

Organisation, management and financing of water and wastewater sector in the Republic of Armenia (RA)

1 Organisation of water and wastewater sector in RA

1.1 *Main directions of the Government policy in the water sector*

During the last years large-scale structural reforms are being implemented in the water supply and sanitation (WSS) sector of Armenia. Recently the new Water Code, which complies more with International standards was adopted. In accordance with the new Water Code all water resources in Armenia are state property.

Based on the RA Government Resolution No. 92 dated February 9, 2001 On Water Systems Management Reform, legislative, structural and organisational reforms, as well as financial rehabilitation programs will be implemented that should produce phased results in 2001-2004, and 2005-2009.

The program is based on the following elements:

- Water and sanitation services improvement;
- Regular and high quality water supply based on zoning and sectioning of water distribution networks;
- Restructuring of the housing-municipal services management system;
- Introduction of water consumption metering and water losses reduction;
- Effective use and conservation of water resources and key assets of WSS sector,
- Transition of Vodocanals into commercial utilities that operate with financial autonomy;
- Implementation of activities aimed at establishing condominiums for improvement of user charges collection.
- Environmental protection activities

1.2 *Water sector management*

In order to optimize water resources management, to increase effectiveness of reforms and to improve the tariff policy, **the State Water Committee (SWC)** under RA Government has been established according to RA Government Resolution No. 92 dated February 9, 2002. This Committee is implementing Government policy in water systems use and management.

The most important decisions are actually made by **the State Water Committee**. In particular in accordance with the Statutes, the Committee:

- participates in the development of national water programs and water demand assessment;
- fulfils the duties of the state management in the implementation of investment programs;
- provides preliminary appraisal of project documents concerning facilities that have impact on water systems;
- controls the arrangement of works related to non-competitive water systems; presents proposals to the Regulatory Commission concerning permits for water systems use, tariffs regulation etc.

Therefore for important decisions (setting of objectives, enterprise managers assignment, developing and approval of target programs, capital investment programming etc.) the **RA Water Committee** may submit proposals to the Government for consideration.

1.3 the organisational structure and responsibilities

Allocation of responsibilities between main actors WSS sector is presented in the Figure 1.

1.4 Obligations of main actors and legislative documents regulating their relations

RA Government Resolution No. 147 dated March 13, 1999 specified **the Rules of Water and Wastewater Systems Use**, as well as model agreements to be concluded between communities (served by one of the Vodocanals) and customers. These agreements form a basis for mutual relations between main actors of WSS sector, and state their rights and obligations.

The utilities/JSC may operate water and wastewater system based on the contracts concluded with communities and work directly with WSS services consumers.

The Rules of water and wastewater systems use regulate the legal relations in WSS sector between operators and customers, limits of responsibility for networks and facilities operation, equipment installation and operation conditions, drinking water supply and wastewater discharge volumes measurement, water and wastewater quality assessment, calculation of payments for the services, WSS services interruption, and other rights, obligations and responsibilities of the parties.

The above mentioned decision was amended in RA Government Resolution No. 55 dated January 24, 2002, basically in relation to the specification of calculation of water volumes and water meters installation procedures.

Every year the Government by special Resolution establishes a list of customers requiring regular water supply. Water supply is carried out based on contracts. Issues related to households non-payment are under discussion in the RA Government. Non-payment from other categories of customers is regulated by the Governmental Resolution No. 149 On fines and include possible water supply disconnection.

1.5 Legal grounds for ownership of engineering infrastructure of WSS sector

According to RA Government Resolution No. 149 of 13. 03 99, the basic rules of water use and model agreements for free use of key assets of WSS sector were adopted. The above decision implicates **Vodocanals to use the networks being under the communal ownership on the contractual basis in the form of free of charge use. At present, water distribution networks are transferred under Vodokanals' ownership, by proposals from a number of communities.**

Communities' governments are legally directly responsible for water and wastewater services, but **do not fulfil their obligations in practice**. Despite this fact, the communities on their territories closely cooperate with WSS utilities.

