

Conclusion

General Description of Situation

The ecological state of the Republic of Armenia was unfavorable still in Soviet times. The development of resource- and power consuming industries, weakly equipped cleaning plants, application of extensive agricultural methods, lack of systems for neutralization and waste development etc. had a negative impact on the environment. Such cities as Yerevan, Vanadzor, Hrazdan, Alaverdy, Ararat, Kajaran, Agarak, became sources of biosphere pollution. The ecological condition of Lake Sevan basin has worsened and its water has been intensively used for irrigation and energy purposes.

The Republic experienced some changes in 80-90s: a number of cleaning plants, as well as Arpa-Sevan tunnel were built and significant work was done on afforestation of the territory. However, the condition still remained alarming particularly in terms of the high level of air basin pollution in the cities and disposal of the radioactive waste of nuclear power station of Armenia.

The socio-economic crisis of the transition period, aggravated blockade and energy crisis of the 1991-1995s deteriorated the ecological condition of the country. The water of Lake Sevan again began to be released for meeting the energy needs of the country, forests were massively cut, land degradation process was liven up and desertification risk increased.

Later, a number of industries were closed in the country, which brought to decrease in air basin pollution level in cities. However, the situation is still alarming partly because of the increase in car number and decrease in public electrical-transportation means, as well as sharp reduction of green zone areas, especially in Yerevan. In the result of closing the industries, there was consequently decrease in volume of industrial waste water. However, the pollution of water resources is still immensely threatened by the disorder and malfunctioning of cleaning plants- at present waste water is only mechanically cleaned, and even this is done only partially.

Environmental policy and reasons for modern trends

Currently some stabilization and economic growth of the socio-economic situation are to be observed in the country. More importantly stirring up of economy should base on the principles of the sustainable development, without harming environment and, on the contrary, promoting it's improvement, contributing the natural processes restoration.

After independence Armenia has joined a number of international environmental conventions and in this regard a general activity is launched - national reports prepared, action plans developed.

NEAP is developed and approved, a special program on restoration of ecological balance of Lake Sevan is accepted, an environmental legislation, adapted to the new economy is being formulated, and "polluter/user pays" principle is inculcated. The same time, in spite of a number of positive changes, situation is complicated in whole and the following factors favor it:

- Extremely high social costs of transition period, resulted in impoverishment of the significant part of population, surviving due to overexploitation of natural resources;

- Legal nihilism, manifested in the failure to execute environmental legislation, mainly from the newly formulating business sector;
- Implementation crisis of the majority of the tuned projects, plans and programmes due to lack of financial assets;
- Weakening of ecological monitoring systems;
- Town planning policy, carried out in new economic conditions, conflicting with the principles of sustainable development and contradicting environmental priorities
- Weak concernment of international investors in ecologically sound industry;
- Insufficient public awareness on environment, including the decision makers level;
- Insufficient stakeholder involvement into the process of environmentally sound decision making.

Recommendations on activization of ecological actions for sustainable development.

This report contains special chapters, which present detailed recommendations on the improvement of the situation in all sectors. Below summarized versions of recommendations are set on reorientation activities to sustainable methods of demands and industries, reducing anthropogenic impact on environment, contribution to restoration of natural resources:

- Improvement of financial-economic mechanisms promoting sustainable nature use: introduction of waste-free, little waste creating and energy-efficient technologies, waste treatment and utilization, activities promoting the restoration of natural resources and protection of environment;
- Formation of ecological funds of national and local importance aimed at implementation of ecological projects and programmes;
- Improvement of legislative-normative basis in the sphere of environmental protection with a focus on norms and instructions on rational nature use;
- Strengthening and development of complex ecological monitoring, introduction of complex ecological assessment systems (indexes for atmosphere pollution, water resources, lands etc);
- Provision of correlation between town-planning practice (especially in Yerevan) and developed and announced projects in the country in regard to Habitat principles;
- Optimization of institutional relationships between national and local authorities on controlling urban development;
- Provision of reconstruction of irrigation nets, hydro-technical structures, pumping stations and deep wells, strengthening and reconstruction of water reservoirs, exploitation of collector-drainage nets;
- Completion of construction activities and exploitation of hydro-technical structures of River Vorotan, which will provide an opportunity for annually throwing additional 165 mln m² water to Lake Sevan;
- Implementation of activities in light of the project on restoration of Lake Sevan ecological balance;
- Restoration and expansion of cleaning plants, introduction of modern technologies for sewage water cleaning and circulation of water-supply;
- Strict follow-up and maintenance of sanitary norms for water use and water discharge;

- Introduction of dust and gas-purification modern systems and clear technologies;
- Review the policy on transportation for cities (especially in Yerevan), introduction of operating mechanisms stimulating reduction of emissions to the atmosphere, realization of complex measures in this sphere;
- Implementation of complex measures on reduction of ozone layer destroying emission;
- Prevention of future degradation of lands, restoration of green zones in cities, restoration and expansion of zones of multilevel functional greening;
- Development and implementation of programs on adaptation to prognosed climate change;
- Development and implementation of a national strategy on limitation of greenhouse gas emissions, as well as development of sinks and accumulators, application of modern technologies in this sphere;
- Provision of control on disposal of wastes in the environment, development of a modern system for collecting, utilization and interment of hard, household and industrial wastes;
- Implementation of special complex of measures on prevention and decrease of environmental pollution from toxic and radioactive wastes;
- Optimization of agro-meliorative activities for increasing effectiveness of agricultural industries, prevention of development of erosion and other negative processes, especially on slopes, re-cultivation of degraded and eroded lands;
- Reorientation to sustainable methods for agricultural industries (minimization of use of pesticides, herbicides, inorganic fertilizers, introduction of organic and ecologically acceptable methods for protection of plants and increase of soil fertility);

- Application of most effective, ecologically safe complex methods of outputs and development of useful minerals, excluding super-normative losses, combination of mineral raw material and selective resource treatment;
- Exclusion of non-justified damages to exploitable and neighboring deposits, as well as protection of cavities in depths, formed during resource conservation;
- Optimization of economic mechanisms oriented on sustainable use and conservation of biological (in-situ and ex-situ) and landscape diversity of the country;
- Passportization of bio-resources (particularly of forests), permanent monitoring of species and ecosystems;
- Restoration and expansion of forest covered areas, forest belts and plantations;
- Strengthening and improvement of protected areas management;
- Formation of a net of SPAs as an “ecological net” or as a “framework of territory’s sustainability”;
- Strengthening and development of formal and informal ecological education systems for awareness increase aimed at ensuring sustainable development;
- Provision of wide access to ecological information, integrating interested people to decision making process of ecological importance;

Conclusions

The recommendations set in the present document will be possible to implement only with joint efforts by the state structure and civic society, which will be targeted on integration of principles of ecological sustainability into sector policy, and socio-economic development policy as a whole.