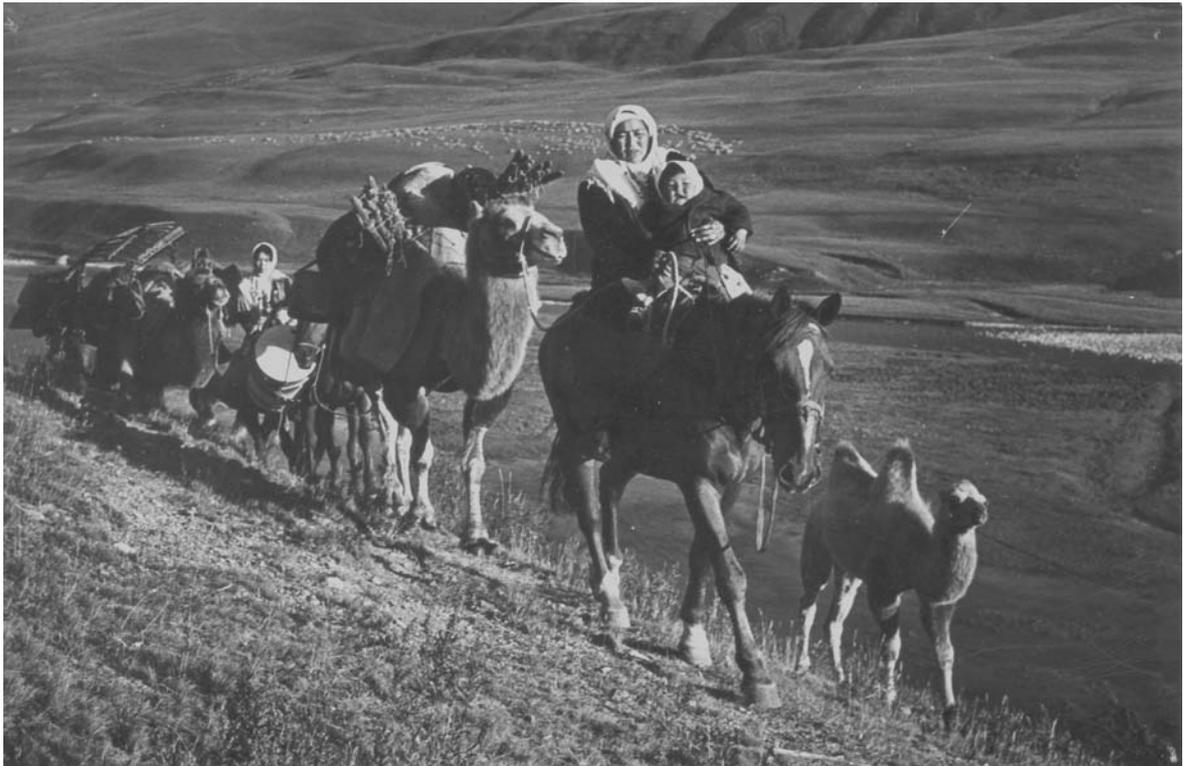


KYRGYZ LIVESTOCK STUDY



PASTURE MANAGEMENT AND USE

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Table of Content

I. Executive Summary

II. Pasture Land Resources

III. Pasture Land Management

- A. Historical Background on Pasture Usage
- B. Overview of Legislation on Pasture Management
 - 1. Management responsibilities
 - 2. Use regimes, tenure relationships
 - 3. Accountability of governing entities
 - 4. Coordination among parties
 - 5. Farmers' formal role and rights
- C. Practical Examples of Pasture Management in Practice

IV. Piloted methods of pasture management

V. Conclusions

II. Pasture Land Resources

A. Introduction

Kyrgyz Republic is a landlocked country situated in the north-east part of Central Asia. Its territory occupies about 20,000,000 hectares of land and stretches from west to east for about 970 kilometers and from north to south for about 400 kilometers. The total area is about 198,000 square kilometers.

About 90 percent of the territory is under the mountain ranges of Tian Shan and Pamir Alai, the rest 10 percent is under the valleys and lowlands. In the north it borders Kazakhstan with the border line running along the dividing ridge of the Kyrgyz Range, Chui river and Zaili Ala-Tau. Eastern and part of the southern border with China runs over the apexes of the Kok Shaal-Tau. In the west the country borders Uzbekistan and Tajikistan and border runs over the top of the Pskem range and foothills surrounding one of the largest valleys in Central Asia - Ferghana valley.

The Kyrgyz Republic has population of about 5 million people with 65% living in rural areas and the rest in urban areas. Over 40 percent of total population lives in absolute poverty. Poverty is higher in rural than in the urban areas, with the rural population accounting for 75% of the poor and for 80% of the extremely poor. Rural population, especially poor segments of it depends on natural resources and their sustainable use for subsistence and income.

Kyrgyzstan's legislation establishes 3 tiers of sub-national territorial units: 7 Oblasts (Naryn, Chui, Talas, Issyk-Kul, Jalal-Abad, Osh and Batken), 45 Raions, and 472 *aiyl okmotus* and 1,856 villages and rural settlements (as of January, 2005). The number of *keneshes* is always changing because some are being divided and some merged all the time (in 1994 there were 301 *aiyl keneshes*).

Local government institutions in the Kyrgyz context consist of local state administrations at intermediate territorial levels (raions and oblasts), local councils at these same intermediate levels (though these are to be eliminated according to new legislation passed at the end of 2004), local self-government (councils and executive entities) at primary rural and city levels, and an array of deconcentrated local state institutions at oblast, raion, and city levels and which have dual subordination to both line ministries and local state administrations or, in major cities local self-governments. Local self-government comes closest to the Western concept of local government, i.e. government institutions separate from the state that are constituted by the local population and which manage a substantial portion of public affairs.

Kyrgyzstan divides its sub-national government institutions into two types: '*local state administrations*', which are deconcentrated executive bodies that answer to central government, and '*local self-government bodies*', which are in some form selected by the population of a territorial unit. At present, local state administrations exist in oblasts and raions, headed respectively by governors and *akims* appointed by the President. Oblasts and raions also have locally elected councils (*keneshes*), which are considered a body of local self-government. In practice oblast and rayon councils have little oversight over policy-making and no control over the state administrations which de facto govern.

Relief of Kyrgyz Republic is diverse and complex. Mountainous ranges of Tian Shan and Pamir Alai alternate with deep intermountain valleys. The general direction of the ridges is from west to east, except the Ferghana ridge which direction is more meridian.

The land of the Kyrgyz is located at the altitude from 500 to 7,439 meters above the sea level. Only about one third of the country lays at the altitude of 1,500 meters and another third of it at the altitude of 3,000 meters above the sea level and higher. Mountain ranges are cut by gorges and small fast rivers.

The majority of the country territory belongs to the river basin of Syr Daria with the biggest river Naryn (about 700 kilometers), which runs from the east to west through the country and joins Kara Daria in Ferghana valley. Other big rivers are Kara Daria, Talas, and others. All rivers of the Kyrgyzstan are typical mountain rivers with fast flow, laying in stony beds. In winter they usually do not have much water, in spring when snow melts in the mountains basin and mountains foothills they get flooded and in summer they get water from the snow melted in glaciers and high mountains and from undersurface water sources.

The climate is also very diverse because of diversity in altitude and different vegetation characterizes different altitudes. Difference of temperature of the southern and northern slopes at the same altitude can get to 10 and more degrees. From down deserts and deserts-steppes are replaced by dry steppe, steppe and forestry steppes. Then at the humid slopes they are replaced by high grass meadows, bushes and forests, which in turn are replaced at the higher altitude by sub alpine and alpine meadows.

The total land area of the country is about 19,995,100 ha with majority of land in the Land Fund (land in state ownership).

Table 1. Land Fund in the Kyrgyz Republic

Land	Area (ha)	Percentage of Total Land Area (%)
Agricultural Land	5,554,400	27.7
Land of Settlements	242,900	1.2
Land of Industry, Transport, Communications, Defense, and etc.	221,800	1.1
Land of Specially Protected Areas	432,500	2.2
Land of the State Forestry Fund	2,651,200	13.3
Land of the State Water Fund	767,000	3.8
Reserve Land	10,125,100	50.7
TOTAL	19,995,100	

Source: Resolution # 744 of the Government of the Kyrgyz Republic on Results of the Kyrgyz Republic Land Inventory as of January 1, 2004. October 7, 2004

Rangelands and forests are dominant and make 49 percent of the total land area while arable land makes only 7 percent. Pastures make more then 86 percent of agricultural land of the country and cover area of 89,000 km². In addition to designated rangeland, there are additional pastures that are classified as part of the 'Forest Fund'. The total amount of this Fund is 32,000 km², of which 21,300 km² have no actual forest cover and are effectively rangeland pasturage.

Table 2. Agricultural Land in the Kyrgyz Republic

Land Use	Area (ha)	Percentage of Total Agricultural Land Area
Arable land	1,238,6000	11.6
Perennials	37,400	0.4
Fallow land	21,400	0.2
Hay land	169,600	1.6
Pastures	9,187,600	86.2
Total	10,654,600	

Source: Resolution # 744 of the Government of the Kyrgyz Republic on Distribution of Land Fund according to the Agricultural Land Categories as of January 1, 2004. 2004. October 7, 2004

According to Kyrgyz legislation, there are various classification of pastures according to various criteria. These numerous classifications lead to confusion among policy makers as well as beneficiaries.

- According to activities conducted on the pastures, they are classified as natural and artificial or cultural (these are pastures which undergo some improvements, taken care of in terms of cultivation and used for partial grazing of animals). Such pastures can be established at the plough land.
- According to the location and jurisdiction, pastures can be of Forestry Fund – these are pasture lands which are located in the boundaries of the State Forestry Fund but can be used for animal grazing.
- According to the seasonal use pastures are divided into three major categories: winter, spring-autumn and summer pastures.
 - *Winter pastures* occupy the area of 2,063,000 ha. The definition of a winter pasture does not correspond to altitude, landscape features or vegetation type but they are usually close to permanent settlements, in areas of light or negligible snow fall where stock can be easily housed, at least at night. Snow cover is no longer the defining factor it was, if stock can be housed at night and stall fed, as is now customary. The Kara-Kujur valley in the north of Naryn Oblast is counted as a traditional winter pasture; it lies at 2 700 meters, produces abundant hay, is relatively free of snow and has plentiful water. Livestock including sheep and yaks were historically wintered even in the Ak Say valley, in Naryn oblast, which though over 2 500 meters is generally comparatively free of snow. Currently, almost all dairy cows and often other animals graze on the winter pastures located close to settlements all year round causing their severe overgrazing and degradation. Usually livestock constructions are located at these pastures, such as small houses for shepherds, sheep sheds remained from the Soviet times. These pastures are in a especially bad conditions being overused and not taken any care of.
 - *The summer pastures* usually situated in middle elevation and in the high mountain valleys and gorges, occupy area of 4,129,000 ha, and characterized by high productivity. They are used in summer period from one to four months. They are located at significant distances from the settlements and sometimes access to them is difficult through passes and fast river streams. Though excessively stocked in Soviet times, particularly latterly in the 1970s and 1980s, most of the, traditional summer pastures are now showing the beneficial effects of several years of light and sometimes negligible grazing by livestock. This under-utilization of the summer pastures is often

in stark contrast to the heavy stocking and continuous use of the more accessible pastures, which currently get little or no seasonal relief.

- *Spring-Autumn pastures* are usually located on the foot hills below 2 500 m and occupy about 2,955,000 ha. Grazing starts here in early spring when vegetation just starts and then in fall when harvest is taken from the fields. These pastures are extremely important for livestock because they serve as first natural feeding source after winter, and used for insemination, shearing, and dipping of sheep. It is however necessary for livestock not to be taken to these pastures at the beginning of grass vegetation which is different for different localities. These pastures in many localities are being grazed all year round and this leads to overgrazing, erosion and overall degradation of these pastures.

Table 3: Pasture Resources in the Kyrgyz Republic

Type of Pasture	ha	% of Total KR Territory
Summer pastures, from 2500 to 3500 meters above the sea level	4,129,000	45
Spring-Autumn pastures – 1500-2500 meters above the sea level	2,955,000	32
Winter pastures	2,063,000	23
Total Pastures	9,147,000	100
Total Area of Kyrgyzstan approx.	19,994,900	

Source: Availability and Distribution of the Land Fund of the Kyrgyz Republic, January 1, 2004. State Agency for the Registration of Rights to Immovable Property.

- According to the geographic location and distance from the settlement, pastures are divided into the following categories:
 - Pastures for remote grazing located at the significant distance from the settlements (called remote) and which are used for grazing for a season. These pastures have inter raion and inter oblast importance;
 - Pastures located in the area of intensive use (intensive);
 - Pastures which are located in a zone between remote and around settlement pastures.
 - Pastures around settlements which are located close to the settlements and used by villagers and entities who keep animals in their households yards. This category includes pastures which are located in the arable land, hay lands, and lands under fruit trees.
- Pastures can also be irrigated (where there are natural or made water sources), mountainous (which are located on the territory of mountainous range and above).

A. Historical Background on Pasture Usage

Pasture land management on the territory of the Kyrgyz Republic has undergone three distinct phases: (1) the traditional herding patterns of the Kyrgyz prior to collectivization in the Soviet era; (2) Soviet centrally planned usage of pastures and intensive livestock breeding; and (3) the post-independence hodge-podge of government regulatory entities and practices brought about by intended and unintended policy changes in the rural sector. This section will examine the first two stages. It is extremely important to understand traditional way of managing and using pasture resources because its major features still could be traced down to the modern times.

Historical background. The vast rich mountainous rangeland resources on various altitudes, existence there of numerous water sources and rivers and overall mild climate with sufficient rainfall of Tian Shan and Pamir Alai ranges and Silk Routes lying on this territory for centuries were attracting various tribes from Central Asia and Southern Siberia. The whole history of the region till the XIX century is a movement of nations and tribes in and out of these lands when local ones were either assimilated or pushed out by constant waves of new tribes coming here looking for better lands.

This land also attracted attention of big and small kingdoms and khanates which tried to establish here a power in order to control routes, use lands for military groups and collect various taxes. On its territory or some parts of it Chingizids power was replaced by Sheibanids, then Kazakh Khanate, Kalmyk Khanate, Tsing Empire, then Kokhand Khanate and finally by Russian Empire till the Soviet period in XX century. Various rulers brought and imposed their own norms, regulations and traditions. However, Kyrgyz people managed to maintain their own identity, ways of life and traditions in tact till the modern times.

Geographic, climatic and natural conditions has dictated that livestock was historically a major economic activity of various tribes living on its territory. According to historical texts and archeological findings, Turkic and Mongol tribes on the territory of the modern Kyrgyzstan in VI-XIII centuries lived nomadic life raising mainly horses and sheep which were their “sources of food, drink and clothing”. Horses were the major trade commodity to urban settlements in Central Asia and China. Camels and yaks were bred in smaller numbers and mainly for transportation purposes. In some areas, especially in the Southern areas they raised goats. Crop production was spotty and not sustainable. Only later in XVII-XIX centuries with various administrative and land reforms conducted by colonizers and then growing trend of land cultivation and gradual settlement of population, cattle started to take a prominent position in the composition of herds of tribes living in and around fertile valleys. With the diminished migrations horses had become less popular and camels almost completely disappeared. Till the final settlement in XXth century Kyrgyz had lived a pastoral life with vertical and sometimes horizontal movements following their herds.

Russians and other European population moving to the lands of the Kyrgyz in 18th and 19th centuries have occupied fertile valley and especially areas with arable land while nomadic population was up at the mountains, and then often conflicts happened around winter homes between nomadic Kyrgyz and settled Slavs and other ethnic groups.

Kyrgyz started to settle after land and water reforms in 1920s and by the end of 1930th majority of them were settled.

Transhumance patterns. Climatic and natural conditions of Tian Shan feature vertical zoning with extremely fragmented lands divided by the mountain ranges. Natural conditions here vary from sub tropical (in lowland valleys) to arctic (at the top of the mountain ranges). These zones are located in vertical way and sometimes the whole range of them occupies only two dozen of kilometers. Mountain gorges and valleys are jammed by ranges which are sometimes impossible to pass. The width of these mountain valleys gets up to 40 kilometers. Often these lands have pastures of all seasons along the rivers and gorges and create a sort of close chain for animal migration without the need to move any further. These vertical climatic, geographical zones determine the way of livestock grazing in the country and depending on them in some cases tribes used to move to summer pastures to the neighboring valleys and in these cases routes were laid through rivers and passes and were used by the same tribes every year. In general, annual cycle of tribal movement was repeated in the same direction and to the same lands which were informally considered owned by the specific clan and or tribe.

Settled in winter time in valleys along the rivers, tribes usually started to move in May first to lands at the mountain hills and with temperature rising and grass burning under the sun, they moved up to the most remote pastures within June-July months. In July-September they stayed at the summer pastures. In September-October depending on the geographic location and climate they used to start moving down to the valleys where they spent winters. Usually coming down to the valleys started after cereals/barley were harvested and collected from the fields. All pastures had their own natural boundaries and names which differed them from one to another. In some historical sources it is mentioned that movements of tribes were determined by the availability of pastures.

