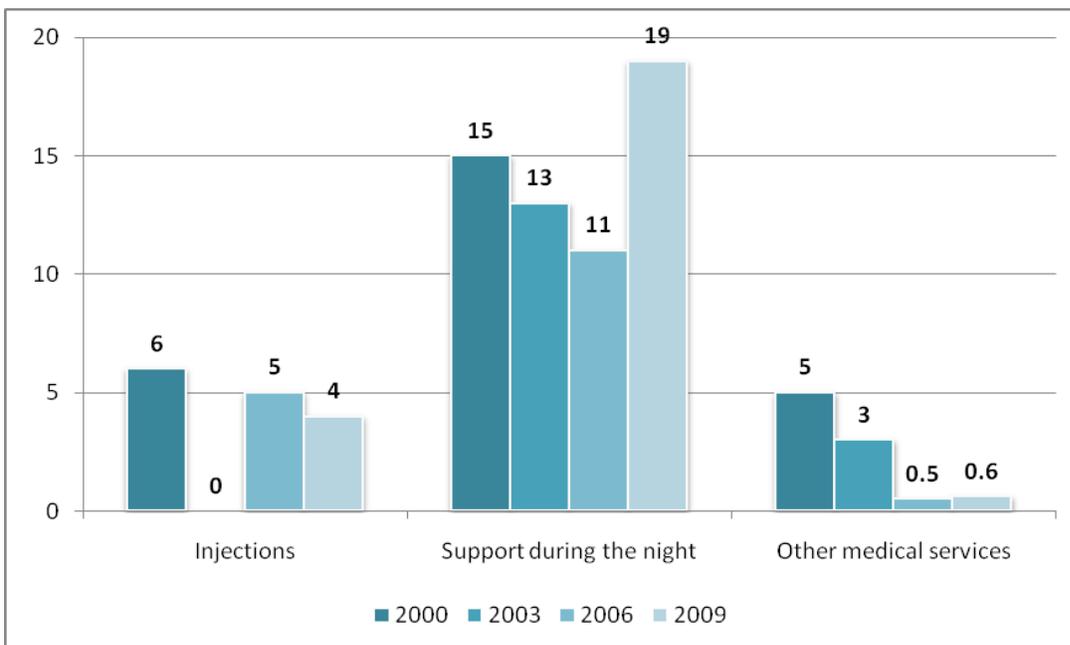
Provision of meals to patient remained unchanged while provision of drugs and medical supplies has improved as compared to 2006 (Figure 16). The need to provide medical supplies appeared more often for those families whose members received treatment in oblast (62%) and republican hospitals (55%). Only 18% of private clinic patients had to purchase medical supplies additionally. Rate of drug purchasing is above the average in virtually all hospitals except maternity hospitals (41%) and private clinics (31%).

Figure 16. Percent of people, who reported to provide selected items to their relatives during their staying in hospital, 4 waves of studies



There were still cases, when family members were giving injections to their hospitalized relatives (Fig. 17), and most frequently such cases were reported by the patients, treated in Territorial (5,2%) and City Hospitals (10%). The share of patients, who reported that their family members were staying on duty at the hospital, has significantly increased. The lowest indicator is observed in the patients, treated in private hospitals (6%) and maternity houses (1%).

Figure 17. Percent of people, who reported to provide selected services to their relatives during their staying in hospital, 4 waves of studies



Therefore, the analysis of getting health care at the levels of in-patient health facilities/hospitals, enables to make conclusions on the following positive changes:

- Variation/spread of the hospitalization level in social-economic groups has reduced during 2001- 2009; which might be indicative of increase of equity in use of hospital care.
- The KR MOH efforts aimed at reduction of length of staying at hospitals, are also successful: the average length of staying at the hospital has decreased by 4,3 days for 2000 - 2009.
- The share of patients, who had to pay for drugs and lab tests, has significantly dropped.

However, there are still outstanding issues in the area of ensuring of financial accessibility and equity of health care in hospitals:

- The share of self-referrals has visibly increased, especially in the poorest quintile groups, which has a significant impact on the cost of expenditures.

- Residents of remote regions do not have the possibility to use the services of «Emergency Ambulance Care» and have to use fee-paying transportation to get to hospitals.
- A considerable gap is observed in the use of tertiary health services depending on the social-economic status of respondents.
- Both the share of those who paid for services and the amounts paid, have a stable tendency towards growing. At that, most of the payments were forced payments, and were not initiated by patients.

3.4. Total health care expenditures

3.4.1. Private out of pocket expenditures (OOPs) by the levels of health services delivery and quintiles

We break down expenditures into three categories: out-patient expenditures, drug expenditures and in-patient expenditures. Out-patient expenditures include all expenditures and value for gifts paid to medical personnel during reported outpatient visits. Drug expenditures include both prescribed and non-prescribed drugs, discussed earlier in the Section «Out-Patient Services» (i.e. they do not include purchased drugs, associated with hospitalizations). In-patient expenditures include all payments made at the time of hospitalizations including co-payment, non-official payments to the staff and payments for drugs.