1.6 Institutional set-up and key actors of the WSS sector in the RA

The two large specialised utilities are responsible for water supply to the settlements, namely, Armenian odocanal CJSC (Armvodocanal) and Yerevan vodocanal CJSC (Yervodocanal), which serve about 80% of RA the population.

Drinking water is abstracted from good quality groundwater sources. Water supply and sanitation services provision in the rest of the 450 villages is under responsibility of local authorities (communities) and is carried out by means of independent local systems. Till 2003 water in the most of the settlements was supplied according to a schedule: from 2 to 6 hours per day.

Armvodocanal CJSC was established in 1971 and its head office is located in Yerevan. It was transformed to a specialised state enterprise in compliance with the Law on Enterprises of 1990. Till 2001 Armvodocanal has been subordinated to the Ministry of Urban Planning. The utility was transferred to the State Water Committee in 2001.

Armvodocanal CJSC is responsible for operation and protection of water and wastewater systems in 47 towns (except Yerevan) and 250 villages, in the biggest part of these settlements Armvodocanal also operates distribution networks under relevant agreements concluded with local authorities.

Yervodocanal CJSC is responsible for water supply and wastewater discharge in the capital, as well as operation and protection of water and wastewater systems in 52 villages located near Yerevan. Since the end of 1997 Yervodocanal is operated by a private company based on a management contract.

Objectives and aims of Yervodocanal and Armvodocanal are stated in their statutes specifying fields of activities, the founder's objectives, rights and obligations, management and executive bodies, financial and economic performance control, as well as conditions of reorganisation and liquidation. Armvodocanal and Yervodocanal act on the basis of RA Government Resolution No. 440 of 17.05.2001 and RA Government Resolution No. 690-A of 23.05.2002 respectively.

Operational responsibility limits: water supply utilities (vodocanals) are responsible for water delivery up to the internal plumbing of the buildings¹. In case paid by the consumers, the buildings are equipped with water meter (or several water meters if required) to measure water supply volumes in the building and to register monthly consumption. Based on the obtained data population pays for water and wastewater services (WSS services).

Armvodocanal and Yervodocanal in their zones of water supply (except of those distribution networks where water is supplied in bulk volume) are responsible for repair, maintenance and integrity of fixed assets. The responsibility for infrastructure is laid upon local authorities in the rest of the 450 villages.

In 1999 Armavir and Metsamor cities, 10 communities (some other villages are expected to join in the nearest future) and the state established the joint stock company - JSC "Nor-Akunk" - on water supply and wastewater discharges.

The rest of the villages (about 440) are responsible for their local water supply and distribution systems. Water supply sources in these villages are water sources and irrigation pipelines.

With respect to other economic agents providing public communal services (including energy and gas supply etc.) they operate on the basis of contractual relations with communities and population under control of the appropriate authorities

¹ There are 11181 multi-stores buildings in Armenia, 3835 of which are managed by condominiums. In Yerevan 58% of residential buildings are covered by condominiums that makes system more transparent and well guided.

1.7 Private sector participation in water and wastewater services provision

WSS services in RA are provided by **Armvodocanal CJSC, Yervodocanal CJSC and Norakunk CJSC**, as well as by individual communities and rural administrations. In order to create a competitive environment, in compliance with the water legislation, the governmental decisions stipulate conditions under which water systems can be handed over for management agreements (concession, lease or entrusted management). There are different forms of private sector involvement – a minor participation envisages e.g. payments collection and more comprehensive involvement as the entrusted management and privatisation.

A competitive operation of water and wastewater systems in RA has created an effective ground for water sector reforming. As mentioned above, Acer & Company Armenian Utility S.C.AR.L has been managing Yervodocanal since 2002. The Armvodocanal management contract has been prepared in 2003, the tender is announced, and the results are expected in 2004.

The agreement on the Sisian Branch was the first step towards privatisation of water sector management in compliance with RA Government Resolution No. 440 of 17.05.01. The Agreement basically stipulates functions of the operator related to current performance management (water supply and wastewater discharge), but doesn't include participation in capital investments management.

