

MINUTES

**of a working meeting-workshop on the theme:
“Progress in the project objectives implementation and plan of operations for
the non-growing season”
in the framework of “water productivity improvement at plot level (WPI-PL)” project**

4-5.10.2010

Tashkent city

Participated: 54 people.

Agenda

Monday, October 4:

- 1. Reports of National Project Coordinators for Kyrgyzstan – M. Toktabaev and for Uzbekistan – Kh. Umarov on the current situation in the project this year.**
- 2. National reports on the project progress for 2010 and submitting of plans of operations for the non-growing season.** Reporters: Kh. Khojiev, Sh. Alybaev, Sh. Ergashev.
- 3. Reports on the project progress for 2010 by the project organizations-disseminators and their vision of extension for the non-growing season.** Reporters: S. Isamutdinov, A. Khoshimov, S. Toktosunov, B. Abdyrazakov, K. Kabulov, A. Akhunov, N. Satimbaev/A. Khoshimov.
- 4. Experience of WUA “Tomchikul” specialists in Markhamat rayon on work with farmers.** Reporters: S. Sobirov, Leader of the WUA, and Kh. Fazilov, trainer-agronomist of the project.
- 5. Experience of WUA “Kamiljon Umarov” in Toshlak rayon.** Reporter: A. Ruziev.

The meeting was opened by Mukhamejanov Sh., the Leader of WPI-PL project from SIC ICWC, and after greeting all the participants he gave the floor to Prof. Dukhovny.

In his welcoming report, **Prof. Dukhovny** greeted all the participants and noted that today we have to work in a virtual way that undoubtedly imposes great difficulties on us and our Kyrgyz colleagues, in particular. We hope that sanity should prevail.

The project role can scarcely be overestimated. “Water Productivity Improvement at Plot Level” is considered as a continuation and development of IWRM-Fergana project, and in due time it was a big mistake to separate this component from IWRM-Fergana project to be a specific project. Today, more and more specialists receive evidence that water and land productivity cannot be separated from water management. This is a single complex which we should solve together in an integrated manner and quite clear mutual agreement. The shortcoming which CA suffers from is precisely a gap in water management at plot level and between farms and, further, at higher level. From this viewpoint, IWRM makes efforts to coordinate this all. It does not mean that we have harmonized everything in IWRM already but, at least, we can see where our shortcomings at junction between WUA and a farmer and between canal and WUA are, as these are parts of a common chain, a very complex chain. There is no such a system in the world as in the Fergana Valley where surface water, groundwater and collector-drainage water would be linked. This system where water is supplied from the main feeding systems of the Syr Darya and from 22 small rivers simultaneously which regularly feed these lands in different volumes. Water availability and sustainability also depend on this.

Effective water management should be considered and analyzed through the prism of an end-user. Land and water productivity improvement is the only way to survive.

In recent decades we can see the climate change as a number of extreme phenomena raised. Let us take a hydrographer from 1960 to 1990 and take the same hydrographer of the Syrdarya from 1990 to 2010 as an example. For the recent 20 years we have more extreme phenomena- high waters, droughts- than their number was during the previous 30 years. Their scope has increased, that is very dangerous. And one more important phenomenon - earlier we had more possibilities to manage main networks and main structures beyond water agencies so that to mitigate these phenomena due to long-term regulation of return waters. Now, during the epoch of monetarism and commercial interests, power engineering specialists in particular, it is very difficult to put them out from this position. During the last 10 years we worked in the conditions of water deficiency in the Syr Darya in summer time. If comparing water supply from the Syr Darya from 2002 to this year, now we plan the volume of water to be delivered much less for all the republics since 8 to 10 billion m³ of water goes to the Aral Sea due to winter water release. It is one of the factors which forces to adapt to life under the conditions of water deficiency. 2000-2001 were of low water, 2002-2006 were of high water, so everybody relaxed, and power engineering specialists strenuously sold water from Toktogul. And in 2007-2008, not only Uzbekistan, Tajikistan and Kazakhstan have found themselves at level of 65% of water availability, but also Kyrgyzstan. Branch interests have exceeded interstate ones, the state lost management, but despite this, practically in 2008, we survived more or less as we were engaged in water savings. SFC did not receive about 400 million m³ of water, that water was conveyed for feeding of BAC. We should get used to live under the conditions of low water. Water is getting so expensive that the recent prices required by power engineering specialists are at level of \$0.08 USD per kW, i.e. \$0.085 per 1 m³ of water. They will never be able to cover energy if water productivity is at the current level. Today the average level of water productivity in Fergana Valley accounts for \$0.03 to \$0.05 USD per 1 m³. To learn to manage water productivity and achieve \$0.08 per 1 m³ is considered an important aspect of our project. Also, we should pay special attention to financial sustainability of farmers since their solvency provides WUA solvency.