Table 13 below presents our calculations of expenditures as OOPs at the level of the entire population for the years of 2000, 2003, 2006 and 2009. Thus, **total out of pocket payments (OOPs) per capita** increased over the period of 2000-2009 by 29% annually in nominal terms, and by 10% in real terms. The analysis indicates that the highest percent of changes occurred in 2000-2003 (63%), when the expenditures in absolute values increased almost by 1,5 times, and even given the inflation, the rapid change was rather high (from 304 up to 442 Soms correspondingly). This general increase is not unexpected, given economic growth in Kyrgyzstan. It should be noted that this increase is mostly due to growth in drug expenditures.

Annual nominal increase in **drugs expenditures** was 33%. Thus, drug expenditures considering inflation increased almost by 2 times over the period of 2000-2009. One of the reasons of such significant increase, is growth of drug consumption, and as observed from the previous Section on drug use in 2009, almost every fourth respondent purchased drugs (24,5%), among them only 5,9% purchased drugs, prescribed by doctors and 20,2% purchased drugs on their own. Another hypothesis is could be sharp growth of pharmaceutical prices, as multinational pharmaceutical companies have been using increasingly aggressive price and marketing strategies. However, it should be noted that expenditures slightly decreased over the period of 2006-2009, yet remaining to be the highest cost category among all three expenditures categories.

Household expenditures on **out patient care** for the observed period has significantly increased almost by 1.5 times both in nominal and real terms. In general, the average annual increase was 13% in real terms, being the highest among all the rest of categories, and this growth occurred during implementation of Manas Taalimi (2006-2009). This can be well attributed to the focus on shifting from hospital towards out patient services within the framework of health reforms in services delivery.

And finally, household expenditures on **in-patient care** increased very moderately over the period of 2000-2009 which was only 3% of annual increase in the real terms. This picture could suggest that Single Payer reforms and co-payment policy have worked out to some extent and have successfully limited the growth in OPPs on hospitalizations. Still, it should be noted that for the period of 2006-2009 the real growth was 28% which is quite high compared to other time periods.

Table 13. Per capita expenditures as OOPs by health care delivery levels, 4 waves of studies

	Out of patient		Drug		In patient		Total	
	Nominal	Real	Nominal	Real	Nominal	Real	Nominal	Real
2000								
Som	42	42	168	168	94	94	304	304
%	14%		55%		31%		100%	
2003								
Som	51	45	335	297	112	99	497	442
%	10%		67%		23%		100%	
% change 2000-03	20%	6%	99%	77%	19%	6%	63%	45%
2006								
Som	81	63	470	364	164	127	714	554
%	11%		66%		23%		100%	
% change 2003-06	59%	39%	40%	22%	46%	28%	44%	25%
2009								
Som	172	91	667	353	247	131	1,086	574
%	16%		61%		23%		100%	
% change 2003-06	112%	45%	42%	-3%	51%	3%	52%	4%
% change 2000-09	306%	115%	297%	110%	163%	39%	257%	89%
Average annual change	34%	13%	33%	12%	18%	4%	29%	10%

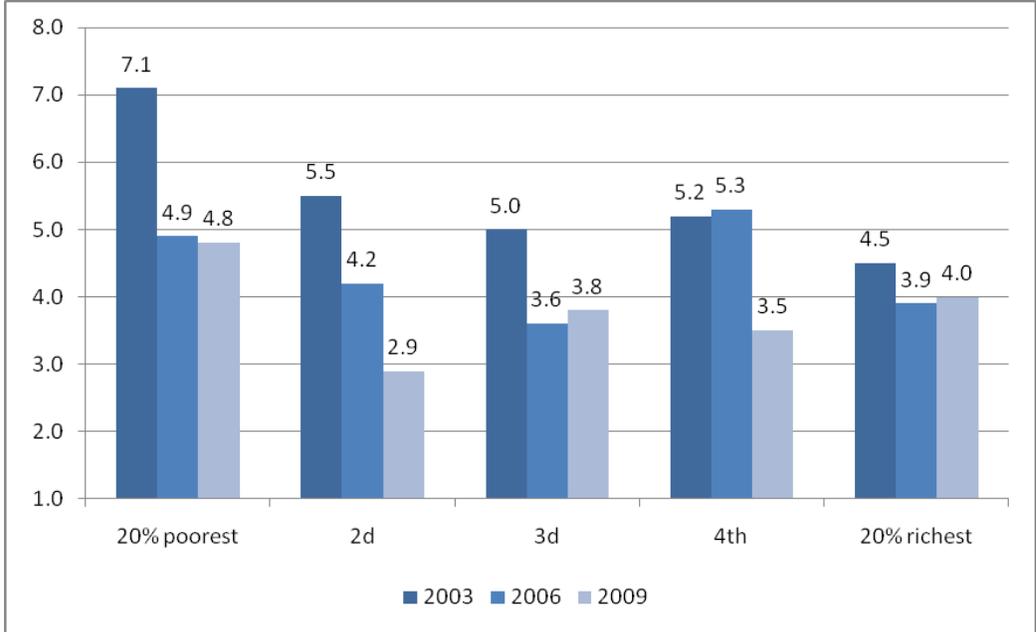
Note: in real terms, 2000=100

Household Expenditures by Quintiles

On average, out-of-pocket expenditures as a share of household resources reduced significantly in the 2003-06 period and stagnated in the 2006-09 period. Looking beyond the average, the quintile analysis shows that in the 2003-06 period, there was a particularly strong reduction in OOP as share of household resources for the three lowest quintiles and limited change was noted in the two highest quintiles. In the 2006-09 period, change is experienced in the 2nd and 4th quintiles. Overall, the Manas taalimi indicators were set for the two lowest quintiles as not exceeding 5% and this indicator was achieved. It has to be noted that the 5%

was set based on the 2003 household survey results and the 2006 results became available only at the MTR of the strategy.

