1. The state of Lake Baikal in 2013 hasn't changed significantly and the quality of its waters has been remaining stable for decades and exceeds the requirements for waters used for drinking purposes. Lake Baikal is the largest (23 thousand cubic kilometres) freshwater body on our planet, its volume amounts to seven-year flow of all Russian rivers and three-year flow of all rivers of Eurasia.

Lake level. In 2013 favourable useful inflowing stream conditions developed for water-level control of Lake Baikal. Water-level indicators were within the long-term annual average values.

As of 01/01/2013 the average water level of Lake Baikal amounted to 456.46 m (according to the Pacific system of heights), i.e. 0.07 m higher than during the previous year and 0.03 m above the long-term annual average level (long-term average value - 456.43 m (PS).

Pre-flood drawdown of the Lake Baikal water level in 2013 continued until 3rd May to the mark 456.04 m (PS). The lake started to fill up on 4th May and the admission of water continued until 30/09/2013; the water level mark reached its maximum value of 456.80 m (PS).

The drawdown of the lake that started on 1st October, 2013 continued through to the end of the year and later on. As of 31st December, 2013, the water level decreased to 456.46 m (PS), i.e. 0.07 m higher than the long-term annual average value.

In 2013, during the lake filling period, the water-level indicators were within the long-term annual average values due to the escapage discharge control.

In 2013 no deviations of the Lake Baikal levels, defined by the Government Decree of the Russian Federation dated 26/03/2001 No. 234 "On the limit values of the water level in Lake Baikal in the implementation of economic and other activities" have been registered. During the period between 1999 and 2012, the water levels of Lake Baikal were maintained within the established limits of 456.00-457.00 m (PS). The values close to the minimum limit levels were observed in 2001 (456.01 m), in 2003 (456.02 m) and in 2008 (456.05 m). The values close to the maximum limit levels were observed in 2001 (456.94 m), in 2004 (456.92 m) and in 2008 (456.93 m).

The observations of the surface layer and water column in 2013 were carried out by the Baykalsk Centre of Hydrometeorology and Environmental Monitoring of Roshydromet (Federal Service for Hydrometeorology and Environmental Monitoring of Russia) during the spring-summer and summer-autumn periods as follows:

- within the 250 square kilometres lake area adjacent to the Baikal Pulp and Paper Mill - one hydrochemical survey (March);

- in the control 100-metre section - seven surveys (from March to October);

- in the Southern Baikal port areas (Baykalsk port, Baikal port, Vydrino port, Kultuk port and B. Goloustnoye port, from March to October);

- in the Northern Baikal in the area adjacent to the Baikal-Amur Mainline route - one survey (October);

- near the source of the Angara River - one survey (September);

- in the area of the Selenga Shallow Waters - one survey (September).

No observations were conducted by Roshydromet organisations in any other areas of the lake-scape.

The 46% decrease in the volume of wastewater from BPPM in 2013 compared to 2012 contributed to the improvement of Lake Baikal water quality in the area of control section located 100 m away from the deep dispersive wastewater outlet of BPPM.

In 2013 the anthropogenic impact of port areas in the southern part of the lake (Kultuk settlement, Baikal settlement, Vydrino village, B. Goloustnoye village) on Lake Baikal increased in comparison with 2012 (with regard to some ingredients - by 50-80%), while in the area of influence of Baikal-Amur Mainline route it decreased compared to the previous years of observations. An increase of average concentrations of oxygen in the water up to 10.9 mg/L has been observed in the Northern Baikal.

Bottom sediments. Hydrochemical and geochemical monitoring of groundwater and bottom sediments, carried out in 2013, when compared to observation during past years, revealed a number of improvements with regard to many high-priority indicators. At the same time, the total area of contaminated bottom sediments at depths up to 350 m in the area of the BPPM wastewater discharge, calculated according to integrated indicators, amounted to 6.2 square kilometres (in 2012 - 5.5 square kilometres, in 2011 - 5.4 square kilometres, in 2010 - 4.3 square kilometres and in 2008 - 5.2 square kilometres).

In the area of influence of the Baikal-Amur Mainline route no changes were observed in the state of bottom sediments and groundwater in 2013 compared to 2004, 2006 and 2007. The zone of the greatest contamination is confined to the north-western part of the surveyed area. In the area of the Selenga Shallow Waters the values of hydrochemical and geochemical indicators obtained in the framework of the groundwater and bottom sediments monitoring in 2013 didn't exceed the long-term annual average values.