The new Water Code foresees the operator's selection criteria including presentation of the entrusted management program, which should implicate technical and professional capacities of the potential operator, proposed works and feasibility study of the works.

1.8 Staff capacity in the water sector

The total number of Armvodocanal staff in 2002 amounted to **1272** persons. Yervodocanal's staff number in 2002 was equal to **1458** people, the average number of employees over the previous years was **1540** people. According to the available data, one employee serves 96 consumers – this level is very low compared to international standards. **The average wage** is very low - 312.0 th. Dram (540 \$) a year. At present the average wage is 58 th. Dram/month.

Armvodocanal has the following staff allocation: administrative personnel - about 26%, supply personnel - 16%, distribution personnel - 21%, production personnel - 19%, the rest goes to other types of activities. The share of administrative personnel is considerable and amounts to up to 40% of the wage fund.

Age distribution of the staff is the following: 25 and younger - about 5%, 25- 35 years old - 14%, 36-45 years old - 25%, 46-55 years old - 28%, 56-65 years old - 14%, 65 and senior - about 10%. The average age of the personnel is 47 years, meaning that the staff mainly consists of senior people.

By seniority the staff is distributed in the following way: 5 years and less – about 73%, 5-10 years - 16%, 11-20 years - 4%, 20 years and more - about 7%.

Staff composition of Yervodocanal is similar.

2 Water production and consumption volumes

2.1 Access to water supply services, and volume of water delivered to distribution network

The households coverage by water and wastewater services is given in the Table 1.

Table 1 Water supply coverage

| | 2001 | 2003 | 2006 | 2009 | 2012 | 2015 |
|---------------------------------------|------|------|------|------|------|------|
| Centralized water supply, % | | | | | | |
| Urban population | 87 | 90 | 93 | 95 | 98 | 98 |
| Rural population | 45 | 47 | 49 | 51 | 70 | 70 |
| Regularity of water supply, hours/day | | | | | | |
| Urban population | 8 | 10 | 12 | 14 | 24 | 24 |
| Rural population | 14 | 16 | 18 | 20 | 24 | 24 |

Source: Poverty Reduction Strategy Paper of the Republic of Armenia

Dynamics of water delivered by Armvodocanal and Yervodocanal is presented in the table below:

Table 2 Water volumes abstracted by Armvodocanal and Yervodocanal (mln. m³)

| Years | Armvodocanal | Yervodocanal |
|-------|--------------|--------------|
| 1999 | 141.9 | 431 |
| 2000 | 168.2 | 431.2 |
| 2001 | 159.3 | 407.1 |
| 2002 | 144.0 | 394.8 |

Source: ArmVodocanal and Yervodocanal

Water consumption volumes in 2002 are presented in the table 3 below.

Table 3 Water consumption volumes in 2002 by consumers' categories

| | Armvodocanal | Yervodocanal |
|--------------------------------------|---|--------------|
| Water users | Water consumption volume, mln. m³ | |
| Households | 56.4 | 76.9 |
| Budget financed organizations | 3.9 | 5.3 |
| Other | 5.6 | 26.8 |

Source: Armvodocanal and Yervodocanal

The above tables show that the households/population constitute a major consumer group, which is equal to about 95.5% of total water consumption volume of Armvodocanal and 78% - of Yervodocanal. Water consumption per capita in RA varies from 44 to 183 l/day, and 115 l/day on average, which is much lower than the established norm - 250 l/day approved by RA Government Resolution No. 55 from January 24, 2002.

2.2 Water consumption accounting and norm-setting and losses assessment

RA Government Resolution No. 55 of 24.01.2002 states water services billing procedures. Due to a lack of water consumption calculation system based on water metering data, water consumption volumes are estimated based on established norms. As the delivered water volumes are not always metered, it is very difficult to estimate unaccounted-for water and water losses. Water pipelines are heavily depreciated causing high water losses. According to local experts assessments, unaccounted-for water and water losses may reach 55-65% of the total volume of water delivered to the network. And in the earthquake zone this indicator exceeds 60%.