Figure 18. Total OOPs on health expenditures as share of the total households budget



Disaggregating further this indicator into its numerator and denominator, an interesting picture emerges (Table 14). In the 2003-06 period, two effects were taking place simultaneously. First, the single payer system with its new pooling and purchasing mechanisms was introduced gradually nation-wide with subsequent centralization of pooling to the national level allowing equalization across the country. This has led to a significant reduction in the growth rate of out-of-pocket expenditures for the poor. Second, relatively pro-poor growth was taking place increasing household resources significantly including in the bottom quintiles. As a result, OOP as share of household resources significantly declined especially for the poor. In the 2006-09 period, the growth rate in out-of-pocket payments accelerated in most quintiles. Luckily, there was significant pro-poor growth during the time period, commensurate to the growth rate of out-of-pocket payments leaving this indicator unchanged in Q1, Q3, and Q5 and further reducing it in Q2 and Q4.

Table 14. Household growth rates in OOPs and consumption by quintile

	2003-06		2006-09	
	Growth rate in OOP	Growth rate in consumption	Growth rate in OOP	Growth in consumption
Q1	21.8%	73.3%	71.6%	65.8%
Q2	34.9%	73.9%	31.1%	62.6%
Q3	24.2%	67.5%	79.0%	55.7%
Q4	84.1%	69.9%	8.2%	44.7%
Q5	61.2%	98.9%	48.3%	24.0%
KR	52.0%	81.7%	41.3%	41.7%

The important conclusion is that the introduction of the single payer system triggered restructuring of health facilities and documented gains in efficiency. This allowed re-allocating public funds from infrastructure to medicines and other direct patient costs reducing OOP's. However, this seemed to have been a temporary effect which was outweighed in the 2006-09 period by (i) lack of progress on the unfinished restructuring agenda especially in Bishkek and Osh (where out-of-pocket payments are growing fastest), (ii) the fast proliferation of the number of medicines and their fast increasing prices, as well as (iii) slow progress with evidence based clinical practice with unnecessary prescriptions, over-hospitalizations, etc.

Therefore, the analysis of total household OOPs presents a mixed picture:

- The growth in out-of-pocket payments slowed down in the 2003-06 period in the aftermath of the introduction of the single payer system and restructuring. The fast growth rate has resumed after 2006, however, including for the poor. Since there was a pro-poor growth during the Manas Taalimi period, out-of-pocket payments as share of household resources have not increased.
- Drug expenditures category is the highest expenditure category in absolute terms among all three expenditure categories. However, one could observe a decrease in drug expenditures considering the inflation over the period of 2006-2009.
- Households expenditures on out -patient care have significantly increased during the period of 2000-2009.
- A moderate growth of household expenditures for in-patient care is observed during the period of 2000-2009 where average annual increase was only 4% in the real terms.