Fish fauna and population of Baikal seal (nerpa). Currently, a decrease of the total biomass of all morpho-ecological groups of omul can be observed from 20.5-26.4 thousand tonnes (1982-2005) to 16.6-21.4 thousand tonnes in 2006-2013. Natural fluctuations in the number of individual morphological groups of Baikal omul result from variations in the number of generations. Ichtyomass (quantity of species) of omul in 2013 has been identified at 16.6 thousand tonnes (in 2012 - 20.2 thousand tonnes), while the biomass of the commercial part of the herd (commercial size fish) was 5.4 thousand tonnes (in 2011 - 6.8 thousand tonnes). During the observation period (1982-2013) the ichtyomass of omul changed from 16.6 to 26.4 thousand tonnes. In 2013, the total number of spawning Baikal omul species, coming into spawning rivers amounted to 2.0 million species, i.e. more than twice less than long-term annual average value - 4.2 million species. The lowest for the last 30 years number of spawning omul was recorded in the Upper Angara River - 1.0 million species. The main reason for the sharp reduction in spawning population of omul is the general reduction in the reserves of this morphological group and illegal catch of pre-spawning aggregations during the summer period. The decline in the reserves of omul in 2006-2013 compared with the indicators of 1982-2005 is causing concern among fisheries specialists. It is proposed to adjust the total allowable catch for 2014-2015 up to 1.500 tonnes (TAC approved in 2014 amounts to 1,750 tonnes and in 2013 - 1,800 tonnes).

According to the official data, in 2013 all users of water biological resources extracted 1,140 tonnes of omul in Lake Baikal and its tributaries. Actual catch of omul, taking into account expert estimation of unaccounted catch, exceeded the statistical data by 64% and amounted to not less than 1,870 tonnes (in 2012 – 1,900 tonnes), i.e. 103.9% of the approved total allowable catch. Thus, 39% of the omul catch in 2013 was illegal (in 2012 - 37%, in 2011 - 25%). The decline in illegal fishing can only be achieved through the means of enhanced control over the catch and improvement of the social and economic situation in the region. Assessing the dynamics of the volume of omul catch for the last 10 years, an increase in the volume of the official catch of omul in recent years should be noted, after the adoption of new Fishing Rules for Baikal Fishery Basin in 2009 (order of Rosrybolovstvo (Russian Federal Fisheries Agency) dated 07/04/2009 No. 283).

The total population of Baikal seals (nerpa) in 2013 (108.2 thousand animals) compared to 2012 (97.4 thousand animals) increased and continues to remain at a high level in the course of the recent years. In total in 2013, according to official statistics, 1,755 seals were caught. Given the illegal hunting, the removal amounted to 2,300-2,800 animals and caused no negative influence on the population.

Rivers flowing into Baikal. In 2013 hydrochemical monitoring by the organisations of the Irkutsk and Zabaykalsky UGMS (Hydrometeorology and Environmental Monitoring Department) of Roshydromet, similarly to the previous year, was conducted in 33 rivers flowing into Lake Baikal and in 16 first and second-order tributaries, flowing into the Selenga River. 482 water samples were collected in 49 surveyed rivers in 2013 (in 2012 - 487 samples).

In 2013 there was a slight 7% decrease in the total water flow of five major rivers of Lake Baikal basin. The flows of the rivers Barguzin and Turka decreased by 10%, the Upper Angara River - by 45%, the Tyya River - by 18%. The flow of the Selenga River increased by 9%. The flow changes in recent years don't exceed the limits of the long-term annual average fluctuations.

In comparison with 2012, the ingress of pollutants into the lake from the 5 most surveyed rivers (Selenga, Barguzin, Turka, Upper Angara and Tyya) increased in 2013 with regard to suspended solids - by 24%, cumulated value of dissolved mineral substances - by 12% and oil products - by 31%. The ingress of volatile phenols, synthetic surface active substances and copper into the lake decreased significantly (by 55%, 80% and 36 % respectively). The ingress of easily oxidizable and resistant to oxidation organic substances, resins and asphaltens remained almost at the same level.

Selenga remained the main supplier of the controlled substances in the lake. The contribution of the Selenga River in the ingress of various pollutants ranged from 88% (suspended solids) to 55 % (synthetic surface active substances) of the amount of the ingress of these substances with waters of the most surveyed rivers (Selenga, Barguzin, Turka, Upper Angara and Tyya). In general, the results of hydrochemical monitoring of the tributaries of Lake Baikal in 2013 showed that the influence of the Selenga River on the lake with regard to all indicators, except

for synthetic surface active substances and phenols, increased within the Central ecological zone of BNT (Baikal Natural Territory).