The principal output of WPI-PL project is to improve water productivity. The level of farmers' knowledge of this question varies, and our challenge is to provide them with scientific fundamental knowledge and help cope with difficulties through arrangement of extension services. Demonstration sites and set up of farmers' schools where it is necessary to show to farmers which results and how they can be achieved on the given land in order to ensure financial and economic sustainability are especially important for this purpose. RESP II project has started its activity in this direction, and today people from this project are here. The coverage area of RESP II is much more than yours, it covers 244,000 hectares. Soon one more similar project on pumping irrigation in the area of 60,000 hectares will start to be implemented in Uzbekistan.

Final task is to provide a methodical basis for sustainable data gathering, to show all work on real facts and to trace that this information has reached the end-user and works. But it is necessary to take into account economic weakness of the branch and limited support from the state. Besides, prices for agricultural products are unstable. Thus, a farmer constantly faces various problems. Our task is to monitor these problems, deviations from technologies, analyze current situation, information in an operative manner and generalize it, find admissible solutions and inform the Government about them which solves them operatively.

One more issue is change of the gender composition. It is required to develop extension specificity for women.

The next year is considered as decisive for the project. It is necessary to pay special attention to such a principal indicator as the coverage area, and decide how to move further.

Mohan Reddy Junna, WPI-PL Project Leader, IWMI: After welcoming all the participants, Prof. Junna also thanked all the participants for that they have come to the workshop in a complete structure and, in particular, the Kyrgyz part considering the situation in the country.

Prof. Junna noted that our objective is to give the Government such a solution that it could give farmers innovation solutions, technologies. It is required to create such a system to fill all farmers' gaps and make sustainable solutions. It is needed to clarify what works and what does not work, share opinions, discuss all achievements and problems openly and, if required, to subject to constructive criticism.

Further, the National Project Coordinators for Kyrgyzstan - Toktabaev M.T., and for Uzbekistan – Umarov Kh.U. made their reports where they emphasized importance of the project and necessity of its follow-up development, and thanked SDC for rendering their assistance and promotion.

Toktabaev M.T., National Project Coordinator for Kyrgyzstan: In his report, Toktabaev underlined that the basic problem of farmers is lack of experience in effective irrigation water use, and also presence of such problems as waterlogging and high level of ground waters. Lack of hydroposts (vodlhozs have no time) and water accounting systems leads to conflicts between mirabs and water users. Therefore, work made by the project – establishment and adjustment of the partnership and interaction system at all levels - is very important.

Due to the project, the system of partner relationships between the various organizations (Water Management Committee, KyrgyzNIIr, Center of Training, Consultation and Innovation, Rural Advisory Service (RAS) and WUA Support Department) has been established. Their joint activity allows assessing current essential problems of farms in an operative manner and giving recommendations on how to solve them. This partnership system has allowed the organizations to carry out the following activities: 1 – maintain constant liaison with farmers; 2 – assess problems of farmers in a regular manner; 3 - introduce scientific research institute developments in farmer's field directly; 4 – purposefully prepare trainers of extension services.

In Kyrgyzstan, the organized approach to of irrigating water distribution in small farm areas is considered as one of the important project achievements.

Such a system of water use allowed farmers of pilot off takes to transfer to volumetric irrigation water payment which in turn allowed to discipline of irrigation water use and raise its efficiency.

The tariff for water was raised from 3 tyiyn to 5 tyiyn by the decree of the Kyrgyz Government. Some WUAs at their meetings raised the tariff to 10 tyiyn. Farmers have begun to complain about high water charges.. Farmers had questions at field level which they addressed to the State Committee for Water Management and the Government regarding the submitted volume of water, water price, water apportioning among farmers when hydroposts are lacking. No one is responsible for these issues at field level today. Rayvodkozes have no power, they supply water from inter-farm canals through a hydropost, and water is practically not apportioned for farmers at plot level. There are numerous examples of mirabs' negligent work.