3.4.2. Public– Private shares and total health care expenditures indicators

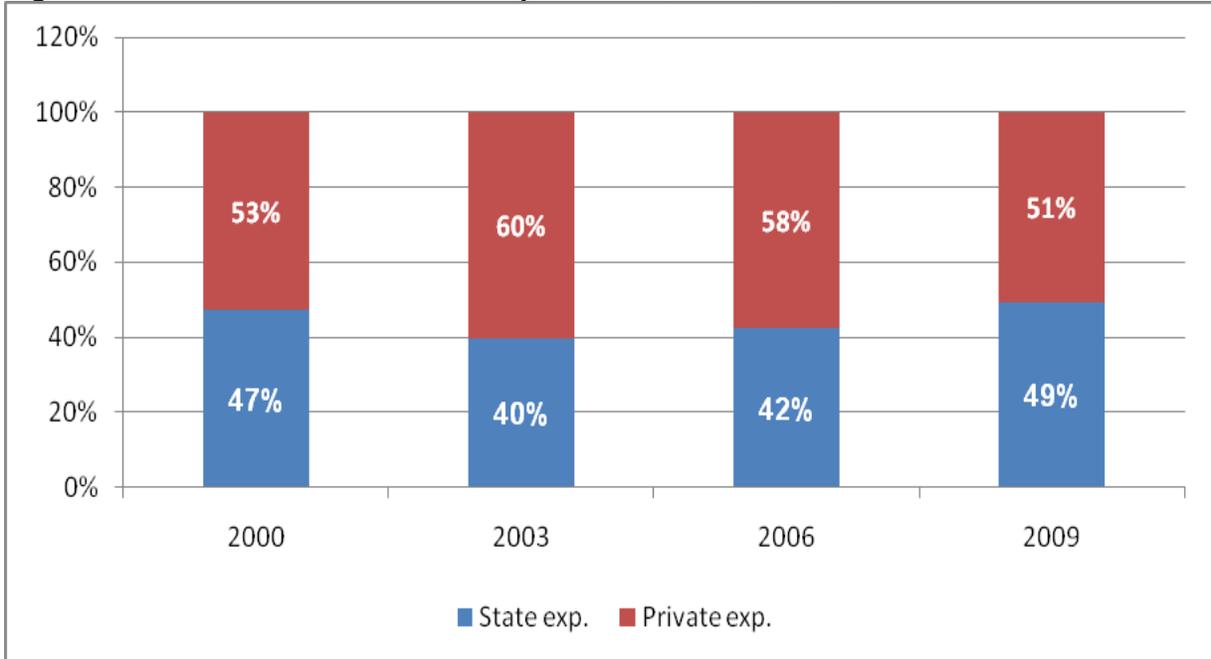
During the period of 2000-2009 total health care expenditures (excluding external financing) increased from 2.9 up to 11.1 bln Soms, giving more than 4 times nominal growth. However, considering the changes in prices the real growth was about 1.3 times (Table 15). Considering the inflation public expenditures level for 2000-2009 considerably increased by 2.1 times. The main reason for such growth was a condition posed by the development partners for allocating SWAp funds - increase the share of public health expenditures as a percent of the total public expenditures by 0.6% annually. By increasing the public expenditures from the beginning of Manas Taalimi implementation including SWAp implementation (2006), the hope was laid for improvement of health care systems performance in such key aspects as equity and health status of population.

Table 15. Total Public and Private Health Care Expenditures and Per Capita Expenditures (in Mln Som), 2000, 2003, 2006 and 2009.

	2000	2003	2006	2009
In Nominal terms				
Total Health care expenditures (mln Som)				
State expenditures	1,353	1,726	2,888	5,492
Private expenditures	1,521	2,628	3,922	5,636
Total	2,875	4,354	6,810	11,127
Health care expenditures per capita (in Som)				
State expenditures	276	344	564	1,072
Private expenditures	311	524	766	1,086
Total	587	869	1,379	1,390
As % of the total health care expenditures				
State expenditures	47%	40%	42%	49%
Private expenditures	53%	60%	58%	51%
Total	100%	100%	100%	100%
In real terms (2000=100)				
Total health care expenditures (mln Som)				
State expenditures	1,353	1,533	2,238	2,905
Private expenditures	1,521	2,336	3,040	2,981
Total	2,875	3,869	5,474	3,765
Health care expenditures per capita (in Som)				
State expenditures	276	306	431	540
Private expenditures	311	466	586	574
Total	587	772	1,017	1,114

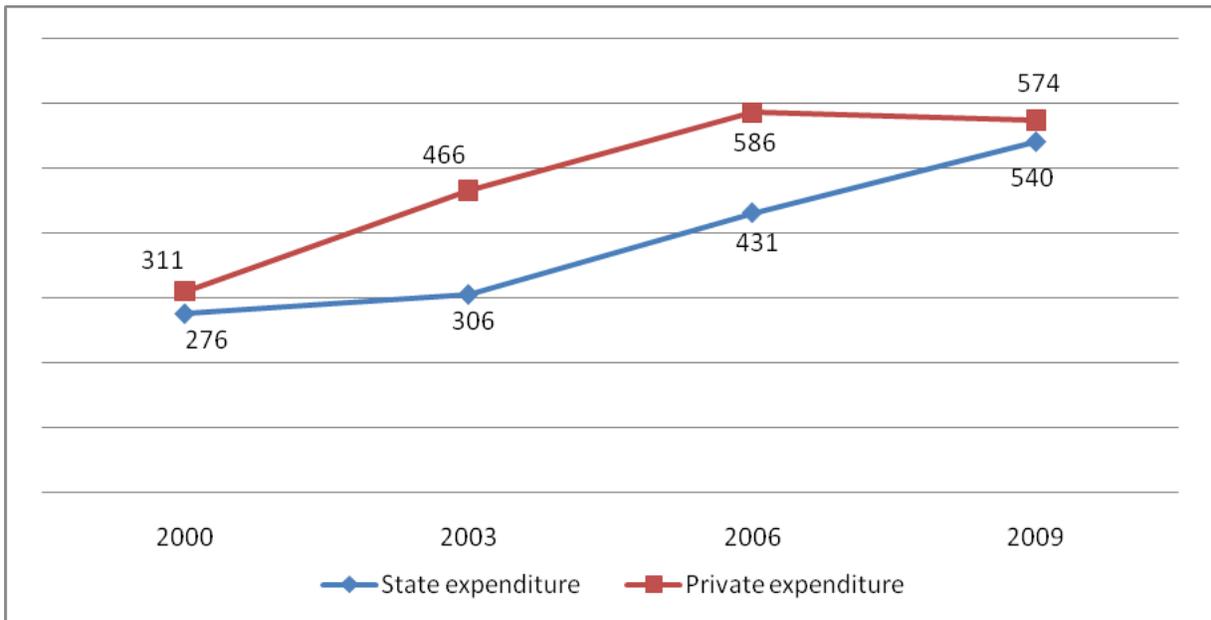
In the structure of total health care expenditures the private expenditures dominate and the dynamics of that is mixed during the period of 2000-2009, but it is remarkable that in 2009 the share of private expenditures was lower vs. the baseline year (2000). Thus, its share decreased by 7% during 2006-2009 comprising of 51% in 2009 vs. 58% in 2006 (Fig.19). Hence, the level of public expenditures increased significantly. Such picture reflects significant results of financing reforms within the framework of Manas Taalimi Program. However, the study on financial gap, conducted in 2009 by HPAC, points out that the financing gap in SGBP for all population categories is about 27.5% in average that might lead to unofficial payments and limiting the potential of reforms to impact on health status of population and financial protection.