Based on the observations carried out in 2013, the water of the tributaries of Selenga, Upper Angara, Tyya, Barguzin, Turka and Maksimikha within the sections of rivers located in the Central ecological zone of BNT contained no isomers of HCH (hexachlorocyclohexane), DDT (dichlorodiphenyltrichloroethane), DDE (dichlorodiphenylethylene) and DDD (dichlorodiphenyldichloroethan).

Groundwater. No significant changes in the underground hydrosphere of the Baikal Natural Territory were detected in 2013 as compared to 2012.

The Baikal Pulp and Paper Mill remains the most considerable source of groundwater pollution endangering the waters of Lake Baikal in the Central ecological zone of BNT. Here, in the flow of contaminated groundwater, moving from the production shops to Baikal, there is a high content of specific to pulp and paper production pollutants and, periodically, the total mineralization of groundwater, despite the operation of intercepting water intake. Volumes and areas of slurry-lignin waste of pulp and paper production, polluting the groundwater, are growing along the coastal line.

Meanwhile, the groundwater in the Selenga River basin is bearing maximum anthropogenic load in the buffer ecological zone of BNT. The main polluters are the Selenga Pulp and Cardboard Plant, the industrial enterprises of the city of Ulan-Ude, Gusinoozyorsk industrial hub and Dzhidinsky Tungsten-Molybdenum Plant idle since 1997.

Endogenous geological processes. Intensity of dangerous endogenous geological processes in the Baikal region in 2013 was low. Over the last 10 years of observations, the year 2013 exceeds only the previous year, when the minimum value of total annual seismic energy was recorded, while the values of 2008, when the maximum value of this indicator was recorded, exceeds the 2013 values by more than 500 times.

In order to forecast potential earthquakes in the Baikal region, seismic activity monitoring was carried out as well as monitoring of recent tectonic movements by means of GPS geodesy as well as monitoring of hydrogeodeformation (HGD), gashydrochemical (HGC) and geophysical (natural impulse electromagnetic field of Earth) fields. The existing monitoring system for dangerous endogenous processes requires certain improvement and development.

Exogenous geological processes. Exogenous geological processes caused the greatest negative influence in 2013 on linear structures and settlements located in Kabansky, Muysky, Barguzinsky, Ivolginsky, Tarbagataisky, Zaigrayevsky, Bauntovsky, Bichursky, Yeravninsky, Kyakhtinsky, Mukhorshibirsky and Khorinsky districts of the Republic of Buryatia. The greatest damage resulted from landslides, ice and cryogenic heaving of soils.

The currently existing in BNP network of sites, monitoring hazardous exogenous geological processes, is insufficient. The results of the observations provide only fragmentary data on the mode of dangerous exogenous processes in certain territories. In order to obtain more sophisticated data, required to enable the preparation of a reliable forecast on the development of hazardous exogenous geological processes within the entire area of BNT, the number of observation sites shall be increased by several times.

Mineral resources and subsoil use. The scope of subsoil use within the Baikal Natural Territory in 2013 decreased compared to 2012. In 2013 15 licenses were issued within the BNT boundaries (7 in the Republic of Buryatia, 6 in Irkutsk region and 2 in Zabaykalsky Krai), 20 licenses were revoked (8 in the Republic of Buryatia, 7 in Irkutsk region and 5 in Zabaykalsky Krai).

Currently or previously developed mineral deposits continue to make a significant impact on the environment. Severe contamination of the Modonkul River by tailing dumps and drainage waters of idle Dzhidinsky Tungsten-Molybdenum Plant in Zakamensky district of the Republic of Buryatia continues. In the framework of the Federal Target Program "Protection of Lake Baikal and Socio-economic Development of the Baikal Natural Territory for 2012-2020", 4,142.4 million Rubles were allocated for the elimination of production wastes of the Dzhidinsky Tungsten-Molybdenum Plant. As a result of the works carried out in 2011-2013, 4.4 million tonnes of man-made sand were removed.

No systematic monitoring of the impact of coal mines near the town of Gusinoozyorsk on the environment has been conducted yet, where, after the cessation of mine pumping, a recovery process of depression cone could be present, and a possibility exists for the development of the flooding process in built-up areas. It is necessary to create Supervisory monitoring network to assess changes in the condition of groundwater and exogenous geological processes in this area as well as safety of surface and underground water intakes for drinking water purposes. Similar problems also exist in the zone of influence of the Tugnui Open-pit Coal Mine (Petrovsk-Zabaykalsky district of Zabaykalsky Krai).