In the southern areas, heads of rural administrations and some rayon Khakims began to be interested in our project. Batken Oblast Administration addressed to the project executors the request on establishment of an irrigation water management system at farm level in the oblast. The idea of the mentioned project is supported by the Management of the State Committee of Water Resources and Land Reclamation, farmers and water users from other regions of the republic are interested in it. The Management of the State Committee of Water Resources and Land Reclamation suggested to use the approach developed by the project in other oblasts.

In Kyrgyzstan, the organized approach to irrigating water distribution in small farm areas is considered as one of the important project achievements.

Such a system of water use allowed farmers of pilot off takes to transfer to volumetric irrigation water payment which in turn allowed to discipline irrigation water use and raise its efficiency.

Umarov Kh.U., National Project Coordinator for Uzbekistan:

On December 25th, in 2009, some amendments in the Law on Water Use were adopted. Now, it is required to confirm all WUA Charters again. Agreements on water receiving-transfer between the water user and the water supplier have been prepared and will be affirmed by the Ministry of Justice. In comparison with last year, employees on places work well, especially in the Andijan and Namangan oblasts. In the Fergana area there were mistakes when cultivating cotton, cutting off, applying fertilizers, thereafter level of plant diseases caused by insects grew. In Andijan and Namangan oblasts the situation is better due to the Project Manager and information services. Apart from this, it is necessary to note good work in Namangan oblast, they are being involved into the project for 2 years and achieved good results in constructing hydroposts. Cotton was watered well in Andijan oblast only.

Many things were successful, but there are still issues which require solution: work of Farmer's Field Schools (only few FFSs function good). It is necessary to monitor results and how recommendations were accepted. It is needed to prepare recommendations on cotton storing and seeds sowing as soon as possible and disseminate them, study the answer and how they were taken on site. Also, our consultants should train irrigators and keep working on extension of the coverage zone. Farmers need insurance, so economists should include insurance against weather conditions, pests. It is necessary to give two-track advice: from a hydrotechnician as well as an agronomist.

Ergashev Sh., Oblast project coordinator: In his report he noted importance of works done within the framework of the project and aimed at improvement of agricultural activity of farms. A wide range of cases in point solved by the project successfully arouses great interest in farmers and administration of oblasts. In the table, he showed visually the project coverage zone in the three oblasts: Fergana oblast – 4751 hectares, Andijan oblast – 6795 hectares, Namangan oblast – 5298 hectares. The total project coverage zone accounts for 16844 hectares. The project activity is based on coordination of activities and partner relations of various organizations from scientific research institutes to BISAs and WUAs as the basis of advisory activity for farms in the Uzbek part of the project. For today, within the project coverage zone works on training of trainers (trainings, totally 34 trainings were spent and 827 participants were trained), training and consultation for farmers were conducted, monthly bulletins (7600 copies), recommendations (3600 copies), and also booklets (160 copies), publications-recommendations for farmers through mass media – 92658 copies were published and disseminated. Work on organization of activity of field farmer schools is carried out, monitoring in farms and questioning for definition of needs of farmers are carried out. Since 2010, work on full equipping of farms with water measuring devices at pilot WUAs of the project has started. This work is important from the viewpoint of system water use and more precise regulation of water use plans among farms.

Also, he dwelt on studying and analysis of problems among farmers - staffing, agrotechnical, water related, financial and legal problems. He also listed plans for a non-vegetation period: revision of training themes for trainers based on testing results, conducting training of trainers program, keep working with trainers and farmers, adaptation of a daily water distribution method practically, search of water saving agrotechnical methods, care of grains, autumn-winter field activities, gathering yield, tillage, leveling, etc., construction of water measuring and regulating structures, preparation of annual reports.

He finished his report with the following proposals: to assign staff for water accounting in pilot WUAs at the expense of the project (3 employees), to equip pilot WUAs with office equipment

(3 pcs) and a computer for the National Office (notebook), to provide trainers with bicycles (13*2=26 pcs), study of experience of developed countries in the sphere of extension services.

Kh. Khodjiev, the Project Oblast Coordinator, Tajikistan: In the report Khodjiev told about the project implementation in Tajikistan. Activity on knowledge dissemination and experience, and training of farmers is carried out in 6 oblasts of Sogd oblast. The project coverage area is 6657 hectares. Talking about the project achievements this year, he noted the role of the Coordination Council whose purpose is to coordinate work of all partners of the project, arrange clear operative interrelation of partners and involvement of other interested organizations working in the field of providing services to dekhan farms. The basic function of the Coordination Council is to coordinate work of the project executors, control execution of YOP and the project implementation, dissemination of materials of the project to other organizations working in the field of providing services to farmers.