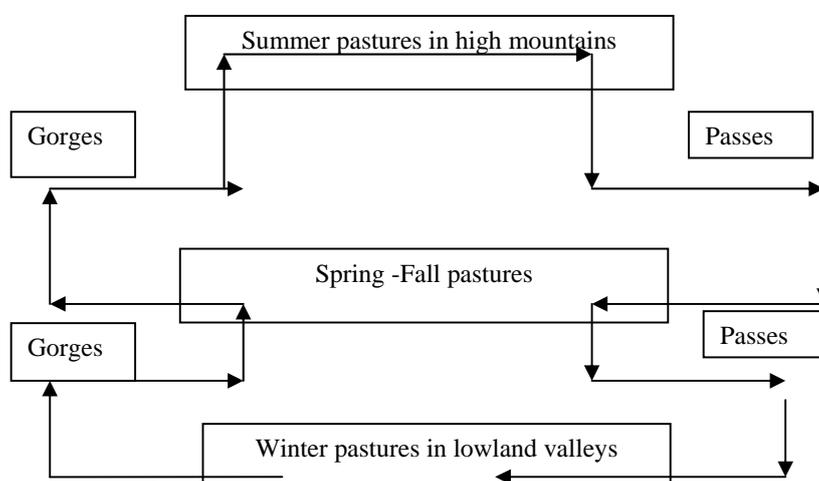
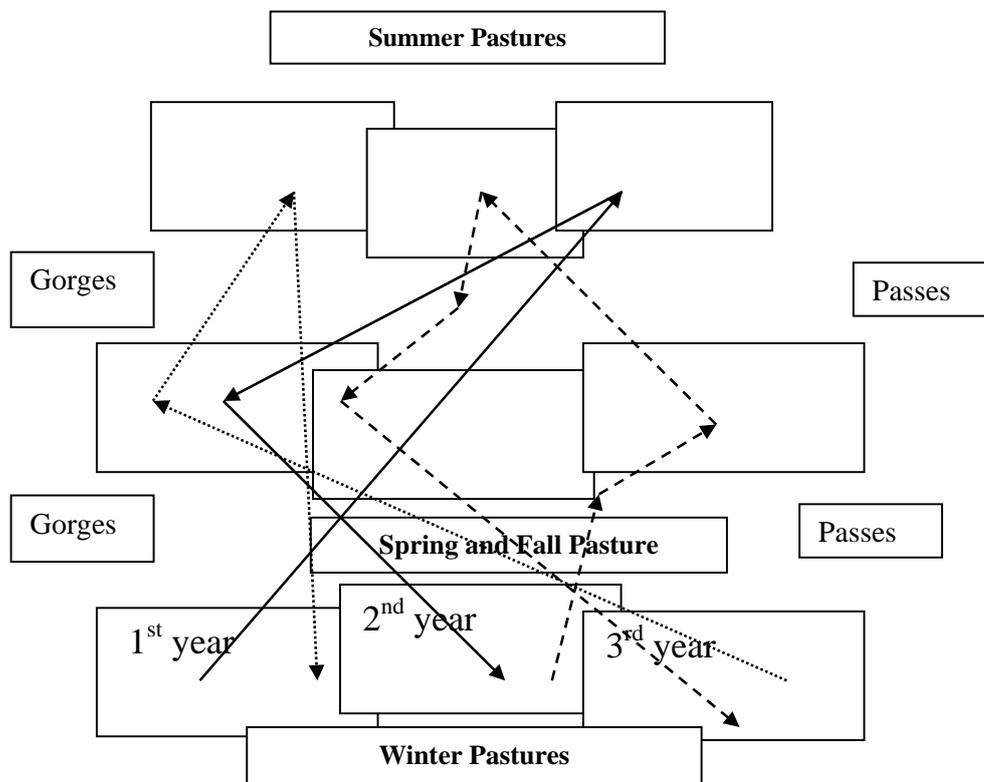


Diagram 1. Annual repetitive type of movement from lowland pastures to summer pastures¹

The pattern of movement was determined by geographic and climatic conditions in specific areas.

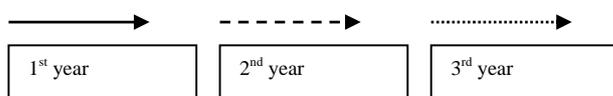
¹ Petrov. Writings on social and economic history of Kirgizia in VI –the beginning og XIII centuries. Frunze, 1981

- ❖ In some areas the annual movements were repetitive up from lowland valleys in early spring to higher pasture for spring and then in June-July to highland summer pastures. In a fall they moved down through the same pasture areas to the same winter location (see Diagram 1).
- ❖ Some tribes used to change direction of their movement to the summer pasture every year with cycles of 3 to 5 years coming back to the same location in winter time every 3rd or 5th year and moving around on close distances (see Diagram 2).
- ❖ Some summer high mountainous pastures could be used a year round, because of winds blowing off snow from the mountain flanks or sun melting it down fast. Thus, some parts of tribes or some tribes stayed in the same summer pastures areas setting out camps in warmer gorges in winter and during summer moved to higher and more open spots in the same area. For example, *Aksai* pasture with area of 480,000 ha has winter and summer pastures located close to each other. These pastures and now are used for year round grazing of sheep.
- ❖ Often only better off families could afford to move far from the winter settlements passing difficult gorges and passes. Movement from one pasture to another could take up to 4 days. Those who had insignificant number of sheep and horses if climate conditions were favorable used foothills for summer grazing not far from their winter settlements². Some families or member of families involved in cattle breeding and land cultivation also stayed behind major groups using close by pasture lands for grazing dairy cows and sheep.



² Petrov. Writings on social and economic history of Kirgizia in VI –the beginning og XIII centuries. Frunze, 1981

Diagram 2. Example of multiyear cycles of movement from lowland pastures to summer pastures³



These patterns of movements were maintained till the XIX and early XXth centuries and somewhat even survived through the Soviet times.

Transhuman organization of grazing allowed pastures to regenerate and represented pasture rotation ideas.

Social Organization of Pasture Users A nuclear unit of Kyrgyz people for centuries was a family or a household called *yurt*. Each household was a part of a clan living together and based on kinship - *aiyl*. One or few clans made a bigger community or a cluster of clan groups – a tribe- *uru*. Each tribe had one or few leaders- *bii* (this term later was replaced by term *manap*). However, some cluster of tribes which made a community based on territorial principle, i.e. lived together, moved together and had one leadership of a *Senior Bii* though were not direct relatives. All tribes were part of two big tribal-territorial divisions- right (in general tribes of the Northern part of modern Kyrgyzstan) and left “*wings*”(tribes of the Southern part).

According to the historical sources, tribal leaders – *biis*- were in charge of allocation of pasture plots. “They allocated places for grazing and according to the names of these places and mountain ridges called the clans. Nobody was allowed to intrude through borders of these plots and it was prohibited to do harm to each other”⁴. Each *aiyl* or *uru* moved together along the same gorges (in Russian term for this gorge is *Urochishe* which probably originated from Turkic word *uru* – tribe).



Each tribe had a special sign- *tamga*- with which they marked their property, especially animals. *Biis* were in charge of maintaining administrative networks, and made decisions of internal and external issues. Level of well being was determined by the number of animals in possession. Poor members of clan who had no animals used to receive some animals from rich relatives and in exchange they either shepherded their herds, did other works or paid back in animals.

Khans and later Russian Governors sent their representatives to manage Kyrgyz, but in fact the power has been always in hands of local *biis* and later *manaps*.

³ Petrov. Writings on social and economic history of Kirgizia in VI –the beginning og XIII centuries. Frunze, 1981

⁴ Siui Chji.

In XIX centuries, with joining Russian Empire, administrative reforms has started to be implemented. In various regulations of governing of Kyrgyz colonial land, Russians tried to fix state ownership of pasture, when only state can allocate land, determine its use, take it into state property reserve and rent it out. Excessive land was taken into colonial fund for distribution among European migrants. The sub rent and sales of pasture land were prohibited.

Russian governors made everything possible to weaken traditional tribal system of Kyrgyz and undermine authority of local leaders making this position elected versus inherited. New administrative structure made a ground for settlements of Kyrgyz people. Aiyl which comprised of about 50-70 households- yurts- were combined into *volost* - which were governed by local sultans. These sultans were supposed to be elected by aksakals of volosts and biis. Sultans in their turn elected Senior sultans.⁵ However, even administrative reforms conducted by Russian colonizers took into account traditions and social norms of Kyrgyz trying to adopt them to Russian vertical structure.

Later regulations adopted in 1869, 1897, 1891 on Turkestan land formed Russian policy towards land reform. This included confirmation that all lands which were in use are determined to them on the basis of local traditions.

Russians and other immigrants from Europe reintroduced settled agriculture in the northern part what is now Kyrgyzstan (particularly in the Chu and Talas valleys and in Issyk Kul). These lands had been claimed for use as winter pasturage for centuries following the triumph of nomadism over urban civilization in these areas after the Mongol conquest in the 13th century (prior to this era, these areas had boasted rich cities and settled agriculture). Further, the Russians brought a system of land tenure based on property rights backed up by colonizing state authority that gave settling European farmers an advantage in converting winter pastures into farmland. This led to increasing tension, but no more formalized way to deal with adjudicating questions over land since formal authority was exercised by Russian clerks. One of the major systemic reason for the Kyrgyz uprising against the Tsar in 1916 was their dissatisfaction with a half century of losing their winter pastures to colonizers.

Values and Traditions in Tenure Rights Over Pasture Use

These clusters of households had different number of animals which were in private ownership. Ownership of pasture, hunting, and fishing lands was common. However, since movement of various tribes was continuing for a while the territorial ownership was not constant and solid. There are documents showing that some gorges were allocated and given to some tribes. Within this, some communities have received slots for the separate groups of households. However, often some pastures were used by mix of various tribes and communities.

Communal-tribal ownership of land was established in some tribes starting from the end of XVII century and widely became dominant in the XVIII century, with final settlement of Kyrgyz tribes within Tian Shan and forming of nation.

Regulation of allocation of pasture and hunting lands was done later by the central authorities (chingizids, khans, and etc). Pasture lands were considered to be owned by the khan and all tribes

⁵ Review of Major basis of local government in Siberia, 1841 in Aristov, Usuni or kara-kyrgyz.

were considered as temporary users of these resources. For the right to use these lands they had to fulfill some obligations, and if they refused to do that their land was withdrawn and given to others. In the Southern parts and sometimes in the Northern parts, land was given to Kyrgyz leaders by rulers as awards for services. “Tribal lands were obtained by nomads primarily by conquest and given by khans to the whole tribes for some deeds. These lands were taxed by one tenth of harvest for the state and were allotted to tribes by khan’s documents where there were borders of the plot shown, number of rivers and water sources, and etc. They were stamped by the khan’s stamp”⁶. These documents were kept in the hands of aksakals of the tribes.

Biis- local tribal rulers were in charge of organization of pasture use, grazing movements. Historical sources mention some *biis* to be awarded by Chinese emperor special prizes for good organization of nomadic livestock activities among his tribe.⁷ Chinese sources mention “The road to the tribes (Pamir-Ferghana Kyrgyz) goes through Osh and Tsunlin mountains. In each tribe there is a ruler-*bii*- there are from 200 to 7000, or 1300 *yurts* (Kyrgyz traditional house, meaning also household). Totally there are about 2000 *yurts* with about 10 000 people. They are all governed by the *adygine* (name of tribe) chief. Although tribe is subdivided they all migrate within the same boundaries. Manchjur Emperors taxed local *biis* by per heads of livestock and not for land areas under pastures.”⁸

In the XIV century and thereafter the collapse of Chagatia Ulus (*ulus*- governing and political unit) and Yuan Empire and feudal subdivision of Kyrgyz tribes and Tian Shan mongols the distribution of pasture and other lands was conducted totally by local khans and rulers.⁹

Each family had a right to the commonly used land based on its kin relations to the *aiyl*, clan, and tribe. However, the sizes of allocated per household land for temporary use, with quality of each was determined by the number of animals in these households. At the same time, tribes and clans ensured that everybody had an access to land and protected the community and clan rights from intruders. The inflows of tribes from other areas often led to re distribution of pasture resources among the tribes and their relocation from specific rangeland areas either temporary or for good.

The transactions were rarely made in written and signed by respective authorities. But even in these cases the ownership right was awarded to tribes and not only to its leaders. Some tribes rented or sub rented out pasture land to other tribes even when it was prohibited by law as during the Russian Empire period.

Community- tribal system with its traditional institutes and norms was very strong and survived almost unchanged till the Revolution of 1917.

Patterns of Interaction, Conflicts on Pastures and their Resolution

It was generally known what group of households used specific pastures for grazing their animals. In some cases pastures with valuable position at the water sources, with mild climatic microclimate attracted attention of more then one tribe and then if negotiations between leaders of the clan didn’t complete successfully some force was used to obtain informal use rights.

⁶ Turkestan Vedomosti. #20, 21. 1885.

⁷ Petrov. Briefs of Feudal Relations of Kyrgyz in XV-XVIII centuries. Frunze, 1961

⁸ Quotation from Chinese sources – Notes of Wei Yuan in Petrov. Briefs of Feudal Relations of Kyrgyz in XV-XVIII centuries. Frunze, 1961

⁹ Petrov. Briefs of Feudal Relations of Kyrgyz in XV-XVIII centuries. Frunze, 1961

Munduz tribe of Saru volost, Namangan used wrote in their appeal to Military Governor on April 27, 1883: "Locality Yulbars belonged us from the very old times and this is confirmed by two documents we have. We also have two papers from former Kokjhand khans giving us a right of ownership to this location Yulbars. We ask to allocate formally this land to us because Governor of Sarui volost gave this land to other tribe *burakanbek*. (Iliyosov, Land Relations in Kirgizia at the end of XIX – beginning of XX century)

Since ownership or use rights were rarely documented, many conflicts were difficult to resolve. Often, tribes who used some pastures by generations, appealed to courts against some other tribes who got these lands by the decree of khans or other authorities without agreement of local tribe. In such cases, *biis* or *kazy*

reviewed all documents available and tried to talk to both sides.

The major function of the *aiyl* leader – *bii* - was to address conflicts among the members. They tried to convince, had some rights to impose penalties and even physical punishments. But they always made decision jointly with respected members of the tribe - *aksakals*.

Conflicts which occurred between different tribes were addressed by the leaders of tribes- *manaps*. They even had a right to review appealed cases which were judged and decision made earlier by *biis*. Only in the South, Kokhand khanates managed to establish the institute of *kazy*- judges who judged according to the Muslim norms- *shariat*. Kyrgyz still preferred courts of *biis* who used to make decisions based on traditional and customary laws.

Serious inter tribal disputes and important decisions were made at the conferences of *biis- duvana*. The decisions were always made on public.

Pre-Collectivization Period Summary. The Kyrgyz are historically pastoral people and even the modern Kyrgyz living in cities today hearken to their nomadic past. Right up until the beginning of the 20th century virtually all Kyrgyz lived as pastoral herders of animals, with a lifestyle and vision of the world centered around a unique pattern of herding their animals to various pastures depending on the time of the year. Kyrgyz were organized into large nuclear families which would generally share winter encampments in areas where there was little snow cover (either warmer lower areas or areas where wind kept off snow), which would then split up during the spring, summer, and autumn as each family unit moved its herds to various summer pastures (*jayloo*). The process of movement with herds was generally a slow climb into Kyrgyzstan's mountains up to the *jayloo*, a period of 1 to 1 and ½ months encamped at the *jayloo*, and then a return downwards to the winter encampment. Kyrgyz families were loosely affiliated into tribes which were headed by chiefs who were elected, though often the position became hereditary.

Features of this system of pasture management were:

- **Absence of property rights to land or codified tenure practices.** There was a developed sense of property, but this was counted in terms of numbers of livestock, particularly horses and sheep. The vast majority of Kyrgyz were illiterate prior to the Soviet period; written deeds or contracts had no role. Land was considered as state and used by communities and tribes. Use of pastures was based on traditions and consensus among rural Kyrgyz. Land was under a common use regime. To the extent that there was enforcement, it was through informal familial or extended family mechanisms and respected people of communities, later through respected leaders of tribes or courts in the South. After joining Russian Empire, it was prohibited to rent, to sell, to mortgage pasture land or allocate it for specific tribes. It

was supposed to be in a state ownership and given on a use rights to communities or tribes without inheritance. However, there were many cases, when pasture land was bought from the state, sub leased to other tribes.

- **Highly decentralized decision-making about allocating grazing rights to pastures, especially in spring/autumn and summer pastures.** These rights were provided on the basis of kinship of the groups of families centered around a particular winter encampment in fact by local tribal leaders. The absence of a significant government entities and the independent nature of the pastoral lifestyle meant that decisions were made on an ad hoc basis by the users themselves with little or no oversight or guidance by any kind of authority.
- **Competition for pasture land occurred only in areas which could serve as winter pasture, but even here was not severe.** Mountain pastures were abundant in comparison to winter pasture areas. The relative lack of winter fodder was the major factor which kept levels of livestock and usage of spring/fall and summer pastures fairly low. Moreover, this competition for pasturage at low levels brought Kyrgyz into conflict with settled agricultural settlements at lower levels in Central Asia, particularly the fertile Fergana Valley. This ad hoc system did not have developed mechanisms to deal with competition over pasturage. It appears that Kyrgyz mostly simply avoided challenging settled farmers and were able to handle land pressure and disputes among themselves over winter pastures through informal kinship mechanisms. There were not strong population pressures on pasture land. The total population of Kyrgyzstan in 1913 was 864,000, of which as much as 80% would have been pastoral Kyrgyz. There were an estimated 2.8 million head of sheep in this same census of 1913. The hardships and risks of pastoral life kept human and animal population growth down enough to sustain sufficiently low use of pastures to allow for informal management practices.
- **Traditional transhumant grazing was beneficial for pasture conditions and customary law enforced.....**

Soviet era Intensive Use

In 1918 Soviets started to form first *commune, artels* on the territory of Turkestan and by the end of 1924 there were already 58 of them in various regions. Originally, they were focused on joint cultivation of land, harvesting, and other agricultural activities. Later on with the course of Land and Water Reform which started in 1921, this collectivization has progressed around the country. In 1922-1923 Land Code was adopted together with various land related legislation,

“For Europeans the nomadic lifestyle of Kyrgyz seems like not comprehensive and important. Many look at migrations of Kyrgyz as without purpose, without sense and almost as a vagrancy. According to their opinion, it doesn’t cost anything to prohibit them to move around and attach to land. Then Kyrgyz would get used to settled life, become rich and adaptable to cultural forms. In reality, this is groundless thinking and shows that people who think so don’t know anything about Kyrgyz life. Kyrgyz fully depends on climatic and soil conditions of his land. His nomadic lifestyle is dictated by the fact that too many animals can overgraze his land.” In a letter of Baitursynov, Kirov Military Revolutionary Committee to the Central Executive Committee, 1919.

including Regulation on Land Management in Nomadic and Semi Nomadic raions of Turkestan Autonomous Socialistic Republic. This was an attempt to settle Kyrgyz and destroy traditional tribal – communal livestock breeding and pasture use since the major counter revolutionary forces were concentrated among nomadic tribes and groups and access to their camps in high mountains was difficult.