Figure 19. Structure of total health expenditures, 2000, 2003, 2006 and 2009.



The Figure 20 shows how the gap between public and private expenditures increased during the period of 2000-2006 (from 34 up to 154 Som). However, in the latest years this gap decreased, in 2009 the level of public expenditure was the same level as in 2000.

Figure 20. Trend of growth of public-private expenditures per capita, 2000, 2003, 2006 and 2009, in Som



Therefore, in the structure of total health expenditures for the observed period, private expenditures dominated over the public ones; so that in 2009 the expenditures was 51% and 49% respectively. However, during the period of 2000-2009 the level of public expenditures increased significantly, almost by 2 times, considering inflation. This reflects noteworthy results of financing reforms of Manas Taalimi. However, the study on financing gap, conducted in 2009 by HPAC, points out that the financing gap in SGBP for all population categories is about 27.5% in average that might lead to unofficial payments and limiting the potential of reforms to impact on health status of population and financial protection.

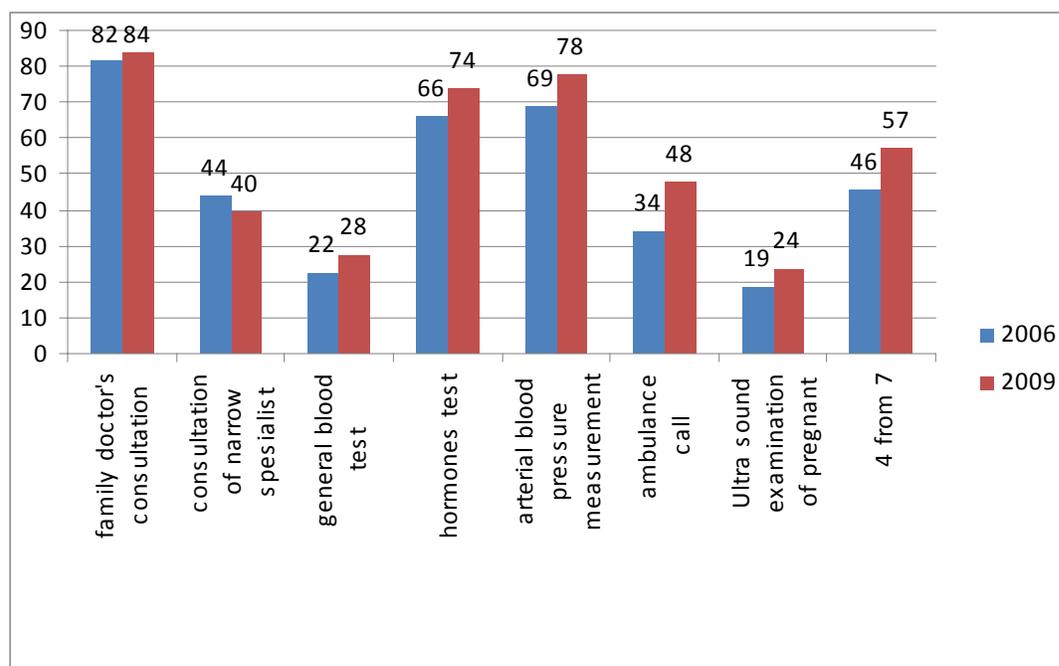
3.5. Population awareness about their rights under SGBP

Starting from 2006, the questions on population awareness about their rights under SGBP were included into the survey. The survey questions were focused to reveal population awareness about their rights related to out-patient care, in-patient care and Additional Drugs Package. Thus, the KIHS results indicate that patients are aware mostly about benefits they are entitled to when treated in hospitals, then - when receiving care at out-patient level, and then – under Additional Drugs Package. Compared to 2006 the level of awareness about these issues has considerably improved.

As the study findings indicated, the level of population awareness of their rights under the SGBP is significantly improved. The level of awareness of MHIF coverage has visibly improved for the observed period from 26% in 2000 to 96% in 2009. About 99% of respondents in retirement age and about 94% of children under 15 reported about their MHIF insured status.