The fact that for today the farmer has indeed realized the necessity of organization of a water accounting system, having felt considerable economic benefit of actual water volume measurement, that in turn positively influences rational use of irrigation water can be considered as the important result of the project and the first step in development of advisory activity with farmers. For this purpose, executors of the project have prepared all necessary documents allowing farmers already in 2010 to pass to contractual system of the water account.

Within the oblast, 116 out of 166 farms transferred to payment for actual water received by means of water accounting. Others are in the process of transition- explanatory work among WUAs is in progress.

Further, talking about positive side of this year, it was noticed that the allocated microcredits for carrying out agricultural works from banks (with help of our consultants), high price for cotton, advancing cotton growing and free sale will allow the farmer to receive good results this year.

Sh. Alybaev, Osh Field Office Coordinator, Kyrgyzstan: In his report S. Alybaev noticed that organization of a water distribution system within small areas of farms at off take level is considered as an important achievement of the project. Unfortunately, the inter-farm network is uncontrolled and it is the main reason of all problems connected with use of water at farm level and inefficient work of WUAs. The method proposed by the project allowed supervising a water supply and water distribution system between farmers' fields and raising water saving at the expense of interest of the farmer in fund savings. Including, it was possible to eliminate disputes concerning water distribution. This system allowed eliminating conflict situations between farmers and organizing water distribution within the off take. Distribution is made based on crop patterns and water volume in the off take head. The leader in the certificate of acceptance-transfer with WUA sees the water discharge which he measures together with the WUA hydrometer. In the certificate of acceptance-transfer, there is measured discharge, date and time. Then the off take leader calculates the area the water received in the off take head can provide. For this purpose, he defines for how many simultaneously irrigated furrows the received water can be distributed. Contractual relations with leaders of off takes are applied inside WUAs.

Six Extension Services were established from Osh RAS within the coverage zone of its organization which worked with off take leaders in close contact on consulting of farmers in effective water use.

Toktosunov S, Regional Manager in Osh RAS, Kyrgyzstan: Dissemination is the role of Osh RAS in the project. This year we trained consultants and farmers in water accounting, and there is feedback control. There was dissemination in 6 demo plots in 4 rayons of Osh oblast. In

Aravan rayon we established 2 demo plots as this rayon is located in the lower part of Osh oblast, and thus there are always problems with irrigation water. Long furrow irrigation (150-200 meters) as well as lack of knowledge in irrigation time, not following irrigation time and agrotechnical measures norms is one of farmers' problems. Following the advice of Osh RAS, farmers started to apply a furrow irrigation method in their fields (50-60 meters) that produced a good result.

Unsolved farmers' problems and needs were listed: purchase of new farming machines, lack of farming machines and equipment, crop rotation is not followed due to small areas, appearing of some problems at transition to volume-based payment for water, high prices for fuels and lubricants, seeds, mineral fertilizers and pesticides, production distribution, low prices for wheat and vegetables.

Also the report included plans for the non-vegetation period, farms activity analysis, economic analysis of farms, planning of farms activity for the next year, teaching of farmers, planning of extension services activity for the next year, preparation of modules, hand-outs and brochures, training of trainers (professional development).

Abdyrazakov B., Head of WUA Support and Development Department, Kyrgyzstan:

Generally, within Osh oblast farmers paid for water delivery services on a per hectare basis. Water use planning from WUAs was made only up to canal level and there are off takes of water users further from the canal. Water delivery rationing for each off take was not made, water discharge for each off take was not fixed due to lack of water measuring devices and hydroposts.

Due to the project, water measuring devices (SANIIRI hydroposts, fixed channel, Tomson weir) were constructed and depth gages were installed at all necessary off takes of a chosen canal. As a result of equipping off takes with water measuring devices we were successful to interest farmers in effective use of water received by them from the off take leader.

The system for measurement of water discharge to a furrow depending on a field slope and taking into account mechanical structure of soils is developed together with Kyrgyz Research Institute for specification of irrigation parameters in farmer's field and their further use.

Monitoring of the existing state of irrigation water use and applied agrotechnical measures in each farm was conducted. On the basis of the prepared forms for monitoring based on a technological scheme of cultivated crops, advisory work with farmers on dissemination of advanced technologies was carried out.

The principal causes reducing efficiency of water were revealed. Two brochures were prepared and handed out for elimination of shortcomings and satisfaction of farmers' requirements in carrying out irrigation and agro-technical measures.