In 1924 land cadastre activities of pasture started which led to allocation of areas to various groups of livestock breeders. With the slogan that “Jailoo should be Soviet”, authorities started to set up *jailoo councils (soviet)* with a first pilot at Suusamyr in 1927. These were mobile teams of Bolsheviks with militia, veterinary, medical, educational, cultural and other personnel attached (up to 50 people). A prohibition to move from one pasture to another without obtaining a permission from the councils was introduced, pasture land were allocated to groups of livestock owners, these groups later were transformed into collective farms (*kolkhoz*). Land allocation was not allowed to the groups formed on the basis of tribal relations. Big livestock farmers were destroyed and their animals distributed to small farmers.

In 1929 when mass collectivization started, there were already 535 *kolkhozes* formed. In 1931 a Committee on Settlement was formed with branches in localities which started to settle still nomadic population around the country. By the 1937, 89.1% of population was joint into 1900 *kolkhozes* and 37 *sovkhoses*.

Pasture management changed drastically when the Soviet Union undertook to both control and greatly increase livestock production. In parallel with other parts of the USSR, Kyrgyzstan underwent forcible collectivization in the 1930s (the first sheep farm was organized in 1927). The process produced tremendous human suffering as wealthier herders were targeted as ‘rich farmers’ (much as the ‘Harvest of Sorrow’ of collectivization saw the extermination and deportation to Siberia of millions of Ukrainians in the ‘30s, Kyrgyz herders suffered from death by starvation and deportation, including to Ukraine).

The Kyrgyz, like their Kazakh brethren to the north, were forced to part with their decentralized nomadic form of life and join collective production units (*kolkhozes*, or collective farms, or *sovkhoses*, or state farms) controlled by the state/party apparatus. It was considered that nomadic lifestyle is a sign of backwardness and that in order to promote economic development, Kyrgyz have to be settled. These *kolkhozes* and *sovkhoses* were organized based on the existing *aiyls* and they were allocated remote pasture land for long term use for free.

Allocation of pastures to *kolkhozes* and *sovkhoses* and other state enterprises was done by raion and oblast Councils of People’s Deputies. If pastures were located on the territory of more than one oblast and on the territory of raions of state importance, by the Council of Ministers

With Soviets, existing problems such as massive migration of European nations to the Central Asia, re allocation to them land of indigenous people, were not resolved and became even more acute.

The Soviets undertook to promote two types of livestock production. First intensive production for cattle for meat and milk was based on home-grown fodder and grain in the form of lucerne, maize (grain and silage) and barley, supplemented by cheap concentrate feed from elsewhere in the USSR. These were maintained in lowlands and did not represent a major burden to pastures. Second, extensive sheep herding was organized, based on traditional Kyrgyz transhumant grazing practices but with improvements to reduce risks of herd loss associated with this practice. There was a strong emphasis on fine wool production, as the Kyrgyz SSR was charged with being the ‘wool factory’ for the USSR as a whole. In both cases, production was put on a planned basis, and the state provided for substantial increases in inputs that would allow for increasing herd size. Since the primary hurdle to growth in the past had been the difficulty of ensuring fodder for herds in winter and early spring, the Soviets increased in local growth of fodder crops, provided substantial imports of fodder

for winter feeding (1.6 million tons were imported in the late Soviet period), and instituted a system of transport by truck and even train of livestock to more abundant winter pastures in Kazakhstan. In addition, the Soviets provided better infrastructure for wintering of livestock and better transportation, particularly trucks, for persons with herds engaged in transhumant grazing (this led to the elimination of Bactrian camels which had previously been the main bearer of pastoral Kyrgyz's belongings). The Soviet era also saw subsidization of social services to be delivered to herders in more distant spring/autumn and summer pastures in order to encourage people to accompany animals to these remote areas.

Soviet livestock practices quickly led to intensive use of all pasture resources. With better transportation networks, central planning, and incentives to travel with the livestock, persons and herds were moved much greater distances in order to take advantage of relatively abundant summer pastures in mountainous Kyrgyzstan and winter pastures in the steppes of Kazakhstan. Herds from Uzbekistan and Kazakhstan regularly joined Kyrgyz flocks moving up to the summer pastures. By the early 1960s permanent over-stocking had been established as the normal state of affairs at almost all locations in the seasonal grazing cycle, exceeding the natural carrying capacity of the mountains by between two and two and a half times. Although there was substantial effort into integrate data on pasture carrying capacity with other sources of feeding livestock, nonetheless, this intensive use led to degradation. By 1990 about 16 percent of the rangelands were severely degraded, with alpine grazing lands suffering the most.



Yet, despite this centralization, there was a degree of autonomy enjoyed by Kyrgyz herders: they were allowed to own a small number of their own animals (might own up to ten sheep, a cow, a horse and a goat or two) and the transhumant lifestyle was in part retained. These household animals were grazed only on near village pastures.

Features of the pasture land management practices in the Soviet period were:

- **State ownership of pasture lands.** All land was declared owned by the state (even if this was notionally on behalf of the people). While doubtless some patterns of transhumant herding continued from the previous era, effective state control over pastures, including even remote summer pastures, meant that the traditions and ways of communal grazing were destroyed.
- **Allocation of pastures was determined by rural authorities – collective farm management and rural councils – within detailed parameters provided by central state agencies.** Decisions about use rights to different pastures were nominally made by rural councils (*sel'skie sovety*), but since production of livestock was the primary occupation of collective farms de facto decisions were made by collective farm management. These individuals would be provided information about which pastures were to be utilized and on

what terms. Indeed, with the advent of long distance transportation of livestock to different pastures, there was de facto a good deal of central control. For instance, in 1990 some 3 000 km² of summer pasture in Osh oblast alone was leased to herders from Uzbekistan. Large amounts of pasturage in the Susamyry Valley in northern Kyrgyzstan were similarly allocated to herds from collective farms in Uzbekistan. Several observers report that in practice even privately owned livestock would simply be added to the public herd of the collective farm and would be sent along to whatever pasture had been allocated to the latter was allocated pastures for grazing. During the interviews in Talas, farmers noted that they had tension with Kazakhs over pasture area which was allocated to Kazakh during the Soviet time. The river Urmara which is on territory of Kyrgyzstan used to serve hydro electric power needs of Kazakh. After collapse of the Soviet Union, Kyrgyz redistributed its water to irrigate their lands which caused a lot of tension. Other mention that the best lands in Susamyry valley was also allocated to Kazakh herders while Kyrgyz had to take their sheep to drylands of Kazakhstan.

- **A centralized effort to measure pasture lands' carrying capacity through the State Land Management Committee (Giprozem) ensured relatively balanced but extremely intensive use.** Giprozem mapped all of the Kyrgyz SSR's pastures and calculated pasture quality and carrying capacity. This information was then provided to decision-makers in rural areas, primarily the management of collective farms engaged in livestock production. This centralized approach to pasture management ensured intensive use of all available pastures.
- **Pasture management was part of the overall drive to feed large numbers of livestock.** The goals of ever-increasing production drove pasture management, with considerations of soil erosion, overgrazing, and sustainability being of less importance. This aggressive use of pastures led to their deterioration, particularly the summer pastures. However, thanks to the changes in pasture usage over the past 15 years, this particular degradation has been reversed (though other problems emerged, as shall be seen below).

Independence period

The Kyrgyz Republic's agricultural system underwent several major changes after independence was received in 1991. Land reform began with a Presidential Decree and adoption of the Law on Peasant Farms in February 1991 which authorized allocation of land for peasant farms. State and collective farms were required to cede land to those wishing to exit from these state structures. Number of decrees, regulations and government orders were issued in 1991-1994 with attempt to regularize and clarify process of land reform. At the beginning of the 1990s, the Kyrgyz Republic had just about 560 farms (collective and state farms) managing essentially all the arable land, with an average of over 2,500 hectares per farm. By 2001 majority of these farms were re organized and more 85,000 private peasant farms, cooperatives and associations of joint peasant farms have emerged. In 1991 collective farms started to allocate land near villages for grazing of household livestock as well as for growing fodder, and for hayfields.

Presidential Decree in 1995 on Measures for Further Development and State Support to Land and Agrarian reform in the Kyrgyz Republic (#297) authorizes Ministry of Agriculture and Food to manage and rent out in agreement with local state administrations remote pastures; local state

administrations intensive pastures and village committees for land and agrarian reform (prototypes of *aiyl okmotu*) near village pastures.

In early 1999 the new Land Code was adopted which introduced private ownership to agricultural land. Pastures, lands of Forestry and Water Funds, municipal land, and land of protected areas and national parks, as well as contaminated lands remain in state ownership.

Fundamental among the reforms was the *de facto* and *de jure* dismantling of collective farms as the primary agents for economic activity in the countryside. Although the period of transformation has been drawn out and marked by inconsistency in implementation over the 15 years of independence (and in a few places in the Chui valley is yet to be fully effected), the impact of the change in the collective farm structure on pasture management was both rapid and profound.

There were three key aspects of this change. First of all, immediately following independence, collective farms were in duress with the collapse of the USSR-wide system for providing fodder and transporting livestock to remote pastures. Equally problematic was the sharp fall in demand for Kyrgyz wool from the rest of the USSR. Second, the majority of collective farms' assets, including livestock, was divided up among the workers (land notably took much longer to be transferred to individuals). The previous collective farm management boards were with only a few exceptions effectively dissolved, with the chairperson simply going into business as a private, often successful farmer. This yielded a large number of small herders, many of whom quickly became oriented towards subsistence livestock husbandry. In any case, these individuals had no practical experience in organizing themselves to manage pasture use on a group basis. The organized use of pasture lands, particularly transportation to distant summer pastures, that was a relatively positive aspect of prior collective farm management, was scrapped. (In addition, many of the veterinary and other services collectively provided for livestock also disappeared). Finally, an array of different state institutions, and subsequent involvement of rural local self-governments, were charged with implementing pasture allocation on a largely commercial basis through leasing pasture land.

In these circumstances two trends quickly emerged: the enormous reduction of livestock, especially among wool-producing sheep, in the early 1990s; and the decline of structured use of pasture land. The latter trend is characterized by a situation where individual farmers overuse pastures close to their homes in village communal areas and eschew traveling to summer and spring/autumn pastures, where infrastructure and facilities became poor or non-existent.

During Soviet time, near village pastures were in management of village councils (*selsovet*) and were used by household animals. Intensive and remote pastures were in management of *kolkhozes* and *sovhozes*. Those pastures which had "inter *kolkhozes*" importance were in management of raion administrations and those of "inter raion" importance were in management of oblast administrations. In many areas the territory of near village pastures is limited. Head of *Giprozem* explains that at the initial stage of land reform, many *kolkhozes* and *sovkhoses* refused to take into their responsibility pastures and they had to be transferred under raion administrations' management. In his opinion, the major reason for transfer of big areas of near village pastures to raion administration management related to the fact that former *kolkhozes* and *sovkhoses* didn't want to pay rent for these pastures.

The goals in dissolving the collective farms were empowerment of private farmers, particularly in cultivated lands, and facilitation of introducing market economics. Pasture management was not and has not been a driving issue in agricultural policy. The current institutional and policy framework for dealing with pastures described below reflects an incomplete, ad hoc arrangement

dealing with a changing situation, with legal provisions that are impractical under current conditions and de facto diffusion of regulatory authority among various, competing government units. The current method of pasture management is in some ways a return to pre-collectivization era, but without the positive elements of relatively small numbers of livestock and a people conditioned by centuries to undertake transhumant herding on a self-sufficient basis. The breakdown of the support network of collective farms and social services for summer pastures, the lack of trucks to take animals to pastures, the much enfeebled state structures to enforce allocation and usage patterns coupled with the re-emergence of individual herders as economic agents, have contributed to a latent crisis in pasture management. With a recovery in herds following the shock of the first years following independence, pressure on pastures will increase. The current management system requires improvements.

III. The Current Legal Framework for Pasture Land Management and Practice

The 1999 Land Code of the Kyrgyz Republic is the primary normative document regulating land relations. However, it contains few provisions concerning pastures, though it does stipulate that pastures are state property, which provides for additional leverage for government entities to regulate usage. According to the Land Code, pastures located near the state borders (article 30, paragraph 3), and pastures which are part of arable land and lands for perennials (article 30, paragraph 3) can be given into private ownership. Pastures in private ownership make about 2,700 ha around the country as of January 1, 2004¹⁰.

The primary legislation governing the institutional framework and procedures for management of pastures are the 'Regulations on the Procedure for Providing Pastures for Lease and Use' confirmed by Government Resolution No. 360 on 4 June 2002, and subsequently slightly amended on 27 September 2004 (prior to this set of regulations, there was a government resolution with an analogous name and provisions in effect). Elements of pasture management carried out by the State Agency for Registration of Rights to Immovable Property ('Gosregister') are also noted in this entity's list of functional responsibilities, approved by government resolution.

There are other laws such as Forestry Code which regulates use of land located in the State Forestry Fund, Tax Code, Law on Management of Agricultural Land and others. It is evident that there are many discrepancies between all these laws which cause ambiguity, unclarity and misinterpretation of various provisions.

Although nominally a set of regulations on the leasing process, in effect the Regulations confirmed by Government Resolution No. 360 establish basic policy guidelines for the management of pastures, including:

- Definitions of types of pastures. The Regulations, consistent with past practice, established 3 types of pastures based on their 'geographic position and remoteness from a settlement':
 - Pastures used for transhumant livestock breeding -- Distant (*otgonnye*) pastures. These pastures have inter raion and inter oblast importance.
 - Pastures under intensive use – pastures which are between distant pastures and pastures near villages (*intensivnye*)

¹⁰ Land Fund of the Kyrgyz Republic as of January 1, 2004. State Agency for Registration of Rights to Immovable Property, Giprozem.

- Pastures located near villages; these pastures include lands that have been cultivated, hayfields, orchards, and forests (*priselnye*).

The Regulations also note the seasonal subdivisions of pastures into spring-fall, summer, and winter pastures. There is no specific correlation between the categories of pasture defined by their geographical relationship to a settlement and the seasonal usage of the given pasture though it is reasonable to assume that winter pastures are those located near villages and summer pastures are correspondingly the more distant pastures from the villages. It is remarkable that after defining these seasonal categories of pasturelands at the outset, the Regulations make no further reference to the seasonal use patterns reflected in these categories (though there are several other provisions which would regulate rational usage of pasture lands). In terms of pasture management, the categories used are based on the relationship to a settlement. This of course turns on its head the Kyrgyz nomadic tradition. It also reflects the administrative entities charged with regulating different categories of pastures.

- **The roles and requirements placed upon various government entities in relation to different types of pastures.** There are primarily 4 government entities involved with pasture management.

Oblast State Administrations are responsible for:

- Drafting and securing corresponding council approval for comprehensive plans for the redistribution, use, and protection of distant pastures
- Organizing competitions and issuing resolutions on leasing pasture land from distant pastures
- Confirming the overall boundaries of intensive use pastures

Rayon State Administrations are responsible for:

- Drafting and securing corresponding council approval for comprehensive plans for the redistribution, use, and protection of intensive use pastures
- Organizing competitions and issuing resolutions on leasing pasture land from intensive use pastures
- Confirming the overall boundaries of pastures near villages

Ayil Okmotus (rural local self-government executive bodies) are responsible for:

- Drafting and securing corresponding council approval for comprehensive plans for the redistribution, use, and protection of pastures near villages
- Organizing competitions and issuing resolutions on leasing pasture land from pastures near villages
- Regulating the use of pastures near villages which is not competitively leased out

Gosregister is responsible for:

- Registering the overall boundaries of pastures
- Participating in the development of comprehensive plans compiled by oblast state administrations, rayon state administrations, and ayil okmotus (though the latter explicitly must pay Gosregister)
- Surveying and preparation of all individual parcels of pasture land to be leased prior to announcement of competitions to lease
- Registration of leases.

The State Forestry Agency participates in planning and allocation of those pastures which are designated as forest areas (these may have little actual tree cover – the designation is mostly historical). The total amount of such pastures are 3.2 million hectares, and they are split up among the three administrative-territorial types of pastures (near village, intensive, and distant).

(note: the central government confirms the overall boundaries of distant pastures)

There is an exhaustive list in Article 9 of required elements of the comprehensive plans for the three types of pastures, including:

- a justification for each pasture parcels' location;
- livestock movement routes;
- parcels which are to be leased to the highest bidder and those which are to be leased to bidders offering the best investment conditions (with limits on the amount of land to be provided via the latter mechanism);
- a calculation of feeding capacity and productivity, by season of each parcel
- a calculation of carrying capacity broken down by season
- a determination of the number of feeding cycles that each parcel can be used per year
- a list and layout plan of all livestock infrastructure and facilities
- a determination of pasture parcels which cannot be leased
- monitoring plan to preserve pastures
- a description of the dynamic changes in the botanic makeup of grasses due to pasturing by lessees
- maintenance measures
- a list of special use zones (fishing, tourism, herb gathering, bee-keeping)

There is no indication that the plans produced by the three different tiers of administration should be coordinated, nor that encouragement of more rational use of the three different kinds of pastures should be promoted. There would perhaps be some de facto coordination due to fact that only the State Design Institute for Land Management (Giprozem), which is now part of Gosregister, has the professional capacity and background information to fulfill many of the requirements of the comprehensive plans. But Gosregister is to act as a contractor to the corresponding local administrations (if indeed the plans are being developed), making such linkage weak.