The questions in the study were grouped to find out the awareness of population of their entitlement to benefits under (a) out-patient care, (b) in-patient care and (c) additional drug package. Mostly people are aware about their entitlements under in-patient care. Over 76% of households heads reported that if a patient hospitalized then he/she should not pay additional money to medical staff after pay off the co-payment; 53% - should not pay additional money for drugs (Fig.21). People were asked about seven out-patient care services, which of them are provided for free of charge and for which need to be paid. About 57% of population answered correctly to the minimum of 4 out of 7 questions; in 2006 it was 46%. Positive tendency of population awareness' improvement is observed for all types of health services.

Figure 21. Level of awareness on necessity to pay for services at primary health care, 2006 and 2009.



Respondents were less aware of the entitlements, provided under the MHIF Additional Drug Package. Only 36% of the insured said that they were entitled to purchase drugs at reduced price at out-patient care level, and only 26% of households heads knew that their children under 16 were entitled to buy drugs at reduced price at out-patient care level (Table 16). Compared to 2006 this level has not undergone any significant changes.

Table 16. Level of population's awareness of their rights, %

	2006	2009
Share of respondents, who gave at least 4 correct answers out of 7 points on the question what services at primary health care level are provided free (visit to FGP, visit to a narrow specialist, blood and urine analysis/test, arterial blood pressure measurement, ambulance services, ultrasound of pregnant women) and on fee paying basis (hormone analysis, renal and rheumo-tests)	45,9%	57,4%
Share of respondents, who gave correct answer to the question if a patient should pay medical personnel any additional money for something, except co-payment for hospitalization	66,5%	76,4%
Share of respondents, who gave correct answer to the question if a patient should pay for drugs in addition to the co-payment for hospitalization	49,2%	52,6%
Respondents who reported that they are entitled to ambulatory/out-patient drugs at reduced/privileged price out of those, who reported to be insured through MHIF	30,4%	36,6%
Respondents who reported that they are entitled to ambulatory/out-patient drugs at reduced/privileged price out of those, who have children under 16	26,2%	26,9%

Therefore, the analysis of questions data enables to recognize that:

- Awareness of the entitlements under the SGBP is improving: patients are best aware of the benefits they are entitled under hospital treatment, then upon receipt of care at out-patient level, and then – under MHIF additional drugs package (MHIF ADP).

3.6. Barriers for access to health services

Financial problems for receipt of health services remain to be quite significant for those, who had to reject the services.

45% of households pointed out that they experienced cases when they needed some health care, but they did not seek for it. The majority of people did not seek for health care as they were self-treating themselves (Table 17). Among those, who did not seek for health care, 12% pointed that they did not do that due to financial problems.

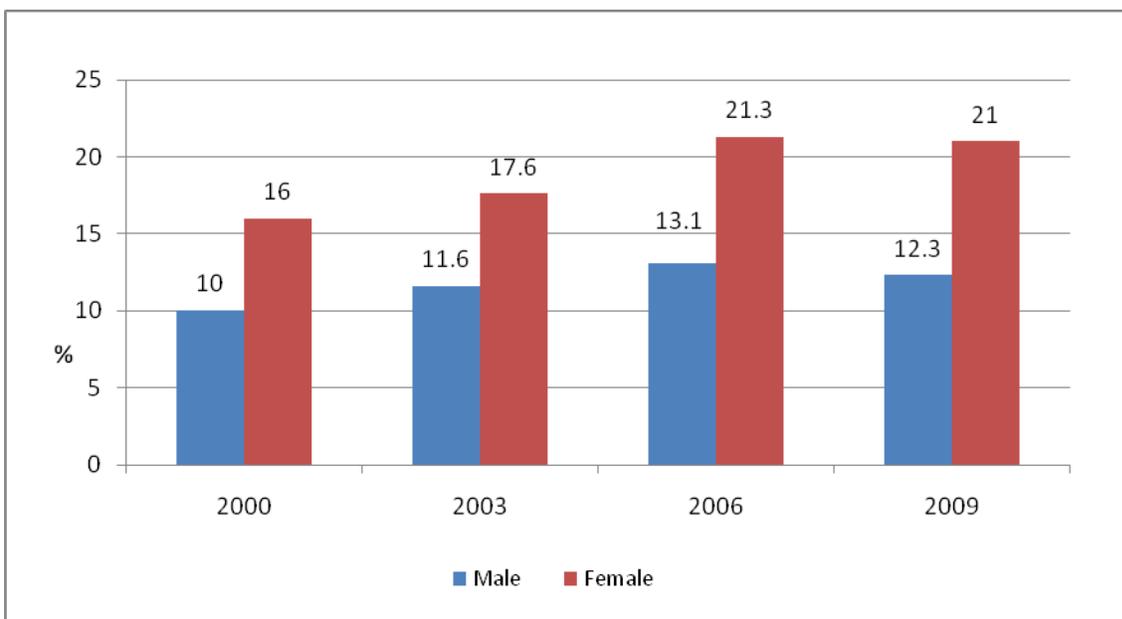
Table 17. Reasons for not seeking for health care among those, who needed it, 2006, 2009

	2006	2009
Thought that he will get better himself	17	10,1
Used traditional drugs	38	69
Used available drugs	37	47,5
Could not afford paying for these services	14	12
Poor servicing	3	3,6
Distrust to doctors	7	2,7
Lack of residence stamp	0,2	0,3
Health institution located too far	0,6	0,9
Other	0,8	0,6

In 6% of households, respondents reported the cases, when a person was referred to a hospital, but did not seek for care there. In 2006 this index made 10%. Financial barriers in this case play a crucial role, as 53% in 2006 and 56% in 2009 of those, who needed hospital care, did not seek for it due to lack of money.