Water consumption volume is estimated based on norms under condition of twenty-four-hours water supply. Therefore, actual water consumption volumes do not correspond with the estimated volumes. Water consumption norms used by Armvodocanal and Yervodocanal for tariffs calculation are equal to 250 l/day/person in Yervodocanal service area and 200 l/day/person in Armvodocanal service area (this is also stipulated in RA Government Resolution No. 55 dated 24.01.2002). The established norms are very high compared to water consumption volumes in Western Europe.

The targets defined for WSS sector in the Poverty Reduction Strategy of the Republic of Armenia include inter-alia installation of water-meters in households aimed at improvement of rational water consumption. As of the 1st of November of 2003, 76.4% of consumers in Erevan installed water meters and 92% of total number of consumers signed an agreement on debt restructuring. Thus Armenia made a great step toward measuring of actual volumes of water consumed. The short-term aim is to complete the program on individual meter installation, the focus will be on poor families. Water consumption metering is a good instrument for poor families to mitigate to a certain extent further tariff increases. However it is evident that most of poor families cannot afford the purchase and installation of meters (in many cases more than one meter per apartment are needed). Therefore, The Government has to consider options on provision of assistance to poor families. The Japanese Government grant of USD 1.9 million aimed at municipal development could be used for this purpose.

2.3 Procedures of billing and payment for water supply services

Water services billing procedure is established by RA Government Resolution No. 55 of 24.01.2002 and water supply and wastewater discharge rules. According to the procedure, settlements with consumers are made based on metered water volumes and tariffs, and in case the tariffs are not applied – based on norms and the existing tariffs. Consumer and responsible representative of the utility conclude the statement on water consumed, quality and quantity of wastewater discharged, based on which a payment bill is prepared and presented to the consumer. Billing procedure for buildings not equipped with water meters are regulated by the relevant rules.

Consumers pay for water and wastewater services through the bank account under conditions stipulated in the agreement. The consumer must pay for WSS services within 10 days after the bills are received, and in case of independent payment – within terms set in the agreement, the advance payment is also admissible with subsequent recalculation based on actual data.

3 Tariff policy, tariffs level and Vodocanals revenues

3.1 Tariffs calculation and approval

The Water Code introduces the concept of a regulated tariff due to the shortage of water resources, as well as the need for consumers' provision with minimal required water volumes of the appropriate quality.

RA Ministry of Town-Planning determined legislative background for Armvodocanal CJSC, introduced with RA Government Resolution No. 34 dated March 31, 1998 (changed and amended on May 7, 2001). According to this document, the objective of the utility is production and sale of drinking water and treatment of wastewater. This activity should be carried out as a "commercial activity" aimed at profit earning. The existing structure and level of WSS tariffs are established by RA Government Resolution No. 256 dated July 9, 1997.

Tariffs setting and collection rules for Yervodocanal are also envisioned in the legislation, the same regards Armvodocanal (changes and amendments to the Resolution of April 11, 2001).

The tariffs setting is under responsibility of the shareholders. **There are no specially established tariffs setting rules and procedures in fact**, and the tariffs can be changed upon preliminary agreement with the Water Committee. Tariffs planning principles are similar for all Vodocanals in order to ensure equality between all consumers. The principles of tariff planning are similar for all Vodocanals, that grants equality among all consumers and to separate water and wastewater tariffs' setting process. After **approval the tariffs become equal for all consumers**. The Water Committee is empowered to change tariffs, if it is deemed necessary. In case the water consumption is not metered, Armvodocanal and Yervodocanal use the established norms. Water consumption norm for Yervodocanal consumers is 250 l/day, Armvodocanal - 200 l/day. Thus, the daily water consumption norm for each apartment is equal to 250 l/day multiplied by a number of persons living in the apartment. Based on assessments almost a quarter of the total population of Armenia is not living permanently within the Republic, and thus is not paying for WSS services, i.e. not contributes to fixed cost coverage.

The introduction of a two-rate tariffs consisting of a fixed part to be paid by consumers monthly independent of volume of water consumed and of a variable part depending on actual water consumption, could be a solution under present circumstances.