- **Principles and restrictions for the usage of pasture, including the obligatory payment by private entities.** The Regulations unequivocally state that users of pastures must make payment, which consists of both the land tax and lease payments. A lease payment cannot be less than the amount of land tax. Lessees can be exempted from rents if they are making infrastructure improvements to their parcel. Further, impoverished persons can petition to receive use rights without payment. 90% of lease payments go to the budgets of corresponding local administrations, and 10% goes to Gosregister to cover surveying costs. This point appears to conflict with the provisions that envision a situation where not all land in pastures near villages is competitively leased out. There is a different sharing rate for pastures overseen by the State Forestry Agency: 25% to the corresponding local

administration; 70% to Forestry Agency entities; and 5% to Gosregister to cover their costs for surveying.

Leases are to be provided for a period of 5 to 10 years for grazing, and less than 5 years if the use regime is different.

Users are obliged to use pasture land for grazing only (unless special provisions are made), observe rotation of pastures, conduct measures to combat wind, water, and other forms of erosion, work on improving the surface and root structure of pasture grasses, and maintain proper distance of human and animal dwellings from bodies of water. In certain cases, pastures may be provided for the purposes of fishing, tourism, or bee-keeping. The Regulations also expressly prohibit sub-leasing (Article 6)

- **Detailed process for awarding a lease of pasture land.** Much of the Regulations are devoted to the competitive leasing process, which is mandatory. The process is started by an application from a physical person or legal entity to the corresponding administrative entity which oversees the category of pasture in which the desired parcel is located (distant, intensive, or near village). This entity forwards the application to Gosregister, which in turn surveys and prepares the parcel for the competition. This preparation includes:
 - checking boundaries and producing a cadastral plan;
 - availability of pasture fodder stock on the plot for normal fodder security of the available livestock, prospectively adjusted;
 - optimal, ecologically justified pasture stocking norms, promoting preservation of natural capacity of pastures and their regenerative capacity;
 - available stock routes, roads, watering places, dipping points, etc;
 - determines the size of rent payments based on a normative value of the parcel multiplied by .005.

A competition for each parcel is to be announced publicly 30 days in advance. A competition commission is to be formed with representatives of Gosregister, Ministry of Agriculture, Water Resources, and Processing Industry, Ministry of Finance, Ministry of Ecology and Emergency Situations, the Veterinary Department, as well as representatives from the corresponding councils and executive bodies of the given tier of government (representatives of the State Forestry Agency are also supposed to be present for lease of pastures that fall under its purview. The competitive leasing may be organized as either a 'commercial competition', i.e. where parcels are simply provided to the highest bidder, or as an 'investment competition' where selection is made according to proposed investments of the various bidders for the land. Following the declaration of the winner, a lease agreement is to be concluded within 10 days. After this Gosregister drafts a transfer act for the pasture parcel. The lessor (the corresponding tier of administration), the lessee, and Gosregister each retain an original copy of both the lease agreement and the transfer act. Subsequently, the lessee is given a further permit (confirmation certificate) for the temporary use of pasture land. This certificate must be registered with Gosregister. An additional permit from the Forestry Agency is required for pastures which fall under their purview.

Despite well-intentioned provisions with regard to surveying pastures and ensuring rational use, these Regulations are *prima facie* impractical to implement. It is difficult to imagine getting all of the representatives of the competition commission together to decide on every parcel to be leased. The degree of detail for each pasture parcel required in the comprehensive plan also appears onerous. It is implausible that it would be done without substantial involvement from Giprozem;

however resources to pay Gosregister are generally lacking in local budgets. There are no provisions about what to do when there is no competitive demand for pasture land, which is clearly true of the current situation, especially in distant pastures. At the same time, the Regulations call on Gosregister to establish through norms a lease rate for pastures according to an annex on 'Determining the Size of Lease Payments'. This annex calls for lease rate based on a normative value of land determined by Gosregister. There is no need for this annex and norms if all leases are to be competed out, and the amount cannot be less than what the land tax would be. One surmises that the authors understand that the requirement of competitive leasing frequently cannot be applied and hence a nominal rate is established. This is also backed up by the provision regarding *ayil okmotus* regulating non-competitively-leased pasture land near villages.

The process for documentation of the right of the private herder to a parcel is confusing and onerous. It is not clear why three separate documents are required to confirm the transfer of pasturage to use (the lease agreement, the transfer act, and then the confirming certificate). Moreover all of these documents are generated by the same agency – Gosregister. Furthermore, the Regulations explicitly state that unless the final stage of the leasing process is observed – the registration of the confirmation certificate) – use of the pastures is illegal.

The Regulations leave unclear who will pay Gosregister for the surveying and preparation of individual parcels (the requirements for preparation are also quite detailed), and all of the costs. This suggests that the original applicant might bear the costs. However, this person or entity may lose the subsequent competition (if, indeed, the competition is actually held), which is not fair.

Perhaps the biggest problem is that the Regulations place substantial responsibility on tiers of local administration, but mandate that they pay a completely separate government agency (Gosregister) to perform much of the necessary work. This diffuses accountability and undermines coordination.

As can be seen from this simple listing of problems with the Regulations, they posit a system of numerous steps for which the active involvement of Gosregister, explicitly or implicitly for payment, is required. High frequency of interface with government agencies for any act, including the leasing of state property, is something to be avoided, because these always create opportunities for abuse and corruption.

This system, updated as recently as September 2004, sparked interest and concern from the previous convocation of Parliament. The latter passed a resolution in November 2004 that the Ministry of Agriculture, Water Resources and Processing Industry should review and take upon itself responsibility for the Agricultural Land Redistribution Fund and pastures. Part of this function was to review the issue of transfer of functions of allocation of pastures to the *ayil okmotus* and rural councils. However, this resolution has not been acted upon.

III. Practice

Pasture management in practice in Kyrgyzstan differs greatly from the Regulations confirmed by Resolution No. 360. The actual practice of pasture use depends on many factors, such as geographic, climatic features of location, availability and quality of pasture land, individual management of aiyl okmotus, raion and oblast administration, capacity of their staff, local traditions and social norms and somewhat on awareness of farmers on established procedures. At the same time, the major issues, problems farmers face and their opinion on their resolution are the same all around the country.

In general, all farmers around the country interviewed during the research have a strong sense that issue of pastures was neglected and need urgent attention. Many noticed that this is a first time someone asks them about pastures. In opinion of many interviewed, when number of animals was low, and pastures under utilized, issue of their allocation and use was not acute. However, with the number of animals growing, with restoring somewhat of transhumant grazing traditions, there are high chances of conflicts over pastures. In one village near capital city Bishkek interviewed informed that if their demands on pasture re allocation will not be met by aiyl okmotu and raion administration, they would go and grab the pasture areas allocated unjustly in their sense to the bureaucrats working and living in Bishkek. Many interviewed around the country noted that if legislation doesn't reflect reality there is a need to change it but taking into account major stakeholders' voices and opinions.

Despite 70 years of Soviet regime and legislation undermining social norms and customary law, to change their application, they still govern pasture relations in planning, allocation, use, payments and conflicts resolution. Pastures are still considered to be of a communal or tribal property and anything else raises strong sentiments like "This is our land, a land of our ancestors". Even now when we talk to villagers they always refer to pre Soviet time status of pasture use, which they remember or were told by their parents. Many remember where exactly their parents and great parents grazed their animals, why and how. Unfortunately, Soviet allocation of pastures undermined these traditions and its rather difficult to trace the land to its pre Soviet users.

Majority of pastures are in communal use and at the same time there is no clear recognition of this fact in legislation. There are clear cut state and private ownership issues and very vague understanding and concept of communal ownership. In fact, many discrepancies in law and real life can be referred to as contradiction of legislation to accepted local norms.

We review these practices based on extended interviews with farmers, villagers, livestock shepherds, aiyl okmotu, raion and oblast officials, employees of Gosregistr, Giprozem, State Forestry Service, and many others. Focus groups and survey were conducted in 5 regions of the country (Talas oblast, Chui oblast, Issyk-Kul oblast, Osh and Jalal-Abad oblasts) and in the capital city Bishkek. We want to express our gratitude to all interviewed, to leadership and staff of the Gosregistr, ARIS, PIU of Biodiversity Project who helped us to make this research based truly on people's minds.

I. Planning.

According to the Resolution number 360, total areas and borders of pastures are determined in the course of the land and forest management activities and plans of allocation, use and protection should be prepared by the Giprozem.

In the course of a survey it was evident that many *aiyl okmotus*, raions and oblast administrations do not have comprehensive management plans for pasture resources. Planning in many localities is minimized to projections of the income from the pasture rent fees to the relevant agency. This is the only criteria according to which local authorities are judged on use of pasture resources. For meaningful management plans, local authorities lack basic information about pastures they manage, such as borders, geo botanical composition, location of infrastructure, carrying capacity and etc.

One of the critical problems they face concerns borders of pasture area with neighboring *aiyl okmotus*, with pastures of State Forestry Funds, with pastures of raion and oblast subordination. In Kyzyl Tuu *aiyl okmotu* of Osh oblast, farmers complained that they live in this *aiyl okmotu* but use pastures of neighboring *aiyl okmotu* and two authorities are not sure where is exactly the border between them and who should pay to which constituency. Many don't know even borders between pasture land and municipal lands. One head of *aiyl okmotu* told us that in his opinion, any area even inside of the village where animals can graze can be considered as a pasture.

When interviewed almost all farmers don't know difference between three categories of pastures specified in Regulation 360 (*priselnye, intensivnye, otgonnye*). Even some *aiyl okmotu* land management specialists had difficulties to tell where they have *priselnye* and where *intensivnye* start. Another problem relate to the unclear boundaries. Many *aiyl okmotus* have no maps of the pastures. Many farmers, especially in the South and remote areas don't even know that there are three categories with different management schemes for each.

There is no geographical, geo botanical information on pastures, and no meaningful prescriptions on carrying capacity of pasture area, and on infrastructure locations such as small roads, bridges, water points and paths. Maps used if they are available at all in local self government and state administrations in raions and oblasts are often too old and sometimes irrelevant. In many *aiyl okmotus* interviewed the heads and land management specialists noted that either they don't have maps at all, or they make own sketches mainly to identify borders and infrastructure. In one *aiyl okmotu* in the South management uses old Soviet time prescription on carrying capacity of some pasture plots for allocation and charging pasture use payment. In another *aiyl okmotu*, it's head complained that they didn't have any map and made one themselves only when a serious conflict between villagers and authorities occurred on access to animal routes and water points which were allocated to one farmer with the plot. After that they made a sketch with all the infrastructure and easements to avoid in future access problems. There is more information on forestry land where forestry enterprises (*leskhozses*) have done forest inventory within last 10 years. In this case they use these maps for allocation of forest plots.

In Bakai Ata raion, even State Registration Zonal Center has no such maps and information which they need to allocate resources and provide some monitoring activities.

Lack of this crucial information leads to sort of a "blind" pasture allocation and can't provide basis for monitoring of pasture use. Also, it causes many uncertainties and disputes between individuals and various management bodies.

State Land Management and Design Institute (*Giprozem*) can't conduct such inventory activities around the country because of lack of budget and local funding. Head of *Giprozem* in the interview noted that some works on pasture surveys and borders delineation were done under the framework of the WB funded Sheep Development Project in 1999-2001, some were funded by local administrations, and the state budget is mainly used for inventory of areas near the state borders. He remarked that comprehensive inventories were done only for arable land for their allocation in the course of land privatization in mid 90s. He informed that the *Giprozem* surveyed and mapped all remote pastures, and near village pastures of 15 raions. *Giprozem* has institutional capacity for such works but needs funding. It works on preparation of such surveys and analysis of pasture plots based on ad hoc requests either from private farmers or local authorities who can afford to pay for such services. Often such requests come from big farmers who want to have comprehensive maps to protect their territory from other users and/or farmers and authorities in cases of serious disputes. One employee of *Giprozem* told that she went recently to one remote raion of Talas oblast to make an inventory of a pasture area where there was a conflict with a person not even living there and having any livestock grabbing 200 hectares of pastures and prohibiting access to it and through it to local population. Inventory and mapping helped everybody in this situation to clarify borders, to provide an open access to animal paths and water points. But this type of work although very important and needed is of a very small scale and conducted on a request basis when payment is provided by those who order such inventory and maps.

Head of the State Forestry Agency, as well as his staff also mentioned that there is no clear understanding and knowledge of what pasture areas and in what conditions there are in the State Forestry Fund and urged to conduct overall pasture inventory around the country, including on the lands of the State Forestry Fund.

Efforts to conduct comprehensive planning were noted only in donor funded pilots. One methodology was tested in pilots conducted by the Pasture Monitoring Department of *Giprozem* and funded by the World Bank, and another conducted by the Central Asia Transboundary Biodiversity Project funded by GEF and administered by the World Bank. Both methods although different in implementation were aimed at better management and use of pasture resources for their protection from further degradation. If the latter has just started, the first one was implemented in 2000-2001. Unfortunately, this methodology was not replicated widely because it demands funding for that (mainly to cover cost of the *Giprozem* work on land survey and mapping) and information on this experience was not widely disseminated and no efforts on its replication by government were made.

It is evident, that coordination of all agencies involved in pasture management, use and monitoring is extremely weak. If to address pasture problems, Government needs to make a serious effort to put in place solid mechanisms for better coordination and information sharing between different agencies managing pastures. This is linked to another problem related to planning of pasture use is a diffusion of management responsibility along the three vertical lines of state and local self government as well as another existing parallel of the State Forestry Fund. Farmers or shepherds grazing animals in some areas use pastures in a full traditional chain starting from near village, going to intensive and then to remote pastures, and coming back to their settlements in fall. The timing, duration and ways are different in each locality depending on climate, geo botanical and geographical features and availability of infrastructure. They don't differ these categories and treat pasture as a whole. Others graze either only on near village or intensive pastures, or with some mix of two. However, its clear that pasture management should be conducted for all categories as for a

single complex serving herders, and short term and long term plans need to be drawn based on the whole cycle of annual grazing. This is a basis for sustainable use and preservation of pastures. Thus, in order to have comprehensive plans for management and use of pastures, there is a need to conduct inventory and provide local authorities with the information on soil and vegetation, infrastructure available, maps with borders and easements, as well as recommendations on carrying capacity of each plots. This would help to make planning socially just and environmentally sustainable. Made once, such maps then could be updated by local specialists on land management depending on demand and carrying capacity.

II. Practices of Allocation

Practices of pasture allocation although have different patterns but they are common for all regions surveyed. Its evident that provisions of Regulations # 360 are not followed because they are too restrictive, too costly and not efficient. Some provision such as allocation of 30 percent of intensive and remote pasture for rent to socially vulnerable layers of population without competition and on soft conditions is not used properly because there is no information on it among farmers, and its application is fully on discretion of local authorities.

The duration of leases varies from one season to 50 years in some places (Forestry Code allows rent of forest plots for community based forest management for a period of up to 50 years). All interviewed note that pasture are and should stay in a state ownership, but at the same time many say that all best plots of near village and intensive pastures, and sometimes of attractive remote ones have been already informally ‘privatized’ by rich and influential people from these places but also from other localities. Informants say that in cases when pasture areas were in use of one family for a long period of time, they treat them as a heritage from their parents even without any lease agreement and so far these informal rights have not been questioned in practice. People note that when leases are given for along period of time they encourage better use of these lands and investments into improvements. However, many object to providing long term leases to near village pastures thinking that in this case, only rich and influential would get such leases and all others will have to graze their animals sub leasing land from them.

In general, competitions do not take place, because of many reasons mentioned earlier. In general allocation of near village pastures is done based on requests (first come, first serve principle), to reflect common practice of “open access” use, to satisfy demands of communities in preserving some communal lands for household animals.

In some areas where near village pastures are scarce, people use their private land shares for grazing animals, either after harvest is taken and till sowing starts or when land is too far and of too bad quality to cultivate ion it any crops. In such places, people often rent out land from the Land Redistribution Fund and use it for pastures. Many people in such areas complained that land of the LRF should be reviewed and maybe allocated for rent under pastures.

There is an opposite practice, especially in the South, where there is a lack of cropland and local authorities allocated near village pasture land either into private ownership or rent out for crop production. In a latter case, this land is accounted as a pasture land and therefore formal taxes and rent payments from it are much lower then it would be as from crop land.

Everywhere interviewed, people complain that the process of allocation at all levels is not fair, clear and transparent. It's often manipulated by *aiyl okmotu*'s officials and almost always by *raion* and *oblast* administration. However, it was noted that *aiyl okmotu*s are the most accountable to local population and their decisions more often based on knowledge of local practices, with elements of fairness and just. There are also mechanisms of local population to raise questions about their practice. In one village, people raised a question of allocation of 80 ha of pastures to person from another *aiyl okmotu* and this agreement was cancelled.

At the same time, almost all interviewed noted that *raion* and even more *oblast* administrations allocate land without taking into consideration opinions of local population and have no accountability to local population at all. "It often happens that *raion* and *oblast* give land to someone who lives in Bishkek, and then his relatives rent it out to us but for higher price" (interviewed in *Kyzyl Tuu* village). "All best lands were given by *raion* administration and Gosregister officials to big bureaucrats from Bishkek, we have to graze our animals either along the ditches in our village or go and agree with their shepherds on access to their land. We raise this issue with *aiyl okmotu* but nothing they can do against these two organizations" (interview in *Baitik aiyl okmotu*).