Financial barriers have somewhat less importance for receipt of out-patient care. All together, about 17% of respondents pointed out that they needed out-patient care, but did not seek for it, and this level remains as stable compared to 2006, but higher compared to 2003 and 2000 levels (Fig. 22).

Figure 22. Percent of those, who needed health care, but did not get consultation during the last 30 days, 4 waves of studies



The main reason for non-seeking for health care is a spread practice of self-treatment: 81,6% of respondents among those who sought for consultation from medical specialist, took drugs on their own, and 6,5% reported that were treating themselves by herbs. This is also indicated by the above analysis of use of drugs, which points out that most of drugs were purchased without doctor's prescription or administration. Lack of money has become the reason for 4,1% of respondents, remoteness of health care providers— for 0,3%, and lack of residence stamp - for 0,1% of respondents.

The first indicator of «Manas Taałimi» Program management panel under «Accessibility and equity of health services» is «Share of population, who did not seek for needed health care due to lack of money and remoteness of health institution». According to the analysis, conducted within the KHS in 2000-2009, the following expected indicators were achieved: a) share of population, reported that they needed health care, but didn't seek for it, and indicated as the main reason - expenditures or distance to the health institution, has made 4,1%; b) share of the total population (regardless of the stated need), who did not seek for health care due to expenditures or distance to health facility has made 0,8% (Table 18). Thus, it is clear that health care reforms have achieved significant progress as far as reduction of financial barriers to accessibility to health services in Kyrgyzstan.

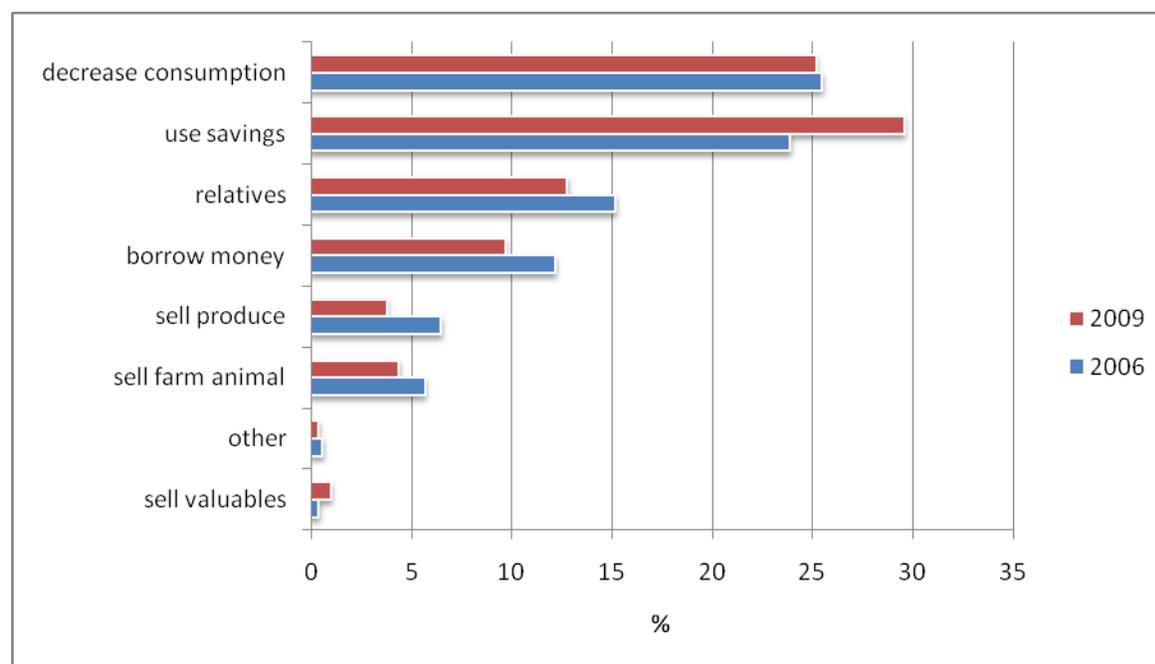
Table 18. Percent of those, who needed health care, but were not consulted during the last 30 days, 4 waves of studies

	2000	2003	2006	2009
% of people, indicating the reasons - “high cost ” or “too remote ”	11.2%	6.3%	3.1%	4,4%
People who did not seek for health care due to financial or geographic reasons in the ration to the total population	1.5%	0.9%	0.6%	0,8%

In 3% of households people reported that they experienced refuse from health care. Out of them, in 54% of cases the reason was insolvency or inability to pay for health service.