Also, in 2010 the following was organized: a water accounting system at offtake level, along with drawing-up of acts on transfer-acceptance of irrigation water; drawing-up and signing contracts on behalf of farmers on water receiving and volumetric payment for water; request-based water distribution among farmers; all offtakes of pilot canals are equipped with water measuring devices; organization of trainings, workshops and demonstrations; preparation of bulletins, brochures, etc.

In the beginning of the year, the task on dissemination of the project idea at regional level was set to the experts of rayon departments of support. Together with the management body of local authorities (rural district) and WUA, the question regarding introduction of "Sokolok" method at least at one WUA off take beyond the project zone was considered. It was supported in Aravan rayon in Tuyamuyun rural district by 7 WUAs. Four WUAs are introducing the system for organization of transition to volumetric water payment.

Presentation by Isamutdinov S., Head of Advisory Service IAC , Tajikistan: 161 farms in Spitamen, J. Rasulov and B. Gafurov districts of Sogd region are covered by the project zone. The total coverage area consists of 4623 hectares. In Spitamen and J. Rasulov districts 2 demo plots were selected and equipped.

At the beginning of the year, monitoring of farmers' needs and requirements on polling sheets prepared by research institutes is being implemented, which are then transmitted to the Information Center. Further, at the Information Center according to the monitoring results training topics are being compiled for training of trainers-distributors. Trainers transfer to farmers the acquired knowledge in addition with their own experience. The trainers themselves are trained at the Information Center. If farmers have issues or problems that can not be solved by themselves, the trainers make a request to Research Institute (Giprovodhoz) and obtain through the Information Center (SOF) a simplified version of the answer, and convey it to the farmer (feedback is being executed), i.e., the following cycle is covered: farmer - developer – Information Center –farmer.

The results of the project achieved in 2010 are the following: the farmers have realized that for improving profitability it is necessary to apply the volumetric method of irrigation water, and 25 farms have stated regarding installation of water measuring devices, farmers began to trust the recommended agro- and hydro-technologies and trainers' advices, and farmers themselves have begun to offer a seminar topics and to ask for advice from trainers. For interaction with partners and cooperation with other organizations national coordinator holds monthly meetings with all partners, and during these meetings the current progress of the project objectives and prospects for the coming month are discussed. And at the beginning of each week a workshop of partners aimed to experiences exchange and solution of acute topical issues are held. The workshop is of rotating character with the field visits. To exchange experience with other projects initiated by SEANS-TACIS, the delegation from Kyrgyzstan, Tajikistan and southern regions of Sogd visited the demonstration field Buri Kurmas and familiarized themselves with the means of water metering and water accounting.

Negotiations in terms of cooperation are being conducted. Work plan for the non-vegetation period is as follows: consultation and supervision when selecting sites and installing the water measuring devices in the farms, conducting six training seminars for farmers on arrangements of agro- and hydro-technical issues to be implemented in winter-spring period, a publication of agro- and hydro-technologies in 8 regional and local newspapers, provide training to enhance communication and methodological skills of trainers and consultants, monitoring and evaluation of the agro- and hydro-technologies proposed by farmers, office processing and analysis of the material, and writing the annual report.

In the WUA “Nurafshon” all farms are being equipped with hydro-gauging posts. The equipping aim is to provide the effective allocation of irrigation water at the level of the WUA and the efficient use of irrigation water in the farms. For this purpose, non-growing season will become a period for training of WUA “Nurafshon” specialists to compose plan of water use if gauging stations on farms are available- water allocation and water distribution in the vegetation period on the basis of existing gauging stations. Training of farmers to study water accounting system is planned.

A computer program for crop production taking into account the diversity of indicators is being developed. It is the “thinking” program in contrast to the other ones (as style of 1C account program). But its development is expensive. The program can be developed in 1-2 years or more if we do it by ourselves. If, however, we hire a designer and programmer, then the program development will take about 6 months. First, the program will be adapted to conditions in Tajikistan, and later to other countries. The program can give the best advice for obtaining maximum yield.