Near Village Pastures. When interviewed on pasture allocation, *aiyl okmotu* officials often referred to differences between allocation of pastures for "public" (*obshestvennyi*) and "private" (*chastnyi*) animals.

The most common practice of land allocation is an informal allocation to shepherds who graze village household animals on near village pastures. Many people want to keep at least one dairy cow near houses all year round. Some don't want to send out sheep and other cattle. One farmer told that he has merino fine wool sheep he doesn't want to mix with other breeds and that's why he doesn't want to give it to a communal herd. Others say that it's too expensive to give animals to shepherds and they can't afford it. The number of herds per village depends on number of animals in the village.

Each year, in many localities, in the beginning of a year, *aiyl okmotu* counts animals in the area, and then at the village meeting (*aiylnyi skhod*) proposes a communal shepherd for this year and how much he can charge for shepherding village animals. In some areas we were told that it's difficult to find a good shepherd and usually these are the same people every year unless they move somewhere or decide not to do that. There are special shepherds for dairy cows (*badaichi*), for sheep (*koichu*) and for horses (*jylkychi*).

Villagers pay to these shepherds for a season agreed amount and this amount varies in various locations. Payments are almost always done in cash and paid usually in two installments: some amount as an advance payment and final payment when animals are brought to the villages in the fall. *Badaichi*, who grazes dairy cows, takes them every morning to the near village pastures and brings them back at dawn are paid monthly. Sometimes fee includes price of salt for animals, dipping chemical and vaccination. Sometimes people vaccinate animals before they go the pastures themselves and give shepherd salt and chemicals for dipping. In most places surveyed it's a responsibility of shepherd to pay a land tax and pasture rent fee to *aiyl okmotu*, *raion* and *oblast* administration. In fact, in one *aiyl okmotu* we were told, that *aiyl okmotu* management even enters into agreement with the shepherd every year though no payment is provided by the *aiyl okmotu* to shepherd, but shepherd confirms that he will be responsible for payment of land tax and pasture rent fees to *aiyl okmotu*. In return, *aiyl okmotu* promises him support in case of losses.

There were no cases in a course of survey when shepherds rented formally a land plot for communal herds. Aiyl okmotu notes them where they can graze their animals and usually they go to the same locations every year. Some told us that people are afraid that shepherd can rent a plot for 5 years and then refuse to graze communal animals or will raise fees without agreement with villagers and aiyl okmotu. In one village we were told, that shepherds charge one fee to local people but they secretly add animals of farmers from neighboring villages where they don't have near village pastures and charge them amount significantly higher. In all villages interviewed people don't want to rent out land to any individuals but to use it by community as a whole. According to their opinion, this way reflects local traditions of communal grazing and secure peace within communities.

However, there are cases when near village pastures are used by individual people or hired by them shepherds who graze animals on a rented a pasture plot for that from aiyl okmotu. According to survey, these are usually farmers who have more than 10 cows, and/or more than 100 sheep. Also, there are cases when people privatized old livestock constructions and then rented out land plots around them. These animals are called informally "private" and the procedure of allocation of pasture to them is usually somewhat follows legislation with land plot allocated, some map or sketch drawn and a formal agreement signed. In such cases of individual farmers they tend to formalize agreement with aiyl okmotu and even register their agreements in Gosregister. But there were many cases reported that they rent out a small plot but in reality use area much bigger. In general, such allocations are made without any open competition held and announcements made. In many villages with shortage of pasture land such arrangements raise a lot of questions and disputes. At the same time, interviewed farmers with a significant number of livestock told that they would invest into pasture area if rented for a long period of time and rent is secured.

However, this second way of pasture allocation, which is legally sound, is not acceptable to communities and raises many disputes and conflicts in villages, especially where area of near village pastures is limited. First, because it happens that pastures are allocated to people who do not reside in this aiyl okmotu, second, that often this land is of best quality, has infrastructure on it, such as water points and third, that sometimes its rented by people who have no animals and then they sub lease it to the villagers.

For example, in Kyzyl Oktyabr aiyl okmotu there are 3,300 ha of near village pastures. This year aiyl okmotu allocated 1,800 ha to individual farmers for rent. These people started to graze their animals on their rented plots not allowing communal herds on their territories. Since these lands were of best quality, villagers objected to these agreements and raised this issue at the *aiyl kenesh* (village council). Aiyl kenesh under the pressure from villagers cancelled all these agreements. Some farmers who registered their lease agreements in Gosregister (for about 300 ha out of 1,800) took their cases to the court. According to aiyl okmotu head he was very unhappy on this decision of aiyl kenesh but had to accept it. He even involved legal advisors from Demilgichy Project (funded by USAID) to explain villagers the legislation but it didn't help either. As a result, all agreements were cancelled and near village pasture allocation and use went as before on communal basis.

Similar problem was noted in other aiyl okmotus. In Baitik aiyl okmotu villagers very unhappy with pasture allocation to some people who don't live in this aiyl okmotu but hire shepherd to graze their sheep there. They had water points on their plots and didn't allow communal herds to be grazed there. Aiyl okmotu head told us in interview, that the rent fee received was so low but there was such a headache with this problem that she also decided not to lease pastures to individuals any more.

There is a problem of rent of land around privatized infrastructure. In many localities, animal sheds which were in good shape at the near village and intensive pastures were privatized. And because the legislation on this privatization was vague, it was said during the interviews that according to it owners of these infrastructure have a first right to rent a land around it. In Baitik aiyl okmotu which is about 20 minutes drive from Bishkek, we were told, that all animal sheds are privatized by big bureaucrats from Bishkek, they rent a huge mass of good land around it not allowing villagers to take there their herds. Villagers are very unhappy with this situation because they don't have enough of near village pastures and told us that raion administration and Gosregister have pressed aiyl okmotu to make such decision. Such problem was mentioned in many localities.

Another big problem concerns animal paths. When arable land was distributed to farmers, often there was no land left for animal paths between private land shares and often animals have to go very long ways to avoid the crop fields. But it happens that cattle get on the fields and destroy crops which lead to serious conflicts between owner of the animals and owner of the fields. Especially it often happens in poor families, where small children look after animals. In this case owner of animal pays penalty to the owner of the field determined by him and we were told in one village that in similar case, he locked a cow until the penalty was fully paid. Baitik aiyl okmotu head said that she locked few cows which were on the field of the LRF but had to give them back because had no feed for them and nobody to care.

Often in villages which are located close to towns near village pasture land is taken for increase of settlement area. It was said by akim of Ak Suu raion, that that one village – Janyryk- has only 50-60 hectares of pastures for 3,000 people. This village is located near Karakol town and lack of pasturage adds to the poverty because villagers can't have cows without pastures although there is a demand for milk in a town. Also, in some villages in the South we were told that they had to decrease number of animals because of lack of near village pastures.

The third category of allocation is basically allowing an “open access”, when people take their animals to the near village pastures without any agreements with aiyl okmotu. They say that “this is our common land, we don't need any permission to graze our animals on it and we should not pay for it”. This is a very wide practice for near village pastures but with growing number of formalized leases, it should be replaced with some sort of exclusive use rights system to promote sustainable use and prevent conflicts.

Intensive and remote pastures. The situation with allocation of pastures at the raion and oblast levels is even less transparent. There are some land committees established which have to review applications regularly (in one raion every 10 days if they are filed). The similar committee is formed at the oblast level.

At the same time, according to the interviews it appears that there is no really competition for pasture land because of many reasons: i) there is a lack of understanding which pastures are of what category and who should allocate them among people; ii) lack of information on procedures of renting intensive and remote pastures; iii) long distances from villages to raion and oblast administrations, sometimes slow processing of applications, fear of bureaucracy; iv) unwillingness of farmers to pay fees for allocation and registration fee which is somewhat high for many; v) thinking that pastures should be provided to farmers for free; vi) lack of trust among villagers on fair allocation by raion and oblast administration.

As a result, intensive and remote pastures often used without any agreements though payments often made at the spots.

In some areas raion and oblast administrations charges aiyl okmotu with responsibility to allocate intensive pastures to farmers in their constituency and collect fees to be transferred later to the raion and oblast administrations. In fact, some raion administration officials told that raion administrations don't have adequate resources and staff to do these works and prefer to transfer responsibility over pastures to aiyl okmotus. For example, Barpy aiyl kenesh (Suzak raion, Jalal-Abad oboast) on its meeting has approved rates for a hectare of near village pastures (50 soms for rent, plus 15.40 soms as Social Fund charges and 15.40 soms as land tax), for intensive (the same) and for remote (30 soms for rent, plus Social Fund charges and land tax) meaning that they establish and collect pasture use payment for all three categories.

Many farmers complain that when raion and oblast administrations allocate pastures, they do it without taking into account opinions of local people. Often the best pasture land is allocated to people coming from other raions and even oblasts without considering demand in localities and without informing of local people. Raion administration is far and often has no kin or social connections to many aiyl okmotus in area and often doesn't listen to villagers' concerns. In Bakai Ata raion, villagers told that the whole gorge was rented out to one person, who put his camp at the water sources and didn't allow any animals to come there. He had a map and agreement with raion administration registered in Gosregister and villagers couldn't argue against these documents.

Raion and oblast offices are too far and intimidating to raise with them issue of unfair pasture allocation.

The cost of taking pasture land in rent and registering an agreement in Gosregister is high. It was said in Gosregister that this cost comes up to 1,200 soms including survey and mapping plus travel expenses, and many people can't afford it. On the other hand, many complain that they come to raion or oblast center, which is often very far and difficult to get to and the persons who are in charge either are not there, or they send farmers from one room to another and it can take few days to formalize rent so they give up and go to pastures without any documents.

There are cases when pasture land is given for rent for 49 years and not for agricultural purposes. It's popular at the shores of Issyk-Kul lake, when private companies were allocated pasture land for 49 years for construction of resorts and hotels. Local population appreciate that their major source of income is tourism and thus don't raise much noise about that but they complain that in such cases they are not given any alternative land for the grazing of animals. For example, in 2004 Government (Prime Minister's Office) signed a Resolution proposed by the Issyk-Kul oblast administration on transfer of 63,450 hectares of pastures into municipal land and 125,600 ha of the State Forestry Fund land into category of Specially Protected Areas. This decision has caused a tremendous unhappiness among local population who used these lands for grazing their animals. State Forestry Service officials informed that this decision is being cancelled because of its controversial nature (it was noted in the interviewed area that oblast administration wanted to have specially protected area status only for using it as a recreational zone for its officials and their guests).

State Forestry Fund rangelands. Allocation of land on the territory of the State Forestry Fund is being done according to the Forestry Code and Regulation # 360. Before 1996, forests were in use and management of kolkhozes and sovkhoses and only in 1996 were transferred to the State Forestry Agency.

Forests in the Kyrgyz Republic make three categories: forests under the State Forestry Service (3,275,700 ha), including forests in management of the leskhoz (2,753,900 ha), forests in the State Protected Areas (521,800 ha). There are separate forests of the Management Department of the President's Administration (1,300 ha), forests in state ownership on the agricultural lands and municipal forests (42,200 ha). Pastures in the State Forestry Fund account for 1,130,500 ha.

According to the Forestry Code, farmers can rent a rangeland for grazing animals from forestry enterprises (*leskhoz*). In this case they are supposed to apply for a land area and receive a "forestry ticket". In leskhoz we were told that they count number of animals farmer wants to graze and based on that number they allocate land area and calculate payment amount. Usually farmers don't get a map or sign any agreement, they just agree with leskhoz management and pay said amount. Sometimes they receive an invoice. These agreements rarely get registered in Gosregister.

Some farmers take a land from leskhoz on the principles of community based forest management. In that case they receive some land plot, can even grow some crops there, collect dry tree branches for heating and cooking, graze there animals but in return they plant some trees and do sanitary forest cleanings. In this case they don't pay any fees for use of land. Rent of this land can be taken for 5 years and then if all parties are satisfied, for 50 years and longer.

According to the Resolution #360, 25 percent of the pasture payment should go from the leskhoz to relevant local administrations. However, aiyl okmotu heads complain that they never get any payments from the State Forestry Fund when land of this fund is territorially belongs to their area. Some farmers said that its convenient to rent a land from leskhoz, although pasture payment is usually higher there. "You go to one place, they allocate you land, give a "forest ticket" and you pay them right there. And usually the arrangement with leskhoz is more secure. Aiyl okmotu can give you land and then change his mind and take it back. Raion or oblast can give you land, but give the same land to someone else. So you come to allocated plot and there is another farmer seating there with his animals and with the same document". Other farmers, when leskhoz management is located far from their villages complain that its more convenient to rent from aiyl okmotu, you know them better, you have mechanisms to influence their decisions because they are elected people and money you pay to aiyl okmotu at least stay with own village.

Pasture Rent

Every year Parliament adopts a Law on Base Tax Rates of Land Tax for Use of Agricultural Land, Near House Land, Dachas, Land of Settlements and of Non Agricultural Land.

Table 4. Average Base Rates of Land Tax for Use of Pasture (in soms per hectar)

Oblast	1999	2001	2002	2003	2004	2005
Batken oblast	(was part of Osh oblast)	9.2	9.2	9.2	9.2	9.2
Jalal-Abad oblast	9.1	9.1	9.1	9.1	9.1	9.1
Issyk-Kul oblast	8.1	8.1	8.1	8.1	8.1	8.1
Talas oblast	5.2	5.2	5.2	5.2	5.2	5.2
Osh oblast	8.2	8.2	8.2	8.2	8.0	8.0
Naryn oblast	4.8	4.8	4.8	4.8	4.8	4.8

Chui oblast	9.3	9.3	9.3	9.3	9.3	9.3
Chui zone	10.8	10.8	10.8	10.8	10.8	10.8
Average in country	6.6	6.6	6.6	6.6	6.6	6.6

Source: Law on Base Tax Rates of Land Tax for Use of Agricultural Land, Near House land, Dachas, Land of Settlements and of Non Agricultural Land for 1999-2005

It's a remarkably low tax and its rates were completely the same during last 6 years. According to this legislation local councils (*keneshes* at raion level) can establish their own rates but within 30% of variation from the base rate established for the specific raion. There are also discounts for land tax for high mountainous areas.

Aiyl kenesh every year establishes pasture rent payment based on the earlier mentioned law.

Pasture rent fees vary from aiyl okmotu to aiyl okmotu even within one raion. As it can be seen from Table 5, pasture payment fee in this raion for near village pastures varies from 20 soms per hectare to 74 soms per hectare.

Table 5. Data on Concluded Pasture Rent Agreements for Bakai Ata raion, Talas oblast as of July 1, 2005.

Aiyl Okmotu	Pasture area (ha)	Pasture area in rent (ha)	Pasture Rent Fee (soms)						Expected payment
			Near village pastures area of 13,226 ha			Intensive pastures area of 94,759 ha			
			Rented area (ha)	Average amount per 1 ha	Total amount	Rented area (ha)	Average amount per 1 ha	Total amount	
Bakai Ata	22,895	1,320	120	60.00	7,200	1,200	26.08	31,296	38,496
Shadykan	21,042	2,054	330	20.00	6,600	1,724	26.08	44,961	51,561
Kyzyloktyabr	11,909	1,850	450	26.40	11,880	1,400	26.08	36,512	48,392
Ak Dobo	5,846	1,543	93	20.00	1,860	1,450	26.08	37,816	39,676
Ozqurush	7,509	418	93	20.00	1,860	325	26.08	8,476	10,336
Kenaral	11,361	280	130	30.00	3,900	150	26.08	3,912	7,812
Booterek	7,522	2,375	235	74.00	17,390	2,149	26.08	55,811	73,201
Oro	17,154	2,289	684	26.06	17,825	1,605	26.08	41,858	59,683
Minbulak	17,085	345	5	26.08	130	340	26.08	8,902	9,032
Total for raion	122,323	12,474	2,140	33.6	68,645	10,334	26.08	269,544	338,189

Source: Bakai Ata raion Gosregister

The whole process of calculation, collection, and distribution of pasture rent fees is very confusing and not transparent.

Thus, according to the Resolution 360, all pasture primary (livestock farmers) and secondary users (tourism and hunting providers, fishing individual and legal entities, honey producers, collectors of herbs and etc) are supposed to pay a pasture rent fee. In practice it happened that rent was paid twice or theoretically even more times for the same land plot from primary and all secondary users. Recently, in revised Regulation 360 (September 2004) hunting companies were taken out as a rent payers. But in the course of interviewed it was noted that many local authorities are not aware of this change. Another ambiguity concerns recent changes that the size of rent payment from secondary users is established by the relevant state bodies.

The structure of this payment is also confusing and not well understood even by high officials in charge. For example, according to the Resolution # 360, the pasture rent fee is comprised from land

tax and rent fee itself. In reality, starting from recently aiyl okmotu, raion and oblast administrations add to it Social Fund charges. One high official in raion told us that he has no clue where this requirement comes from but it is now demanded by oblast and raion administrations. Farmers in their turn raise questions why they should pay Social Fund charges so many times. And it often happens that pensioners are charged Social Fund payment within the pasture payment fee.

Another questions raised by farmers during focus groups concerned the terms of rent payment, which is specified in a Regulation 360 as a season.

In their opinion the calculation of payment should be made on a monthly basis. If farmers graze animals during the whole year or a season of 6 months on the near village pastures, he should pay for all 6 months based on monthly fee. But if he takes animals to intensive pastures and then to remote pastures, where he also pays pasture fee, he should pay for months on each pasture. Otherwise, farmers say that if you take animals to intensive and remote pastures you pay rent three times, while

“Social Fund fee payment is taken from my salary of a school teacher, I pay it from my arable land share tax, I pay it from the land parcel I rent from the Land Redistribution Fund and I pay it three times when I pay rent for use of three categories of pasture. Does it mean that I will get so many pensions or its size will depend on these amounts paid?” farmer in Barpy aiyl okmotu, Suzak raion, Jalal-Abad oblast

those who graze animals only on near village pastures pay only once. “I pay rent fee for near village pasture, then I take animals up to the mountains and other people bring their animals on my rented plot in the valley. When I come down in winter, there is no grass left on my plot and nothing I can do. It means that if I take my animals to the mountains, I will not have any winter fodder left on my plot and plus I pay so many times to the Social Fund”. These factors undermine initiative for taking animals from near village pastures to intensive and remote and leads to further degradation of near village land.