About 38% of households reported that it was ‘difficult or ‘very difficult’ for them to find money to pay for health care during the last 12 months prior to conducting of the study/survey in March 2010. These households used diverse schemes to overcome these difficulties, including reduction of use and expenditures, use of savings or borrowing money (Fig. 23).

Figure 23. Share of households, reporting diverse strategies to come out from the situation to pay for health care during the last 12 months, 2006 and 2009.



Therefore, the analysis of questions, related to barriers for access to health services, enables to make the following conclusions:

- Health care reforms have achieved a considerable progress as far as reduction of financial barriers for access to health services in Kyrgyzstan during 2000 -2009. In particular, it was noted that financial access to ambulatory/out-patient services is improving.

- However, financial barriers play a significant role in receipt of in-patient/hospital services, in particular, over one third of households point out that finding of money for treatment is associated with difficulties for them.

Conclusion

Out-patient care level

In general, primary health services are quite accessible for population: (1) level of seeking for health services remained to be stable during the entire surveyed time period, (2) gap in seeking for care at primary health care between the poorest and richest population quintiles is continuously reducing, (3) and only 4,4% of respondents, who needed out -patient health care, but did not receive it, reported that they did not seek for care from health care institution due to financial or geographical barriers.

The situation with purchasing of prescribed drugs has significantly improved: 90% of respondents, to whom drugs were prescribed, reported that they purchased all medical preparations, and the share of people, who didn't buy drugs due to high cost, has considerably decreased.

The 2009 survey has yielded the following findings:

- Significant changes are observed in the structure of visits to health care institutions, which reflect both the impact of reforms and the situation developing in health sector in general. Thus, the decrease of the level of cases of seeking care from secondary health care institutions, including those due to TB, and gradual increase of cases of seeking of care from FAPs, are indicative of efficiency of reforms in this sector. At the same time, increase of visits to FMC, reduction of home consultations and reduction of consultations, provided by paramedics, indicate the crisis of human resources, especially in rural area.
- One of the things of special concern is decrease of the share of cases of seeking for consultations among patients with chronic diseases, and low level of seeking for care among men over 55 years of age. This might have a significant impact on efficiency of control of chronic diseases, including hypertension.
- The main share of out of pocket payments (OOPs) falls into payment for consultations with health personnel. A positive aspect is that payments to paramedical personnel are reduced. At the same time, increase of the share of seeking for care from health care institutions with higher cost of care (private medical centers, FMC) has an impact on how both the share of those, who made payments at out-patient level, and the average amount of payments, have a tendency towards increase.
- Financial and geographical accessibility of drugs has considerably improved.
- Practice of self-treatment is spread in population, and the fact that most of drugs were purchased without doctor's prescription is indicative of this practice. Almost similar amount of money is spent for drugs, purchased without prescription and drugs, prescribed by doctors.

In-patient care level

Some positive changes have occurred as far as accessibility to health services at in-patient care level:

- Hospitalization level among social-economic groups for 2001-2009 has reduced; which might be indicative of improved equity in use of hospital care.
- Efforts of the MOH on reduction of the patients' length of stay in hospitals are also successful: average length of stay in hospital reduced by 4.3 times during 2000-2009.
- The share of patients, who had to pay for drugs and lab tests, has significantly decreased.

Yet, there are outstanding issues in the area of ensuring financial accessibility and equity of health care in hospitals:

- The share of self-referrals is increasing, in particular in the poorest quintile groups, which has a significant impact on expenditures.
- Population from the remote areas does not have possibility to use «Ambulance» services and have to use fee-paying transportation to get to hospital.
- Both the share of patients, who made payments, and the amounts paid to medical personnel, have a stable tendency towards growth. At that, most of payments were forced, and were not made upon the patients' initiative.
- A significant gap in use of tertiary health services is noted depending on social-economic status of respondents.

Total OOPs

- The growth in out-of-pocket payments slowed down in the 2003-06 period in the aftermath of the introduction of the single payer system and restructuring. The fast growth rate has resumed after 2006, however, including for the poor. Since there was a pro-poor growth during the Manas Taałimi period, out-of-pocket payments as share of household resources have not increased.
- Drug expenditures category is the highest expenditure category in absolute terms among all three expenditure categories. However, one could observe a decrease in drug expenditures considering the inflation over the period of 2006-2009.
- Households expenditures on out-patient care have significantly increased during the period of 2000-2009.
- A moderate growth of household expenditures for in-patient care is observed during the period of 2000-2009 where average annual increase was only 4% in the real terms.

Barriers to getting health care

- Awareness of the entitlements under the SGBP is improved: patients are best aware of the benefits they are entitled under hospital treatment, then upon receipt of care at out-patient care level, and then – under MHIF additional drugs package (MHIF ADP).
- Health care reforms have achieved a considerable progress as far as reduction of financial barriers for access to health services in Kyrgyzstan during 2000 -2009. In particular, it was noted that financial access to out-patient services is improving. However, financial barriers play a significant role in getting in-patient services, in particular, over one third of households point out that finding of money for treatment is associated with difficulties for them.