According to **RA Water Code** tariff setting functions can be handed over by the Government to an independent body – now it is the Commission on Regulating public services (responsible for WSS tariffs regulation since 01.01.2004).

3.2 WSS tariffs dynamics in 2000-2002

WSS tariffs have not been changed during 1998-2002: 1 m³ of water in Yerevan costs 46 Dram, waste water discharges amounts to just 10 Dram - 56 Dram in total. The average monthly charge based on consumption norms is equal 420 Dram per person.

In other regions of Armenia the average household cost of 1 m³ of water is 41.33 Dram, for other consumers – 45.5 Dram. The waste water discharge tariff is unified and amounts to 10.51 per 1 m³. Monthly payment per person makes up 311 Dram.

All consumers categories pay similar tariffs, with the exception of the settlements in Armvodocanal service area supplied by Yerevan network (the tariff amounts to 30 Dram per 1 m³ - this tariff was adopted by Yerevan Administration together with the Ministry of Finances and Economy of RA).

WSS tariffs do not include full depreciation (the depreciation included in tariff is many times less than that obtained after inventory of WSS fixed assets in 2002), otherwise it would lead to sharp increase of the existing tariffs level. The established tariffs cover current costs and include some profit. If the payment collection rate is low, the utilities sustain considerable losses.

3.3 Revenues, payments collection level and structure

Vodocanals revenues for the services provided and payments collection rates are presented in the table 4 below.

Table 4. Vodocanals revenue in Armenia in 2000-2003 (9 months)

| Indicators | Armvodocanal | | | | Yervodocanal | | | |
|------------|--------------|------|------|------|--------------|------|------|------|
| | 2000 | 2001 | 2002 | 2003 | 2000 | 2001 | 2002 | 2003 |
| | | | | | | | | |

| | | | | (9 m.) | | | | (9 m.) |
|---|-------|--------|--------|--------|------|------|--------|--------|
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 |
| WSS services payments | 1 255 | 1538.8 | 1655.4 | 1239.6 | 1202 | 1616 | 2372.4 | 2016.7 |
| Estimated cost of the services provided | 4 101 | 3845.2 | 3305.7 | 2384.4 | 6421 | 6058 | 5720.6 | 3608.1 |
| Payment collection level (%) | 30,6 | 40.1 | 50.1 | 52 | 18.7 | 26.7 | 41. | 55.9 |

Source: the Ministry of Finances and Economy of RA

It should be noted, that non-monetary settlements (set-offs) constitute a minor share in Vodocanals revenues structure.

4 Subsidies and allowances to housing and communal sector utilities

Financial support to housing and communal utilities in RA has been considerably changed during the last years. For instance, subsidies are not provided to gas supply system as it had been privatised. There are no mechanisms of subsidising waste collection and other utilities, as they operate based on agreements concluded with communities.

Subsidies and allowances to **Vodocanals** can be granted to communities to compensate subsidies provided by RA state budget, and depending on local communities' financing capacity, i.e. communities themselves establish the amounts to be granted to the utilities.

Amount of subsidies provided to WSS utilities is determined based on financial assessment of the current year performance results and financial flows. Forecasted financial flows of the utilities are the basis for the specific reservation of funds in the budget and further transfer to the appropriate structures officially representing the relevant sector or to the shareholders.

The tariffs fully cover the current costs and even include some profit, but **the low level of payments collection** does not profitable operation. The state allocates about 800-1200 mln. Dram annually to cover the current financing gap of Vodocanals.

Data on budget financing of HCS and WSS sector in RA is presented in the table 5.