According to interviewed, the payment process is simple at the aiyl okmotu level, when shepherds and farmers pay pasture payment (land tax, as well as rent fee and now Social Fund charges) to the aiyl okmotu. When they rent out intensive and/or remote pastures, they have to take rent fee to state administration and to pay separately land tax to tax inspectorate through banks. This adds to overall confusion.

However, in some raions they have started to use an entrepreneurial approach to collection of pasture revenue and hire additional people to work on pastures which is mainly to collect rent fees from pasture users. Number of these people vary depending on the area of pastures and their actual use. These people are employed not as regular staff but on a contract basis and paid from the budget of Special Means Account, i.e. they are paid from income they collect. It was reported that one person employed in Bakai Ata raion is getting 5 percent of collected funds from raion administration and 5 percent from raion Gosregister office. Their work is seasonal, and they drive around on horses or cars around the pastures during summer and collect fees from farmers grazing their animals right there. In such cases, they don't make any formal agreements with pasture users but collect fees and bring them to raion administration. The fee collected is calculated against the number of animals grazed. In return they sometimes give invoice to farmers and sometimes don't. One farmer told that last summer one guy came with officially looking document from raion administration, took from him two sheep as a pasture rent payment. In a few days another two guys came with another document and claimed that this land belongs to the State Forestry Fund, took another two sheep as a pasture payment fee and disappeared. This farmer is still puzzled if these people really were from any authority and if what he paid went anywhere but these people's pockets and if he was supposed to pay at all.

In some oblasts, since oblast administrations are not capable to monitor pasture allocation and use, and mainly to collect pasture rent payments which are not formally documented and registered, this authority is transferred down to the raion administrations. This is not a case with remote pastures located on the lands of the State Forestry Fund. They prefer to collect fees themselves and it was reported that they don't supply information on rented land from the State Forestry Fund areas neither to raion or oblast administrations.

For example, Issyk-Kul oblast administration issued a Resolution on August 19, 2004 (#138) On Use of Issyk Kul Oblast Pastures. It says that oblast administration notes bad work of raion administrations and oblast land committee on collection of rent fees from near village, intensive and remote pastures. It notes that land committee in oblast administration was formed only in 2003 (this committee was formed in an attempt to establish land use inspection body fully responsible and accountable to oblast administration. It was recently cancelled).

Another resolution transfers responsibility of collection pasture rent fees from remote pastures to raion administrations with transfer of funds to oblast administration.

In the cases of raion administration managing remote pastures, usually they transfer 10 percent of collected funds to Gosregister, about half to oblast administration, and the rest stays at the Special Means Account of raion administration which are mainly used for salaries and travel cost of these specialists.

In practice, aiyl okmotus, as mentioned earlier, collect the rent either from shepherd or from farmers directly when they rent out pasture land plot or just charge them amount per head. Many farmers interviewed don't even know that they pay pasture payments since its agreed and done between shepherd and aiyl okmotu, or they think that they are paying livestock tax per head of an animal. In regards to raion and oblast administration, if shepherds and/or farmers make formal or informal agreement with management, they pay there, or as mentioned above raion people come and collect fees at the sites.

Payment to shepherds varies greatly from aiyl okmotu to aiyl okmotu and from raion to raion. In some areas its established by aiyl okmotu and approved at the village meeting, in another shepherds establish rates themselves and aiyl okmotu and people have no say in that.

Table 6. Rates of Payments to Shepherds for Grazing Animals in Various regions.

	Sheep (soms)	Dairy Cow	Cattle	Horses
Bakai Ata raion Talas oblast	13-17 a month	100 a month	95-120 a month	100-150 a month
Sokuluk raion Chui oblast	2 a month	35 a month	7 a month	70 a month
Suzak raion, Jalal-Abad	150 a season	70-100 a month	600-700 a season	700 a season

Payments depend on various additional services provided, such as vaccination, dipping and salt provision. If farmers treat animals before sending them to the pastures, and provide their own chemicals, vaccines and salt, the fee is lower. Some don't pay anything to shepherd for grazing dairy cows since shepherds take her milk and butter for his own consumption or trade.

For example, in Baitik aiyl okmotu, Chui oblast we were told, that for 2005 they agreed at the village meeting that the payment to shepherd for one sheep should make 2 soms per month, for cattle 7 soms per month and 35 soms per cow with daily returns to the village (*bada*). Shepherd in return pays about 40 soms per hectare of land to aiyl okmotu for season (9.90 soms –as a land tax, 19.80 soms as a pasture rent fee, 10.80 soms as Social Fund charge).

The payment amount is calculated based on number of animals grazed. At the aiyl okmotu, shepherd report number of animals he takes for grazing and pays a fixed sum per head. Then aiyl okmotu either divides this number per carrying capacity norms and puts on paper a theoretical area rented, or estimates area rented. In these cases, problems happen, that shepherds try to hide a real number of animals they graze in order to decrease payment amount. There are many cases when they pay to aiyl okmotu in sheep or other animals. It's clear that when payments are made in barter they don't always get properly accounted. In fact, aiyl okmotu heads complained that incentives to collect pasture fees are very low, because raion administrations takes a chunk of collected funds anyway. They all know that according to the Resolution # 360, 90 percent should stay with aiyl okmotu budget, in fact they manage to hold only little part of it.

At the raion and oblast levels, shepherds or farmers should take a certificate from aiyl okmotu on how many animals he has or grazes. Based on that data, they calculate allocated hectarage. This gives room to manipulate for aiyl okmotu with number of animals and to raion and oblast administration on area allocated. The same concerns leskhozoes which allocate pasture land.

According to the Regulation# 360, all pasture rent agreements not registered in Gosregister are considered invalid. However, majority of people do not register their agreements. Its noted, that many think even in aiyl okmotu offices, that if rent term is less then for 5 years, it doesn't require registration. If it's more then for 5 years, then it should go for registration. As it was mentioned earlier, registration is seen as an unnecessary and costly. However, number of registration is growing with number of farmers wanting to secure their leases.

Pasture fees to be collected are estimated based on data given by Gosregister on registered lease agreements. Thus, the incentives for registration are low as for farmers as well as for bodies allocating pastures.

In many areas, interviewed officials estimate that only up to 30 percent maximum of lease agreements get registered and thus accounted for in budgets. The earlier mentioned Resolution of Issyk-Kul oblast administration (August 2004) notes the following: "The lease agreements were made for only 72,183 hectares out of 325,101 ha of near village pastures, which makes only 22 percent. At the same time all near village pastures are being used fully. Based on agreements local (meaning aiyl okmotu) budget received only 456,100 soms instead of 1,359,100 soms which were supposed to be received. If all agreements were legalized then local budget would receive additional 903,000 soms. Out of 336,820 hectares of intensive pastures the agreements were legalized only for 22,878 hectares, or for only 6.8 percent of area. If the agreements were legalized, then raion administration would receive additional 5,677,018 soms. In jety Oguz raion, for example, legalized agreements were made only for 0.3 % of raion's intensive pasture area. As a result of agreements reached for rent of remote pastures, only 71,100 soms were collected instead of 1,698,000 soms what makes only 4 percent". The same Resolution approves completely illegal but widely practiced decision: "From now on, all collected rent, besides land tax should be transferred as following: 50 percent to oblast budget, 40 percent to raion budget, and 10 percent to Gosregister".

Table 7. Data on Use of Pasture Resources in the Kyrgyz Republic in 2003

Oblast	Total area of pastures (hectars)	Including			Rented area				Rent fees (soms)		
		Near village	Intensive	Remote	Total rented area	including			including		
						Near village	Intensive	Remote	Expected	Actual	%
Batken	593,456	256,010	145,369	192,077	31,646	3,033	25,827	2,786	699,000	654,900	94
Talas	656,210	176,598	373,009	106,603	42,770	3,998	38,772	-	313,000	203,000	65
Chui	716,040	282,637	259,347	174,056	61,309	24,113	36,692	504	793,000	504,000	64
Osh	1,400,685	366,966	55,226	978,493	45,986	15,335	17,268	13,383	1,708,500	1,494,400	87
Issyk-Kul	1,413,301	325,101	248,258	839,942	130,893	15,378	17,051	98,464	627,000	370,000	59
Jalal-Abad	1,638,518	210,114	1,075,830	352,574	61,053	26,521	34,532	-	1,492,700	1,126,000	75
Naryn	2,509,196	721,008	763,215	1,024,973	252,246	9,946	117,906	124,394	697,000	453,600	65
Total	8,927,406	2,338,434	2,920,254	3,668,718	625,903	98,324	288,048	239,531	6,330,200	4,805,900	74

Source: Gosregister

Table 8. Data on Use of Pasture Resources in the Kyrgyz Republic as of March 1, 2005 (for 2004)

Oblast	Pasture Area (ha)	Pasture area in rent (ha)	Pasture rent payment (soms)									Total rent fee according to the agreements	Actual
			Near village			Intensive			Remote				
			Rented area	Sum per 1 ha	Total amount	Rented area	Sum per 1 ha	Total amount	Rented area	Sum per 1 ha	Total amount		
Batken	386,871	14,260.42	9,340	17.4	162,000	4,211.5	23.2	97,700	708.92	14.7	10,400	270,200	236,800
Talas	656,123	91,107	56,638	21.0	1,191,000	47,761	10.7	500,000	2,969	19.7	59,000	1,749,700	691,000
Chui	796,500	88,152	31,924	21.6	690,000	55,724	9.2	514,000	504	23.4	12,000	1,215,000	1,517,000
Osh	1,397,651	74,286	39,011	15.3	597,000	39,996	6.6	264,000	-	-	-	1,461,900	1,390,000
Issyk-Kul	1,412,143	233,035	101,681	16.1	1,635,800	69,876	15.8	1,101,100	67,487	8.4	564,600	3,301,500	1,147,600
Jalal-Abad	1,291,789	143,348	66,113	19.6	1,293,000	66,035	17.9	1,182,000	11,200	9.4	105	2,580,000	1,950,000
Naryn	2,362,547	283,636	13,196	8.1	107,500	122,550	6.8	832,600	147,860	2.3	343,300	1,293,400	748,700
Total	8,303,629	927,825	317,903	17	5,676,300	406,154	11.1	4,491,400	230,729	4.7	1,094,000	11,261,300	7,681,000

Source: Gosregister

If all data correct, according to this table, the total pasture area around the country has decreased although not significantly, by about 600,000 hectares. This could happen because of transfer some lands from pasture category, mainly into land of settlements. It can be noted, that rented area has increase in comparison to 2003, from 625,903 ha to 927,825. According to registered agreements, rent of near village pastures has increased more than two times, intensive almost two times, and rent of remote pasture stayed almost the same.

The collection of rent payment is still very low on paper but there are anecdotal evidences that in reality its much higher. As it can be seen in the Table 7, which gives data based on lease agreements registered in Gosregister, only 7 percent of total pasture land is rented out. It is evident, that near village pastures are used the most and in some locations they are even overused, but at the same time if to trust this data, only 4 percent of these pasture areas are rented out. The similar picture is with rent of intensive (10 percent) and remote (14 percent) pastures. Some interviewed in the villages said that they would like to register rent agreements but either they don't know how to

do it or they don't want to go to raion for that. Some proposed that registration of lease should be simplified and done in aiyl okmotu offices rather than in raion offices of Gosregister.

Even these miniscule amounts are not collected or at least not accounted. It's rather difficult for raion and even more difficult for oblast administrations to collect rent fees. In one letter from Finance Department of Issyk-Kul oblast to its raion administration, it is asking that raion administration through its aiyl okmotus collect all pasture rent fees for use of remote pastures.

At the same time, not collected amounts do not accrue as a debt. These are the problems of accounting barter and informal payments.

In leskhoz we were told that they transfer 50 percent of the collected payments to the State Forestry Service, 10 percent to Gosregister (it should be 5 percent according to the Regulation # 360) and 40 percent stays with them.

Gosregister gets 10 percent of all pasture payments from all categories of pastures, and 5 percent from pastures located at the territory of the State Forestry Fund.

Thus, collection is done in a not transparent manner, often not accounted if not formalized or provided in cash. "I think that all relatives and friends of our aiyl okmotu head don't pay pasture payments though they use the best land, why should we pay?" (is a common mistrust of villagers around the country).

Use of funds collected from pasture rent are not transparent and regulated. It's evident that these funds are very rarely used for pasture improvements or rehabilitations of pasture infrastructure. In addition, although Gosregister gets portion of these payments, they charge additional funds for various surveying and mapping activities. However, 67% of all interviewed would pay high pasture payment fee if its used for pasture improvements. About additional 15 percent of interviewed would not pay higher payments only because they don't trust aiyl okmotus and/or raion and oblast administrations in such use of funds. And the rest would not pay more because they think that pasture payments are already too high.

Usage patterns

As mentioned earlier, there are three major patterns of pasture use: i) when land is used on the principle of an "open access" by local population, ii) when land is used by communal herds, and iii) when land is used by individual farmers or by big extended households.

When kolkhozes and sovkhoses have been restructured, it was decided to allocate land which was previously used by household private animals to the category of *priselnye* pastures. Currently, many dairy cows, often sheep and cattle graze there not only during the winter but a whole year around. This especially concerns areas where climate is favorable and grass don't get burnt and its not too hot for animals during the summer period. That's why these pastures have been seriously overgrazed and eroded.

According to the survey, farmers who have no more than 3 sheep and/or 3 cattle, do not use services of shepherd and graze these animals either by themselves or in established turns with other villagers. Some give sheep to shepherd for taking them to intensive and remote pastures, but graze themselves dairy cow and calves around settlements. In such families, usually kids take animals around. "Children have no childhood with these bloody cows. They often riot against going with them

around. My kid grew up and works now, so I can't afford to have a dairy cow anymore" (woman from village of Bakai-Ata raion).

In many cases, in areas where there is a shortage of near village pasture land villagers graze animals on their land shares, on their garden plots, in a backyards and along the water ditches in the village.

In such open access system villagers either pay pasture payment tax to aiyi okmotu from head of the animal and treat it as animal tax or don't pay anything at all.

In majority of cases, villagers give their animals or part of their animals to shepherd to graze them either around settlements with daily returns for dairy cows (*bada*) or to take them to intensive and/or remote pastures. Since current legislation doesn't really recognize community based rent of pastures, the allocation of land and collection of pasture payment fee is done informally through shepherds.

One still controversial and confusing issue of pasture use relates to pasture lands which were before in inter raion and or inter oblast administration. According to the previous Land Code, pasture land could be allocated to collective and state farms for the period of up to 25 years. Majority of such leases ended in 1999. However, there was a Government Resolution adopted that these rents are extended till 2025. Thus, farmers from one raion graze their animals on the pasture which are territorially located in another raion.

According to the Regulation 360, sub leases are not allowed. However, there is a wide practice of such sub leases around the country.

Secondary users

Secondary users problem is acute in some areas and completely non existing in others. Problems mainly concerns hunting rights. Hunting reserves cover 14.5 million hectares of land in the country (the total area is 20 million hectares). In these hunting reserves the most popular species are Marco Polo Argali sheep, Siberian mountainous goats, roe deer, wild boars, badgers, foxes, marmots, chukars, pheasants, partridge, ducks, quails and others.

There are 80 private hunting tour companies registered in country and 2 state ones (Society of Kyrgyz Hunters and Fishermen, and Military Society attached to the military units). Procedures for allocation of land and resources for hunting reserves are confusing. According to the Law on the Fauna (June 17, 1999), land for hunting reserves is to be allocated by raion or oblast administration in consultations with the primary users of these lands. In reality, there were no cases mentioned when such consultations took place. Hunting reserves are given in use and rent for the period of up to 10 years.

License for hunting is given by the Main Department for Protection and Regulation of Use of Hunting Resources under the SFS (*Glavohota*). Annual quota for species are approved by the SFS. In 2004 SFS has issued 54 quota for Marco Polo Argali sheep to 41 private companies. There are other quota which are issued for hunting for research purposes. In addition, Management Department of President Administration can have additional quota. Those who don't take trophy out of the Kyrgyz Republic, usually don't obtain any licenses or quota and form the major problem for animals as well as for local people.

Table 8. Unified Rates for Hunting Trophies of Wild Animals in the Kyrgyz Republic

Wild Animals	Fees for one trophy (USD)
Marco Polo Argali Sheep	5,000
Siberian mountainous goats	600
Roe Deer	200
Wild Boar	150

Source: Resolution of the Kyrgyz Government on Changes to the eGovernment Resolution dated December 28, 2000 on Approved Reester of State Paid and Unpaid Services Provided by the Executive Bodies and their Sub Divisions, December 25, 2003, #801.

According to this resolution, all legal entities involved in organizing of hunting tours for foreign hunters ensure payments for trophy of wild animals (excluding Management Department of the President's Administration).

These payments should be made to the State Forestry Service. The State Forestry Service should allocate these funds to the national budget (30 percent); local budget – meaning raion or oblast budget depending on location of hunting reserve (20 percent), and the rest stays with the SFS for financing of biotechnical activities, protection and regeneration of wild animals, and other activities of state importance (Resolution # 801). At the same time, no funding is allocated for local level.