Presentation by A. Khashimov, Head of Advisory Service, Zarzamin, Tajikistan: In his report Khashimov commented that Zarzamin has existed since 2007 in Soghd region. In the first year the project scope was 1600 hectares, in total there were only 22 private farms. This year we have made a wider coverage, which amounted to more than 2600 hectares. Looking at these figures one can see how much the project has influenced and enhanced the interest of farmers to water metering. Farmers did not know that track of water could be kept, and the interaction between water suppliers and farmers has been chaotic. During the project implementation farmer's outlook has changed. Today, farmers are already litigating with provincial authorities. Sometimes the consultant fee is given in kind of crops (according to contract per cent). Such precedents are available. As you may have heard during presentations of our partners the doors of all banks are opened for farmers in Tajikistan, but, unfortunately, the money available is at very high interest rates. That is very burdensome for farmers presently. Our consultants test the farmers in the banks for loans. Our consultant reduces the bank risks and gets for this a small percentage. Solving this problem, farmers began to create camaraderie, informal groups, establish their own fund in the amount of 10000 to 30000 Somoni (\$ 10,000), and during general meeting they determine the interest rate, which ranges from 15% to 18%, which is essentially below the bank's rate.

There are investors ready to buy bio-cotton at their price, but it is one of the ways for a farmer to the the product market. There are committees which collect fines for failure of land use. Our consultants have proposed to sow "soflok, and received an excellent result (1 creamery was established). There must be an agronomist in the WUAs. Our experience has shown that in case of other structure's absence, the WUA needs an agronomist and hydrotechnician: these are 2 key figures, and they should not work separately.

Presentation by A. Akhunova: It was noted that the counseling system of farmers through WUAs consultant-agronomist and consultant-hydrotechnician has been set up. On the basis of farmstead in Marhamat district jointly with Minvodkhoz, a site for training of farmers was created, new hydro-gauging posts of different types have been constructed. Jointly with SANIIRI pilot studies to select the irrigation technique have been conducted (soil sampling for mechanic analysis was done, flow into furrow and furrow length were defined).

Farmers tested modern farming methods at the demo field "Gulshan Ahtachi" WUA "Nishonbay Kambar", a very rich harvest of cotton has been received.

Agenda:

Tuesday, October 5

1. Records of information centers on work performed in 2010 within framework of the project and plans to conduct training for trainers and training of farmers in non-growing season. Reporters: D. Islamova, P. Zhooshev, M. Mirzaliyev and A. Kamolitdinov.

2. Progress Report of Research Institute concerning project objectives in 2010 and the presentation of plans for non-vegetation period. Reporters: A. Atakhanov, A. Usmonov, O.Nasonov / A.Abirov.

3. Agro-melioration certification of farms (for example, the WUA Akbarabad). Reporter: S. Nerozin.

4. Work of Water-Land Commission. Reporter: N. Mirzaev

5. Progress Report on equipping pilot WUAs by hydro-gauging posts. Speakers: R. Masumov and K. Jumabayev

6. Dual-rate tariff of WUA. Presentation by N. Gaipnazarov.

7. Discussion of further progress towards project objectives and proposals on the main subjects for training sessions during non-growing period in terms of equipping pilot WUAs and farms with hydro-gauging posts and drip irrigation system.

Report of Islamova, SOF, Tajikistan: The main activities of the Information Center is development of information exchange and coordination of joint activities of partners, information processing, to make it available for a specific audience, preparing analytical and other materials, consultations, training seminars, etc.

The Centre operates on three components: education, information and counseling. The educational activities of the center aims to conduct training sessions for trainers-distributors of partner organizations "Zarzamin" and IAC, trainers are tested, and learning level of each participant is determined.

If the earlier activities of the center were aimed at increasing farmers' knowledge for conducting irrigation, water accounting, agricultural and technical arrangements, then in 2010 the themes affecting economic and gender aspects of private farmsteads based on the survey of farmers' needs were included in the work of the center.

In recent years, the main agricultural works have been carried out by women, because men have migrated for work. Even after men's return the situation has not changed since men do not have those connections and experience, which women have already gained. Likewise, our consultants are working on technologies which would decrease manual labor since all manual labor in agriculture is done by women.

To share experiences and provide with the simplest technology for effective using and measuring volume of irrigation water 3-day exchange visits on the topic: "Effective use of water at the field level" were implemented with organizations such as SENAS, Welthungerhilfe, "Saodat", KIS, ZOKI. Plan of activities scheduled for the non-growing season by information center, training subjects and a list of informational materials were discussed with partners and were based on needs of farmers and distributors. This list will be supplemented by data from surveys of farmers, after each accomplished training and monitoring of private farmsteads by project specialists from all partner organizations.

Presentation by P. Jooshev, an expert on irrigation from ZOKI, Kyrgyzstan: In his report Jooshev opined that FFS should be not only seasonal, they should be year-round, i.e. from plowing to marketing. 50% of the trainings are conducted in the field. Two innovative technologies have been developed: irrigation of rice on furrows, mixed irrigation of tomatoes with sweet corn. The downside is that not all farmers still realize that water should be measured. There is a form of assessment to detect perception and satisfaction of farmers, which is to be filled.