Table 5. HCS financing from RA budget in 2000-2002 (including subsidies)²

| Indicators of HCS financing from RA budget in 2000-2002, mln. Dram | Republican budget (planned in the approved budget) | | | |
|---|---|---------------|----------------|----------------|
| | 2000 | 2001 | 2002 | 2003 |
| HCS financing, total: | 8129,2 | 8287,9 | 12240,3 | 34377,3 |
| Including: | | | | |
| Allowances and subsidies to cover current losses and current expenditure financing in HCS sector | 1277 | 837 | 1499 | 3101,7 |
| ... of which: WSS sector* | 1277 | 837 | 1499 | 2745,0 |
| Armvodocanal CJSC | 721 | 560 | 1229 | 810 |
| Yervodocanal CJSC | 556 | 227 | 270 | 1935 |
| HCS capital costs financing, including target programs, total: | 6852,2 | 7441,9 | 10741,3 | 31275,6 |
| Of which: WSS sector | 2612,7 | 4073,2 | 7457,1 | 10556,7 |

Source: the Ministry of Finances and Economy of RA

² The state budget of RA 2000-2003.

Actual financing of HCS from the republican budget in 2000-2002 was 12765.5, 4978.1 and 7823.7 mln. Dram, respectively.

Note: expenses for HCS in 2000 amounted to 5.2% of total budget expenses, in 2001 - 3.3% of total budget expenses, in 2002 - 4.7%, and 10.2% is approved for 2003.

5 Measures to improve user charges collection efficiency

The low collection rate of user charges from households has been observed in all Vodocanals in 2001. It varied from 10% (in Erevan) to 47% (in Alaverdi). The situation with payments collection improved notably in 2002, especially in Erevan – (increased up to 42% comparing to 27.5% in 2001). This positive trend followed the initiative of the RA Water Committee managers, who stimulated more interaction of Yervodocanal with non-paying customers and initiated public awareness campaign in mass media. This campaign involved publishing of materials, articles and booklets explaining the importance of water saving and regular payment for WSS services which would make it possible to provide twenty-four-hours water supply in Yerevan.

In order to provide a principal increase in collection rates, a change to metered water consumption in most cases and to clear Yervodocanal's balance (restructuring of amounts payable and receivable) a Law was adopted, which envisions restructuring and writing-off a considerable part of Yerevan population debts for WSS services, under condition of conclusion of an agreement between the household and Yervodocanal. It also envisages water meter installation and timely payment of current bills. The deadline for signing such agreements was the 9th of April.

The compliance with this regulation allowed to create a clear contractual relationships between utilities and WSS services consumers that should ensure further improvement collection rates.

The possibility of writing-off old debts was a strong incentive for most of the population. The signing of agreements began on January 20, 2003. At the beginning of 2004, most part of 296.6 thousand of consumers signed such agreements, and 234 thousand meters are installed. 262.8 thousand of Armvodocanal users out of a total of 357.1 th. signed agreements, and 84.5 th. water meters are installed. The meters installation already influenced the collection of current payments, e.g., it is visible though Ervodocanal indicators.

The collection rate (excluding clearing of liabilities from previous years) for 9 months of 2003 for both Armvodocanal and Ervodocanal reached 54%.

A difficult issue was the signing of agreements when inhabitants are absent from the country. The solution has been found in authorising (power of attorney) a relative or a neighbour to conclude the agreement and to install a water meter.

In order to speed-up the meter installation process, people are able to initially pay just 50% for the water meter, and the remaining amount can be paid within next 6 months. The meters installed are sealed with a polygraph stamp, the violators will be legally responsible for its crippling.

The payments of disciplined consumers, who paid for water in 1998-1999 will be reckoned as prepayment. These consumers are few in number - about 3-4 thousands out of 267 th. consumers. This allows the state to encourage such consumers and therefore to demonstrate its moral support to law-abiding and honest citizens.

It is important that the process of the agreements signing allowed specifying the number of consumers. The point is, that during 90-ies many newly built houses have been connected to water supply systems illegally. Yervodocanal did not adequately registered such data, and these buildings' residents had no willingness to do this.

Agreement signing and water meters installation process is very active in apartment buildings and very slow in private residential houses, though they have a much higher level of water losses and unaccounted-for water. Therefore, Yervodocanal's policy is definitely aimed at water meters installation in private houses. It will allow to save a huge volume of water. The households without water meters will have to pay depending of the pipe diameter, which will be 10-15 times more expensive than estimated cost of 420 Dram.