“Why should people from Bishkek and Germany come and hunt our animals? When we shepherd our animals through their territory, they stop us at the entrance to the gorge where they put up a lifting gate. They check if we have any guns and only then give us a permission to go further. We are all very upset with this. We have to go through unpassable mountains to get to the places where we can hunt without being stopped. Of course we understand that animals should be hunted wisely in a way that not to exterminate them all. But these foreigners don't do anything to preserve them either. If they pay us, villagers we would take care of these animals and they can come and hunt without any problems from us. But right now we hate each other and this conflict can become very serious if not addressed soon”. Farmer from Kyzyloktyabr village, Bakai Ata raion, Talas oblast

There is a growing conflict mentioned in few places between hunting reserves and local population. In Bakai Ata raion, there is a hunting reserve organized by a joint Kyrgyz-German hunting tour operator. Every year they bring foreigners to this hunting reserve. It's a well managed reserve, with well equipped guards and established check points. They have conducted a campaign on buyout of guns from local population in order to prevent hunting by villagers. However, the population of this area is poor and depends on natural resources. They mainly hunt for food. On one mountain range of At Bashi raion there are 45 hunting tour companies registered which also have a growing number of disputes with local population. In the SFS management understand this problem and its looking into development of new forms of organizing hunting, such as community based hunting when local population is deeply involved into management and protection of hunting resources.

The number of other secondary users, such as bee keepers, fishermen and collectors of medicinal plants is not significant and their activities are usually of small scale. There are no conflicts mentioned in their regards.

It is an issue for further research and discussions if its feasible to treat pastures in a close connection to rangeland in general, when communities manage and use their local natural resources as a one ecosystem.

Monitoring and Regulation

According to the Land Code, monitoring of all land (system of constant monitoring over the status of the Land Fund and identification of all changes, their assessment, prevention and remedy of

negative processes) is conducted by the state body responsible for use of land resources, and state body for protection of environment.

According to the Resolution 360, the State Agency for Registration of Rights to Immovable Property (Gosregister) is in charge of control over the status of pastures, over allocation and use of pasture areas through the monitoring activities. However, Gosregister implements partially monitoring of pasture status but can't afford to conduct full fledged comprehensive monitoring activities as specified in the Land Code. Lack of funding and other resources do not permit to conduct monitoring in a regular manner and its done mainly on ad hoc basis by the Giprozem.

The State Design Institute for Land Management (Giprozem) was created in 1963 under the Ministry of Agriculture. Since 1996 it is a part of the Gosregister which has a central office in Bishkek and expeditions (branches) in six oblasts excluding Chui. It has its enterprises in 6 oblasts and has 212 people.

Its funded from the State budget and from its own means since it has a right to collect revenue. In 2005 the estimated budget is about 6,137,400 soms with 1,720,000 allocated for delimitation of state borders and 4.5 millions allocated for major activities with more then 70 percent for salaries.

Since state funding is very limited, Giprozem has established its charges for various services, such as payments for participation of its specialists in activities of other agencies, including participation in work of committees (up to 730 soms per day of work), consultations of its specialists on geobotanical composition of pastures and their use (up to 500 soms), preparation of information on pasture productivity with provision of copies of maps of pasture areas (850 soms and higher), scanning and digitalizing maps (up to 11500 soms) and others. Even provision of old surveys' materials on soil and agrochemical composition of soil costs up to 1,000 for enterprise. These services and information are provided upon request either from farmers, or from local self government bodies or local state administrations and other agencies.

There are no arrangements in place on control and monitoring of allocation, quality, use, or improvement of pasture areas.

Control functions within the Gosregister are given to the Inspection for State Control Over the Use and Protection of Land Inspection) under the Gosregister is charged with control functions over use of agricultural land. This Land Inspection has about 23 people in the central office and 72 inspectors in the fields. Major objectives of this Land Inspection spelled out in its governing Regulation are the following: i) ensure that land legislation regarding use and protection is followed; ii) detecting unused and irrationally used land; iii) control over quality of land monitoring; iv) control over implementation of activities on rehabilitation and maintenance of soil productivity, land protection from deterioration; v) control over inappropriate land use and their recultivation; vi) land monitoring; vii) supervision and coordination of activities of regional land management services on state control over land use.

The highest supervising body for Land Inspection is the Gosregister. It can be clearly seen from these functions and organizational placement, that this Inspection can't in reality control services, their legitimacy, and quality provided by its Agency (Gosregister). There is a clear conflict of interest which undermines any efforts of control over land use and their accountability. In order to be fair and efficient, control functions should be implemented by the independent Agency, or at least by the Agency which is in charge of literally all state functions related to land.

Another problem relates to lack of resources in the center and in the fields. Land Inspection's budget for 2005 amounts 3,810,000 soms out of which about 2.5 million goes to staff salaries.

Lack of incentives, resources and independency inhibits this Agency to conduct meaningful and comprehensive control over pasture land use around the country.

Staff of this Agency complained that even if they find out severe violations of land use they can't do anything with that. According to the Administrative Responsibility Code they can impose penalty (up to five minimal salary rate) but if person doesn't pay the penalty they should take this case to the court. If they take such cases to the court, it would take a huge amount of their time and efforts and very often without any positive results.

According to the Forestry Code, the State Forestry Service is in charge of control over allocation and use of lands in the State Forestry Fund. State Forestry Service (SFS) is an autonomous agency under the President Administration. It has 53 forest enterprises (*leskhozes*) around the country, 9 national parks, 8 protected areas and one nursery. Leskhozes in their turn are divided into ranger districts. Recently, SFS has started reforms in its organizational functions and structure. The major objective of this reform is to separate policy and economic activities. Monitoring functions are implemented by the Main Department for Forest Management which was established in 1995 (before that all works were conducted from Kazakhstan). This department is in charge of forests inventory, and design of management plans for leskhozes. Forests inventory are conducted every 10 years. In a newly established organizational structure of SFS, the control functions will be given to the Main department for state Control over Protection and Use of Objects of Fauna and Flora. Currently, the actual control over use of land in the State Forestry Fund is implemented by the staff and rangers of leskhozes, who are in fact sometimes are part of violation in allocation and use procedures. Inspection comprised of various staff of central body of SFS makes some checks on ad hoc basis and it doesn't lead to serious results.

Main Department for Protection and Regulation of Use of Hunting Resources under the SFS (*Glavohota*) controls use of hunting resources.

A new player in the field of pasture management, monitoring and control have appeared recently in the body of the Main Department of Pastures under the Ministry of Agriculture, Water Resources and Processing Industry. In a Resolution of the People's Representative Assembly of the Jogorku Kenesh, dated April 7, 2004 on Status of Use of the Lands of the Land Redistribution Fund and Pastures it is said that Gosregister is not performing well in management, use and control over allocation of agricultural lands, and Government of the Kyrgyz Republic has to charge Ministry of Agriculture with functions of the state body responsible for overall coordination of management, and effective use of pastures and land of the LRF.

This department was transferred to the Ministry in November of 2004. It's a remain of a Soviet time Scientific and Production Union for Fodder, Pastures and Meliorative Construction which was a huge organization in charge at that time for overall constructions, and maintenance of pasture infrastructure, its fodder productivity and social and cultural life of shepherds. Later it was transferred to the Agrarian Academy and now back to the Ministry with very limited staff and resources. There are nine people employed in the head office, out of whom 6 specialists such as economists and engineers. In the regions they have about 2 professional staff in each such as radio specialists and information collecting specialists. The total budget of this department for 2004 was

4,456,000 soms out of which 2,722,300 soms went to services and the rest covered salaries, utilities and operational expenses. In 2004 Department supervised and funded three types of services such as rehabilitation of about 60 kilometers of sheep paths, 13 kilometers of irrigation canals, and repair of about two water supply systems. These works are conducted based on requests coming from local administrations without clear system of collection, processing these requests and selecting priorities. Terms of Reference of this Department is not clear and it appears that it charged now with defining state policy towards pasture use and management. There is a genuine desire in this Department to address issues of pastures in comprehensive way but resources and skills are limited. If this Department to be in charge of overall policy on pastures, there is a need to establish strong links with other agencies such as Gosregistr, especially Giprozem, State Forestry Service, Ministry of Environment and Emergency Situations and local authorities. Services should be provided in a comprehensive manner with a clear strategy formulated, priorities identified, and resources secured.

Another national body in charge of control over protection of land resources is the Ministry of Environment, and Emergency Situation and within it a Department of Ecology and Use of Natural Resources. However, it is reported that Ministry of Environment is focused on protection of environment from industrial sector.

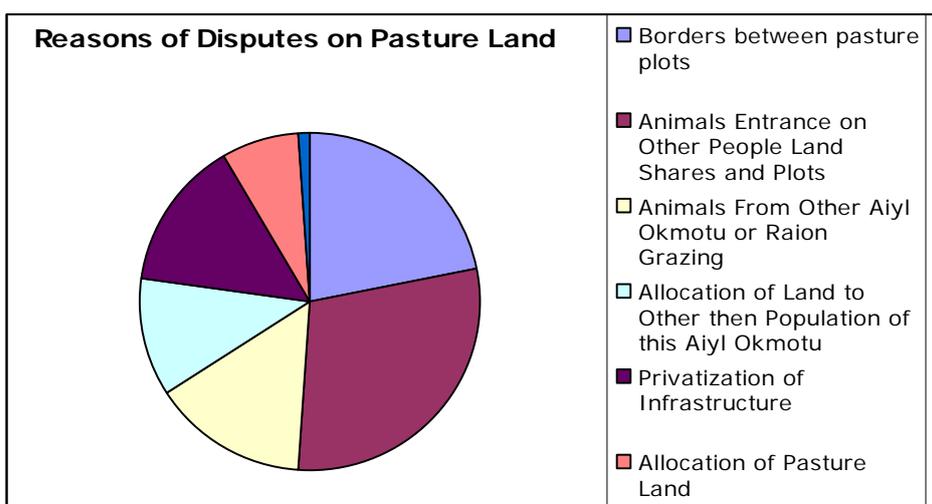
Sanctions

Sanctions used against the damage to land resources are regulated by number of numerous loosely connected laws and resolutions. They are mainly administrative penalties and calculated in regards to minimal salary rate (for example according to the Government resolution of September 2004 on damage to land, the administrative penalty for various types of pasture varies from 0.05 to 0.8 percent of minimal salary for square meter). In reality they are difficult to enforce. If damage is caused from individual to individual, they usually agree on penalty themselves. If not, then local authorities try to enforce the punishments.

Conflicts

With all this uncertainties in current legislation, diffused responsibilities on land management, lack of information on land rights, and growing demand for pasture resources, there are many conflicts related to pasture resources.

- According to the results of survey, the most often reason for disputes on pastures and grazing is entrance of animals on other people's fields (30% of all interviewed mentioned this problem). This happens when near village pastures areas are scarce, when there are no easements envisaged for animal paths, when family is very poor and can afford only to send children to look after cattle, and etc. The administrative fine for such case is from one to 3 minimal salaries. But often people settle these conflicts themselves. One woman in Urmalar village told her story that she sent a 10 year old boy to look after a cow and he got distracted and went playing with other kids. Meanwhile the cow went to neighbor's field and damaged his crop. Neighbor locked her cow until she managed to bring him money he told her. Baitik aiyi okmotu head thinks that about one fourth of all animals stay in villages and don't go to intensive or remote pastures. That is one of major concern because the number of cases of damage to fields from animals is growing.



- The conflicts between shepherd and farmers on the borders of their pasture territory are less frequent (22%) because not many have documents with lease agreement and/or maps with allocated to them land. These disputes arise also when someone rents a pasture plot and doesn't allow communal animals to pass through it or to use water points on the plot. This problem becomes one of the mostly often observed.
- As mentioned earlier, there is a related to this problem when people privatized construction infrastructure and as a consequence rented out a land around it on a must basis (14%). Since infrastructures were built near roads, water points and animal paths, this often inhibits access to pasture land.
- Another problem mentioned in survey relates to allocation of pasture land by raion and oblast administrations without considering existing use practises or demands of local people (11%).
- Unfair allocation of pasture land by aiyl okmotu was also mentioned (7%) as one of the source of disputes at the local level.
- Disputes between secondary and primary users were mentioned but not considered as important as previous ones and less frequently observed (1%).

Other conflicts, mentioned during the interviews related to growing tension between villagers and communal shepherds. They happen when animals given for grazing to shepherds get sick or die. (Shepherds when they come back from pastures return animals and get final payment. In case, if some animals got sick or died, they usually reimburse owners either in meat or live animals but of less value, such as if sheep died, he would bring owner a lamb, or if a cattle died, he would bring a young calf). It's apparently difficult to get a return from shepherd in cash. To confirm death, they either bring a corpse or a certificate from a veterinarian. Usually these issues are settled peacefully, but in case if there are conflicts, then they go to respected elderly men in the village and they mediate negotiations. Another conflict type with shepherd was reported in the South, that when shepherd comes back in the fall he often demands higher then agreed price. This usually happens when he had some unexpected losses (in attack from wolves, or if animals got drown in a river). In that case he refuses to get back animals if his demanded price is not paid. Some people requested

during the interview that practise of aiyl okmotu negotiating and fixing price with shepherds for their services should be expanded.

There is a confusing situation with pasture areas which were earlier (before adoption of the Land Code in June, 1999) given for long term use to ex kolkhozes and sovkhoses of raions and oblasts located within administrative boundaries of other raions and boundaries. In Resolution #360 it was spelled out that these pasture areas stay in the use of these raions and oblasts till 2025. In this case, when kolkhozes and sovkhoses restructured, aiyl okmotus served as their successors. This situation is contravercial and leads to disputes between different aiyl okmotus, raions and oblast administrations. Raions and oblasts on which territories these pastures are located want to receive them into their jurisdiction, but those who use these pastures usually have no and not enough own intensive and/or remote pastures. This confusion also leads to confusion in pasture use payments. Giprozem proposes to make changes to Regulation #360 and to divide land tax and pasture rent fee so first part of payment (land tax) goes to the administrative unit where this land is located and second part (pasture rent fee) goes to users' administrative unit. This doesn't look like a feasible solution and will cause even more problems for farmers.

There are conflicts with local authorities of the State Forestry Service (leskhopzes), when they expand protected areas and national parks, they often withdraw pasture land out of economic use. This is usually done without any consultations with local population and without any provision of alternative grazing areas. Only in the framework of Central Asian Transboundary Biodiversity project, when transferring leskhoz into the protected area status, consultations with population were conducted and some pasture area compensated. At the same time, in few locations villagers told that they lost their traditional pastures and routes to intensive ones when leskhoz or protected area expanded its territory.

According to the Land Code, all conflicts related to land rights are to be addressed by the authorized state body which allocated the land plot. In not resolved with this body, land disputes should be addressed in the court. This is rather difficult to exercise when disputes are cuased by these authorities and bodies and when court system is not functioning.

In conflict resolution, all interviewed said that first they try to settle conflicts themselves. In this case, they use their social capital, such as social networks, informal leaders, and traditional mechanisms of negotiations. Everybody interviewed thinks that in that way they avoid publicity, get fair and equal treatment and wise decisions. And such decisions are almost always get enforced. In case, if disputes arise between people from different aiyl okmotus, or with local authorities and legal entities, or when decisions made in traditional way are not acceptable to one of the party,

“In our village we have “shadow aksakals”, old wise and respected men who are informal leaders of tribes. They keep traditions and tell about them to people usually at some big gatherings. They organize life of our village. When we have a big celebration, they call few people from each tribe living in the village and distribute works. And then everybody does what they told them to do. And if money is given out for such works, then they report to these people how spent them. It's never been a case that someone tried to cheat them, everything is very transparent. These people usually are not members of aksakal's court, maybe only some. But court of aksakals is considered as a formal group accountable to aiyl okmotu. They are usually people who are convinient for aiyl okmotu and often make decisions based on their loyalty to aiyl okmotu management.

In order to avoid publicity and get decisions which will be respected by all, people go to these informal leaders and only if they can't resolve the conflict, the case goes to aiyl okmotu. We never go to courts, because we don't trust them. They will make everybody pay them and result will be null.” From an interview with an old woman from Koi Tash village.

they go to formal level. When going to formal level, 81 percent prefers to go to aiyl okmotu. Others would go to either to court of aksakals, aiyl kenesh, and only 4 people out of 370 would go to the courts and 2 to Gosregister.

One of the major reasons for disputes and conflicts is a lack of information on general pasture availability, pasture legislation and procedures. It is widely noted that there is no information on pasture allocation procedures especially by raion and oblast administration. Many farmers don't even know that there are some procedures they need to follow to legalize their pasture use. Few farmers at Suusamyр pasture while interviewed said that they were coming to the same land plot for many years and don't know what they need to do to formalize their use, how and where. Many become a game for crooks. These farmers complained that last summer a man came with some certificate with stamps and told them that he will bring them maps of their parcels and registration of rent documents to the pasture plot for 5 years. They paid him each household about 400 soms as an advance payment and he never came back. While looking at this document, it was a typical agreement for use of pastures with the stamp of Suusamyр aiyl okmotu though people coming from this aiyl okmotu said that they never met this guy before and after. These farmers were very keen to know how they can rent these pastures and legalize their use. Many proposes that when raion people come to them to collect money, they can do simple inventory of their used plot and produce an agreements righth at the spot.

There is an urgent need to carry out basic public awareness on pasture use rights among rural population and even aiyl okmotu officials throughout the country.

Piloted experiences on Pasture Management and Use

Under the Sheep Development Project funded by the World Bank (completed in 2002), there was a component on pasture improvement implemented by the group of consultants from Giprozem. This component has developed and piloted a new methodology on pasture allocation. In four locations (Orgochor aiyl okmotu of Issyk-Kul oblast, Tolok and Son Kul and Kok Oi aiyl okmotus of Naryn oblast, Ortok aiyl okmotu of Panfilov raion and Ak Su aiyl okmotu of Moskovskii raion of Chui oblast, and in Katta taldyk aiyl okmotu of osh oblast) pasture areas of all categories were surveyed and carrying capacity in terms of available dry forage per ha determined. With information available on range condition and forage production, lease arrangements were designed to balance available forage with livestock numbers. Consultants analyzed the needs for pasture areas based on existing and forecasting number of livestock. Aiyl okmotus there have received right to manage all pasture categories, Giprozem provided them with maps, model agreements and recommendations on pasture allocation. This pilot was successful and well accepted by local population. However, it was not widely replicated and information not properly disseminated.