Achievements of the project are the following: collaboration of partners, receiving timely information about the problems of farmers. The timely receipt of necessary scientific developments and technologies, and timely resolution of issues and problems considered as topical for today. Trainers have learned to fill the registers of water metering: farmers who have received knowledge from the trainers-distributors, developed their own innovations.

Presentation by M. Mirzaliyev, the Head of Fergana Information Center, and A. Kamolitdinov, specialist of Andijan Information Center, Uzbekistan: In their report, the partners informed about the work accomplished in 2010, and spoke regarding plans to conduct training for trainers and training of farmers in non-growing season. They made a detailed account of progress: the trainers learned to cooperate with farmers; monitoring of agricultural

work on use of irrigation water is established and perfected; contacts with farmers located around demo plots are established; interest of farmers in counseling and recommendations prepared by Information Center is growing. Work in terms of setting up and developing activities of FFS is being implemented within 13 WUAs (separate rooms have been allocated, they were provided with visual aids and handouts). Farmers (irrigators) began to positively accept guidance and counseling prepared by the Information Center, the transformation of research findings into plain language understandable by farmer, identifying the appropriate distribution strategies and teaching approaches to transfer technology to farmers.

In WUAs “Tomchikul”, “K. Umarov”, “Soliev” farms are being equipped with hydro-gauging posts. The equipping aim was to provide effective allocation of irrigation water at the level of the WUA and the efficient use of irrigation water in the farms. For this purpose, non-growing season will become a period for training of WUA specialists to compose plan of water use if hydro-gauging posts on farms are available; water allocation and water distribution in the vegetation period on the basis of existing gauging stations. Training of farmers to learn water accounting system is planned.

Presentation by **A. Atakanov, Head of Kyrgyz Research Institute group, Kyrgyzstan:** We have already possessed the duly established AS. Our task is to develop recommendations and make them understandable for the farmer. Our archive at Research Institute contains a lot of materials which we use for our recommendations. Nine recommendations have been issued this year. Farmers were assisted in introducing technical account facilities of irrigation water through practical display, and how to mount hydro-technical fixtures on their irrigated areas:

- A device of pin furrows and registration of water through a triangular weir (Thomson) (20 pieces have been transferred)
- Improvement of polyethylene containers of 50 cm length for rationing of water in furrow irrigation (100 pieces have been transferred)
- Calibrated polyethylene tubes of 55 cm length for rationing of water in furrow irrigation (125 pieces have been transferred)
- Napkins (50x50 cm size) of plastic film for reinforcing the beginning sector of irrigation furrows from erosion have been provided.

The specified irrigation equipment has been purchased (produced) and delivered to the demonstration farm plots to equip irrigated plots by water measuring equipment and water distribution facilities. A practical demonstration of water measuring and water metering devices' installation has been made. According to request of trainers additional three recommendations for crop management technologies have been developed. Due to lack of funding (from March up to present funding is not available) implementation of additional trips to farm sites, unfortunately, was impossible. However, the work did not stop, it was continued by communicating via telephone and e-mailing to trainers, consultants, irrigation specialists, and data collecting and processing assistants. The program works of Kyrgyz Research Institute scheduled for 2010 were fully implemented, except for the introduction of irrigation on impounded bands and fertilizing using fertigation method, i.e. introduction of water-dissolved fertilizers.

Plans for the non-growing season are as follows: the 1st - writing the annual scientific and technical report, the 2nd - the final harvesting, the 3rd – assessment of commercial products, the 4th - water resources assessment, the 5th - a general analysis of the results of new irrigation technologies application and crop management, etc.

Report of S. Nerozin, a specialist project RESP II: To date, we have developed a passport for the field of whole WUA in Kuva district, WUA “Akbarabad”. Also, we gave them the cultivation technology of cotton and wheat, adjusted for soil and land-reclamation features. The farmers have a great interest in the elaboration of field passport. Each passport cost about \$10-15 per hectare, and farmers agreed to pay such amount of money.