During the debts restructuring process within 2000-2002 the consumers are expected to pay only 3 bil. Dram of the total amount of indebtedness equal to 22 bil. Dram. The rest 19 bil. Dram are written-off.

In case this approach aimed at increasing Yervodocanal revenues and the mobilisation of funds to be allocated for Yerevan water system rehabilitation and modernisation is proven effective, it can be replicated for other cities and towns and other types of HCS services.

6 Planning and financing of capital investments in WSS sector

6.1 Medium- and short-term capital investments: volumes of 2000-2002, 2003 and financing sources

Procedures for the development of state investment programs³ and implementation in Armenia has not been developed and formalised yet. Recently the main focus was directed towards program implementation, but not application of specific approaches for the development of new programs.

At present, medium- and short-term investments are planned for the medium-term expenditures program being an integral part of the budgetary process. In the frameworks of this process, concerned ministries and agencies prepare three types of documents:

- the document containing description of a state body's expenditures in the relevant sector,
- the medium-term program of the expenditures of the relevant state body,
- the document reflecting the strategy.

In 1995-2000 major investments of the country were financed by the World Bank (WB) within the credits' programs. WB financed 64% of capital investments in water sector. Share of investments financed by RA Government and other financing sources constitutes 30% and 6% respectively. Presently, the following credits programs are implemented in RA:

a. **1st RA communities development program:** the Creditor is the International Development Association (IDA). The program has to be implemented from 19.06.1998 to 30.06.2004. Total cost is **USD 35.5 mln.**, including IDA loan - USD30 mln. and RA funds – USD5.5 mln. **In the frameworks of this program the water supply system rehabilitation in Erevan is implemented, functions on operation of Yervodocanal CJSC were handed over to the Operator** with a great international experience (in ACEA Sp.A Italian company). The terms of loan - 10 years of grace period and repayment within 30 years, at 1% annual interest rate. **75% of financing amount is already disbursed.**

³ The state investment program is as well-known as the development budget is.

b. Two Programs on water and wastewater systems rehabilitation in Armavir, Shirak (Gumri) and Lorij (Vanadzor) regions are prepared. The total cost for both programs is **EUR40 million**, including two loans from German Bank KFW (Kreditanstalt For Wiederaufbau) in total amount of **EUR36.5 million**. The loans conditions are 10 years of period of grace and repayment within 30 years, at 1% annual rate. It is anticipated to implement the programs from 12.09.2001 to 31.03.2007. The Credit Program aimed at the water supply and wastewater systems improvement in Armavir region is implemented with a support from German Government through the KFW Bank. The Program covers area with 112 th. inhabitants. It is implemented by Nor Akunk CJSC (the Operator) – 34% of stocks belongs to RA, the rest - to municipalities of Armavir and 11 villages. WSS sector infrastructure is a share of the Capital Stock (34%). The KFW in cooperation with a number of communities and the State participates in shares stock management. The task of the Operator is to implement the investment program and loan repayment.

c. The Program on water and wastewater systems modernisation in Armenia with a total cost of **USD41.2 million, including a loan in amount of USD35 million** is under elaboration. The Creditor is The Creditor is the International Development Association (IDA). The advance payment in amount of **USD1.32 million** is allocated (including, **USD1.195 million** from IDA and **USD125 thousand** – the RA contribution) for preparation of the **Water and Wastewater Program**. In the frameworks of the Program, the Adviser to act till 2003 was selected. His duties include preparation of the documents required for implementation of the **Program on water supply and wastewater collection, as well as preparation of management contracts and tender documents for Armvodocanal Operator selection**.

d. The 2nd Program of Municipal Development with a total cost of USD50-55 million, including the IDA loan in amount of USD45 million is under elaboration. The Program will be implemented in 2005-2009, it anticipates rehabilitation of wastewater collection and treatment system, including a reconstruction of the aeration station in Erevan.

Such level of a budget funding and attraction of loans for capital investment financing in WSS is a very high for CIS and is evidence of solid determination of the RA Government to improve situation in WSS sector.