Central Asian Transboundary Biodiversity Project has given a small grant to Kyzyloktyabr aiyl okmotu in Bakai Ata raion of Talas oblast in the framework of its Small Grants Program aimed at the regional biodiversity management plan implementation. This is an interesting experiment which pilots some new approaches in pasture management and use. Since its started in early 2005, its still needs some fine tuning and time to see its sustainability, but it can be used as a model for replication if further supported in improvement.

Three villages in Kyzyloktyabr aiyl okmotu were selected as pilots because they are located in the area of migration corridors of marals. It was discovered that population of marals is decreasing and partially it happens because rangelands along this corridor are overgrazed and eroded. In order to

improve environment and facilitate environmentally sustainable use of rangeland ecosystem, this Project decided to promote a new way of pasture use. For that purposes, in each village of this aiyl okmotu (there are 5 villages there) specialists of Project conducted village meetings and discussed problems of pastures. Farmers raised many problems, such as i) lack of near village pastures in this aiyl okmotu; ii) intransparency in pasture allocation and no say for villagers in this process. There was a case when individual rented only 30 hectares of pasture but didn't allow other animals to graze in the whole gorge; iii) lack of control over pasture use, overgrazing of pasture areas by some farmers; iv) raion authorities distribute pastures to people from other oblasts without considering needs of local population; v) no easements provision in allocation of pastures; vi) sub lease practises of pasture areas by farmers who have no livestock; vii) erosion of pastures and lack of improvement activities; viii) destroyed pasture infrastructure, such as roads, and bridges which inhibits movement of animals to intensive and remote pastures.

As a result of this meeting, villagers elected 3 people from each village representing them in Aiyl Okmotu Pasture Committee. These are people who know well local pasturage (former shepherds), have experience with animals and pasture infrastructure, and who are trusted by community. These 15 people elected their Chairman, Deputy Chariman, Tresurer and Internal Auditing Goupr of 5 people. There was a Regulation developed for the Pasture Committee. They were all elected for 3 years. It was agreed that at the end of the year they will report on their activities to the villagers. Project conducted number of trainings for communities and Passture Committee members on pasture rotation, on carrying capacity of pastures, of pasture payment mechanisms, on sustainable use of pastures.

Project provided them funds for rehabilitation of 5 destroyed animal bridges selected by communities, for making 15 natural reserves for pasture rotation and natural insemination, establishment of information boards on local biodiversity and herd of 100 sheep as a resource for committee's future work.

It was agreed that this herd will be maintained for future activities of the committee as a revolving fund for small scale rehabilitation of bridges, some pasture rotation activities and small compensation to pasture committee members. Community provided its labor and some materials for these works.

Before pilot has started, this aiyl okmotu had only 700 hectares of near village pastures, which are within villages and

already heavily overgrazed. In the course of the discussions facilitated by the Project, it was agreed to re allocate more area from intensive pasture category to near village one. Raion administration

:We are very excited that people trust us. It's a first time we are doing something important for our aiyl okmotu together, when we make decisions, we implement what we think is important and in a way we think is good. We are to live here, and we want to leave this land to our children in a good shape. Who if not us to take care of our land? This place was called Urmara which means herds of marals in Kyrgyz. Our old people tell us the stories how they often saw marals here. Now our children don't even know how they look like. Pasture Committee and common villagers have a lot of enthusiasm to make changes. Two maps were already torn when villagers at the meeting debated the distribution of pastures. Finally after many yellings and shouting we came to the solution which is good for everybody. We are not elected by aiyl okmotu or raion people. We are elected by our villagers. It's a huge responsibility and we want to do great job. We spent a lot of time fixing bridges. One shepherd when we finished invited us to his house and fed us. He was so happy because every year many sheep felt in this fast reiver stream and drown. Now he can safely go to the remote pastures. But we need to be heard and respected by bureaucrats. One bureacrat told us: "Who are you to decide on pasture management? I am an authority and I will give this pasture to whoever I want to." We need to transfer all pastures to people or at least to aiyl okmotu because they will not only use this land but use it in a way that is good for nature. People in Bishkek who write laws don't know our life and don't care about us. Even people in oblast and raion are too far from us to make fair decisions. Only if we come back to our traditions in using pastures we can preserve this land and our children will see marals again one day ". from interview with the member of Pasture Committee.

issued a resolution on this and transferred about 8,500 hectares from its intensive pastures to aiyl okmotu.

Project also provided funds to oblast Giprozem to conduct comprehensive analysis of pastures jointly with pasture committee members and make a map.

As a result, aiyl okmotu has now about 9,000 hectares of near village pastures in its management. Pasture committee went even further and allocated this area to 5 villages. Each village got a land plot according to animals they have (pasture committee members went around each household and calculated all animals in possession) with some additional reserves for future growth of this number. Each out of five plots is of similar value and have infrastructure on it such as water points, bridges, animal sheds and animal paths. Within each village pasture committee has made a decision jointly with villagers to allocate separate plots for each tribe living in it. These plots within an allocated for a village pasture area are provided to groups on a rotational basis, so each group grazes animals every year on a different plot to ensure fairness and prevent any internal conflicts.

In relation to other intensive and remote pastures, Pasture committee decided to look at the Soviet map of Urmaral kolkhoz which boundary completely coincide with the boundary of today's aiyl okmotu. Giprozem made a map of these pastures as well and Pasture committee allocated areas there for 5 villages in a similar manner. However, Pasture Committee developed this as a proposal for raion and oblast administrations which are managing intensive and remote pastures.

Pasture Committee also checked pasture rent agreement of some farmers and found out that there are many problems: one farmer rented 40 hectares but in fact uses more than 200 hectares, another person has no livestock but rented a pasture plot which he sub leases it to shepherds. Pasture Committee reported on these and other cases to aiyl okmotu and raion administration.

In future, Pasture Committee plans to help aiyl okmotu to collect pasture payments.

In addition, Pasture Committee fixed five bridges and made fences for pasture rotation using project funds for materials and some technical skills. These investments have raised image of the Pasture Committee and trust of people.

However, some issues are still not addressed such as a legal status of Pasture Committee, how rent will be registered if its of a communal nature, how fees collected will be used, how they can monitor pasture conditions and make improvement in future without Project's fund, what are the real powers of the Pasture Committee to enforce its decisions, how to make sure that raion and oblast administration take into account recommendation of this committee on allocation of intensive and remote pastures to villagers, and others.

However, oblast Giprozem officials told that the information on this pilot went around and now all aiyl okmotus want to do the same redistribution and allocation of pastures to their population. The major problem to replicate this experience is resources to organize such work, to carry out pasture inventory and produce maps.

The total grant amount was US\$18,368.

Although legislation prohibits construction on pasture lands, many relative bodies allow to build some temporary constructions for staying but on remote pastures only (Barpy aiyl okmotu for remote pastures).

There are many other local community based practises of pasture management which need to be carefully studied for their strengthening and expansion. In Osh oblast, for example, there is an interesting practise when veterinary service (*vetservice*) is helping aiyl okmotu and communities on pasture management and use, organize farmers and provide them various services.

Conclusions

In general, the condition of pasture resources has significantly deteriorated. 76 percent of all interviewed think that conditions deteriorated greatly, 8 percent thinking that they deteriorated significantly, 6.5 percent who don't know, 4.6 percent who think that pasture conditions are not bad, 4 percent thinking that conditions slightly deteriorated.

It relates to overgrazing of near village pastures, as well as of intensive pasture areas. Remote pastures being underused for the last 10 years are in better condition but have problems of weeds, of a build up of soil crusts need attention as well.

This deterioration happened because of many reasons, such as extended use of pasture resources for huge number of livestock during the Soviet time, collapse of an economy in general in the first years of Independence, when cheap imported fodder was no longer available, and state support has dried out, and pasture infrastructure destroyed.

In a course of transition period, poverty level of many rural animal holders has increased and many have stopped to take animals to pastures other than near settlements.

Kyrgyz during the Soviet regime have lost their traditions of transhumance herding which were based on cultural and social norms. Such use of pastures when during various grazing cycles some pasture areas were left for rest, had ensured some natural pasture rotation and rest.

Land reform mainly focused on arable land privatization and because number of livestock dramatically felt down from the Soviet figures, pastures were not considered as a priority for policy makers. However, with the number of livestock growing, these problems become even more acute, effect mostly poor layers of rural population and can become a source of serious tensions and conflicts.

Post Soviet legislation in regards to pastures is fragmented and policy and arrangements in management, allocation and use are spelled out in Land Code, but mainly in the Resolution number 360 adopted in 2002. However, this and some previous studies show that in reality farmers graze animals in a somewhat different way and allocation and management also differs from what is prescribed in this document. The discrepancy between legislation and actual practice creates a weak basis for the resolution of disputes and creates the room for administrative interpretation and manipulation.

All these factors dictate an urgent need to address issues of sustainable use of pasture resources in a manner which is aimed at the preservation of this strategic resource and satisfies needs of rural people.

It is evident, that with limited state and local funding, government needs to develop a policy towards pastures which is affordable and at the same time would allow achieving meaningful results. This policy has to be built taking into accounts local traditions, social norms and opinion of all stakeholders.

This policy should be accompanied by strategy and actions plan which would attract foreign investments and aid in rehabilitation of pasture infrastructure, in support of building capacity.

Legislation should be developed in consideration of local practice and social norms and to be flexible to reflect differences of various regions and localities and provide framework which then can be modified and adopted by local councils to meet local requirements.

It should be brought closer to the traditions which have already started to govern pasture use in reality. Traditional rotational grazing whereby animals use the various parts of the grazing lands at different seasons would be beneficial to restore. It should also reflect used everywhere practise of communal grazing in general and give further momentum to development of community based natural resources management so far successfully piloted in some locations. Pastures should be treated in a whole with their ecosystems in order to ensure sustainable use. Procedures of allocation of pastures need to take into consideration a communal nature of pasture use. However, there is a need to consider needs of farmers with significant numbers of livestock, who want to rent pasture land as individuals. In order to ensure sustainable use and investments into pasture resources a practice of “open access” needs to be replaced by the exclusive rights to use allocated pasture areas to groups (communities, cooperatives and other forms) and to individuals.

Government needs to decide on overall monitoring and control functions over use of pasture resources and which agency can and should fulfill these roles. Diffused responsibilities have led to no meaningful control over use of these resources and boiled down to attempts of many to extract money from uninformed farmers.

In order to promote sustainable use, there is a need to view pastures as one system not fragmented by various layers of management responsibility. There is a need to review possibility of transfer management responsibility for all three categories of pastures (near village, intensive, and remote) to the level of aiyl okmotu. In the source of survey, 83 percent of interviewed think that aiyl okmotu should be in charge of all pasture resources management. Of course, there are problems with management practises of aiyl okmotus, and in that case, almost 90 percent of interviewed are for establishment of local pasture users’ associations or other ways of population involvement in decision making process on pasture allocation and management.

Many aiyl okmotus’ boundaries coincide with the boundaries of former kolkhozes and sovkhoses. This fact allows reviewing pasture allocation practices of Soviet time and seeing if it’s possible to distribute pastures in fair manner to all aiyl okmotus in country. Some areas may stay in shared use. Aiyl okmotus as shown in survey and interviews are close to people, accountable to them can manage allocation and management in a socially acceptable way. As it was shown in the course of research, many aiyl okmotus in fact allocating all three categories of pastures, monitor somewhat their use and collect payments, while raions and oblast administrations receive these funds legitimately or not legitimately.

This transfer of management responsibility would also provide a serious source of income for development of rural municipalities and livelihood of rural population, as well as incentive for its sustainable use. It was noted in interviews, that aiyl kenesh in allocation of pasture areas consider needs of poor and vulnerable people, either not charging them pasture rent fee and/or providing them with areas with easy access. In a Resolution of the People's Representative Assembly of the Jogorku Kenesh, dated April 7, 2004 on Status of Use of the Lands of the Land Redistribution Fund and Pastures it is said that Government has to review an issue of transfer of responsibility of allocation of pastures of all categories to the aiyl okmotu. But unfortunately nothing was done in this regards so far.

Pasture use should be based on rational management plans. Its is advisable to view pastures as a prt of ecosystem. For development of these plans aiyl okmotus would need technical assistance in preparation and later in implementation. These management plans need to be developed jointly with local population and taking into objective preservation of natural resources and their sustainable and fair use.

Aiyl okmotus need help in obtaining information on pastures they manage, their geographic and botanical features, carrying capacity, and maps. At the same time, pasture monitoring methodologies could be simplified and people trained how to use it. There is a need to strengthen capacity at the local level on pasture monitoring and evaluation, as well as allocation and use.

Allocation and registration procedures, and requirements, costs needs to be simplified and made affordable and accessible for rural people. Contractual arrangements need to be enforced and secured. Allocation should be transparent and fair. There is a need to design such accountability mechanisms to ensure participation of local population in decision making process. It's recommended to review possibility of promotion of community based rangeland management. Wherever possible, its desirable to promote establishment t of community based pasture users' groups with allocation to them some responsibilities on allocation, management, use and protection of these ecosystems. It is needed to view pastures management in connection to serving both as primary as well as secondary users.

Lease arrangements need to be made for longer time period. Competitions need to be arranged transparently with good information campaign and reporting on results.

Fees should be structured taking into account grazing practices, and collection needs to be simplified. Its is imperative to ensure that at least some significant portion of these fees go to pasture improvement activities.

There is a need to develop mechanisms for risk management in raising livestock.

Conflict resolution mechanisms need to take into account acceptable by all social norms and customary law.

73 percent of all interviewed think that there is an urgent need to introduce some strict requirements for pasture use, such as pasture rotation, following and montiroing of pasture carrying capacity norms, and others.

All interviewed think that pasture need investments into their improvements, such as fixing pasture infrastructure (roads, water systems, water points, animal paths, improved constructions for animals and people on intensive and remote pastures).

Pastures are treated by all interviewed as one of the major factors of livelihood of population and lack of them and/or their worsening conditions effect negatively growth of livestock around the country and thus poverty alleviation.

Major Legal Documents reviewed

1. Law of the Kyrgyz Republic on Land, April 14, 1990
2. Land Code of the Republic of Kyrgyzstan, April 19, 1991
3. Law of the Republic of Kyrgyzstan on Land Reform, April 19, 1991
4. Decree of the President of the Kyrgyz Republic on Urgent Measures to Ensure Implementation of Laws of the Republic of Kyrgyzstan Governing Land and Other Relations in Agriculture. November 10, 1991
5. Resolution of the Cabinet of the Ministers of the Republic Kyrgyzstan on remote Pastures used by enterprises of Republic Kyrgyzstan and Republic Kazakhstan, March 2, 1992
6. Resolution of the Government of the Republic Kyrgyzstan on Pasture Areas which are Used Over the Raion Borders, May 8, 1992
7. Decree of the President of the Kyrgyz Republic on Measures for Further Development and State Support to the Land and Agrarian Reform in the Kyrgyz Republic, November 3, 1995
8. Resolution of the Government of the Kyrgyz Republic on Return of the State Forestry Fund Lands, Earlier Given to Agricultural Enterprises for Long Term Use, and Transfer of Kolkhoz and Sovkhoz Forests to the State Forestry Agency, April 15, 1997
9. Land Code, June 2, 1999
10. Introduction of Land Code, June 2, 1999
11. Regulation of the Government of the Kyrgyz Republic on Rent and Use of Pastures, November 29, 1999
12. Forestry Code
13. Resolution of the Government of the Kyrgyz Republic on Introduction of Community Based Forestry Management in the Kyrgyz Republic, July 27, 2001.
14. Law on Management of Agricultural Land, January 11, 2001
15. Law on State Registration of Rights to Real Estate, December 22, 1998
16. Law on State Budget
17. Law on Local Self Government and Local state Administration, September 25, 2003
18. Law on Financial and Economic Basis of Local Self Government, September 25, 2003
19. Government Resolution on Concept on Management of Municipal Property 2004-2006, April 26, 2004.
20. President's Decree on National Strategy on Comprehensive Development of Rural Area till 2010, June 23, 2004
21. Regulation #360 on Pasture Land Lease and Use, June 4, 2002
22. Resolution of the Government on Concept of Livestock Breeding Development till 2010, January 31, 2005
23. Government Resolution on Package of Measure of Development of Villages Located in Forestry Area till 2010, January 20, 2005
24. Government Resolution on Package of Measures on Improvement of Structure and Functions of Local Self Government 2005-2010, January 19, 2005
25. Government Resolution on Package of Measure on Hunting Development till 2010, January 24, 2005
26. Government Resolution on Package of Measures on Environmental Protection, Prevention of Natural Calamities and Emergency Activities in Rural Areas till 2010, January 29, 2005.
27. Government resolution on results of the State Land Inventory as of January 1, 2004, October 7, 2004.
28. Guidelines for monitoring of agricultural land, State registration Agency Order, October 5, 2004
29. Government resolution on regulations for cadastral evaluation of land plots of the Land Fund, September 2, 2004

30. Government Resolution on Strengthening of responsibilities for Use of Agricultural land, April 16, 1996
31. Government Resolution on Functional responsibilities of the State Agency for Registration of Rights to Immovable Property, April 19, 2001.
32. Government resolution on State Program LAND for a period till 2005, August 17, 1998
33. Government Resolution on Ministry of Agriculture, Water Management and Processing Industry, November 29, 2004
34. Government Resolution on Regulation on allocation of pastures and use of pastures, June 4, 2002