Presentation by S. Sobirov, Head of WUA “Tomchikul” from Marhamat district, and H. Fazilov, trainer- agronomist: WUA “Tomchikul” was established in 2006 after the collapse of a large farm with area of 1300 hectares. Watering is carried out by adding local fertilizers. The communication “WUA - farmer - MTP – Information Center” has occurred with assistance rendered by the agronomist in the WUA. The position of agronomist should be introduced into the WUA staff, and he should help to farmers in water distribution, for example, regarding the issue of moisture charging. Hydrotechnician and agronomist make the round visit of the WUA within 2 days, give advice on watering. After their visits the MTP is involved. But before that, the farmer submits two applications: one application to the WUA and another one to MTP. Seminars are held once a month, but sometimes they are held twice a month, topical issues are discussed during these seminars. The equipment is not enough in WUAs. Therefore, there is no possibility to carry out land leveling. Water for 1 hectare costs 15 thousand Soum, but now the price has risen up to 18 thousand Soum, because extra 3 thousand Soum is paid for the work of an agronomist. Agronomist is working all year round. Following the recommendations the crops were treated with ammonia, and the yields increased.

Presentation by A. Ruziev, the Head of WUA “Komiljon Umarov” of Toshlak district: since July 11 the construction of hydraulic structures in the WUA “Komiljon Umarov” has been continued, which is scheduled to be completely equipped with 50 hydro-gauging posts. It should be noted that even today after construction of 50% hydro-gauging posts we can say that the construction of hydro-gauging posts promotes to automatically solve water allocation problems and eliminates conflicts between farmers.

Director of the WUA suggested sharing experience of the daily water allocation, and the experience and materials concerning the treatment with ammonia, that is cheaper.

Presentation of R. Masumov - At present about 60% of hydro-gauging posts were constructed for WFM component.

Outcomes:

I. Good communicative interaction has been set up between partners through the establishment of the **Coordinating Council**, first in Tajikistan, then in Uzbekistan in terms of the implementation of key actions in accordance with YOP, activities coordination and involvement of other interested organizations engaged in the sphere of providing services to farmers, an information flow between them has been organized.

Recommended: to accomplish analysis of the chain how far this system affected improvement of water productivity.

II. Approach towards the choice of trainers proved to be effective. To identify problems, needs, knowledge and services, our trainers-distributors established close contact with farmers, primarily due to the fact that they live directly in areas where they conduct individual counseling.

Consultations have been competently organized in accordance with the needs of farmers in conjunction with specialists from research institutes.

Recommended:

1 – the report should be added by registry of our trainers' visits, which should indicate not only when and what recommendations were given, but in case of their failure to indicate the reason.

2 – it is necessary to regularly implement monitoring of the trainers' knowledge level;

3 - to certify Information Center within the project.

III. This year, taking into account the agro-melioration arrangements (routing), the themes have been competently identified and a schedule of training for trainers has been structured, implementing further training of farmers through field seminars, which were also involved by experts from other WUAs and farms, as evidenced by the minutes.

IV. Recommendations have been promptly prepared on the basis of the proposed technologies of IWRM, archival materials of research institutes and accumulated practice materials of partners from advisory services (for example, Osh RAS, IAC) that address specific local areas in the zone of the project, which have been simplified and translated into national language.

Recommended:

1 – publications should be done not only as informational ones but should also be more vivid, and issued in user-friendly format.

2 - for the prompt information exchange between partners of all the republics every information center must provide regional group with all published brochures for web publishing site.

V. Not all is well with the establishment of Farmer Field Schools (FFS) - there is no common understanding of how it works, either it is the center for the eradication of illiteracy among farmers in the agricultural and hydrotechnical issues so to speak from A to Z, or it is the kind of counseling center / services, which still has not the clear model. For the present it is clear that consultations should be paid.

Recommended:

1 - a plan for FFS must be developed, a step by step trainers' work with farmers is needed.

2 – P. Zhooshev will be appointed as a focal point for the Farmer Field Schools (FFS), and within a month he will be responsible to develop and provide principles and requirements for FFS, based on the current situation and data-oriented on Osh RAS.

3 – to develop a clear model of Advisory Services.

VI. It is necessary to develop a program to produce a crop programming, taking into account the diversity of indicators.

VII. All materials, presentations of meeting should be placed on the project website CAREWIB.

VIII. Analyzing all results of this workshop the project activities can be positively assessed, as a basis for further development of project ideas and elaboration of future plans for further improvement and adjustment of the achievements for a maximum impact both in terms of the coverage and in terms of the content (to practically solve farmers' problems as much as possible).

IX. In the middle of 2011 Evaluation Mission will be held for which we should be ready.

Regional Manager of
WPI-PL Project

Sh. Mukhamedjanov