Migration of hydrocarbons. The hydrocarbon systems of Lake Baikal are under-investigated and may be hazardous. It is necessary to intensify works related to the geological surveying and monitoring of dangerous manifestations of the processes associated with hydrocarbon migration. The results of scientific research in the field of hydrocarbon systems of Lake Baikal, published in 2013, address the study of the species composition of fauna found in the bottom areas with natural petroleum seeps, the study of territorial distribution of hydrocarbonoxidizing microorganisms in the waters of Lake Baikal and their ability to process petroleum hydrocarbons that enter the lake through natural oil seeps as well as the study of distribution and mechanisms of formation of gas hydrate deposits at the bottom of Lake Baikal.

Lands. Overall, some insignificant redistribution of land between categories took place within the Baikal Natural Territory in 2013. These changes relate to all categories of land: settlements land (an increase by 2.5%), reserve lands (a reduction by 0.4%), agricultural (a reduction by 0.1%), industrial (an increase by 0.03%), specially protected areas (an increase by 0.01%), water reserve lands (a decrease by 0.003%) and forest reserve lands (a decrease by 0.001%). The majority of changes occurred through the inclusion of reserve lands to the agricultural land category.

Forests. In 2013 the area of BNT covered with forest vegetation increased in total by 1,476.3 thousand hectares (by 6%) and amounted to 25,248.5 thousand hectares. In the Republic of Buryatia, the relevant area increased by 14%, in Zabaykalsky Krai - by 0.13% and in Irkutsk region - by 0.002%.

In 2013 the calculated felling rate of mature and over-mature forest stands in BNT decreased by 2% and amounted to 15,875.4 thousand m^3 . In 2013 the felling volume for mature and over-mature forest stands in BNT amounted to 3,739.2 thousand m^3 and increased by 1% in comparison with 2012. In Irkutsk region, the felling volume increased by 8%. In Zabaykalsky Krai this volume decreased by 14%, while in the Republic of Buryatia - by 4%.

The improvement felling volume decreased in comparison with 2012 by 26% and amounted to 25.6 thousand hectares. In the Republic of Buryatia the decrease amounted to 29%, in Zabaykalsky Krai - to 16% and in Irkutsk region - to 6%.

In 2013 the sanitary and recreational activities were conducted on an area of 13.98 thousand hectares (in 2012 - 16.6 thousand hectares).

In 2013 the number of fires decreased by 9% compared to 2012 and amounted to 988 fires. The total area affected by fires decreased by 80% compared to 2012 and amounted to 33.2 thousand hectares.

Climatic conditions. In 2013 the average annual temperature in BNT was close to the long-term annual average values despite the significant temperature anomalies observed during some months of the year; only in the southern part of Irkutsk region the average annual air temperature was above average by $1-1.5^{\circ}$ C.

2. Anthropogenic impact on the environment of BNT in 2013 was as follows:

- emissions to the atmosphere - 456.4 thousand tonnes (in 2012 - 483.7 thousand tonnes, in 2011 - 380.7 thousand tonnes). Over recent years, an increasing trend for emissions from stationary sources in the cities and towns of EZAV (atmospheric effect ecological zone) has been observed. In 2013 no extremely high pollution of air was registered. The cities of Irkutsk and Ulan-Ude, Petrovsk-Zabaykalsky town and Selenginsk settlement remain in the priority list of cities and towns with a very high level of air pollution. The level of pollution in Shelekhov and Cheremkhovo towns was high, while in Angarsk and Usolye-Sibirskoye towns it was identified as elevated. Similarly to the previous year, the 2013 level of air pollution in the Central ecological zone of BNT - Baykalsk and Slyudyanka towns and Listvyanka and Kultuk urban-type settlements was characterized as low. Air pollution in the industrial centres on the Baikal Natural Territory continues to be high;

- wastewater discharges in the central and buffer ecological zones of BNT - million m^3 (in 2012 - 461.5 million m^3 , in 2011 - 400.5 million m^3 in 2010 - million m^3 and in 2009 - 335.5 million m^3). Enterprises of the Republic of Buryatia and the Baikal Pulp and Paper Mill accounted for 99.1% of the wastewater discharge volume

in 2013. The volume of discharge and waste generation in the Central ecological zone of BNT declined markedly due to the discontinuation of pulp production by the Baikal Pulp and Paper Mill in September 2013;

- generation of production and consumption wastes in the Central and buffer ecological zones of BNT - 110.07 million tonnes (in 2012 - 83.5 million tonnes, in 2011 - 70.4 million tonnes, in 2010 - 33.1 million tonnes and in 2009 - 33.4 million tonnes). The amount of generated waste increased mainly due to the increased overburden and coal production of OAO Razrez Tugnuysky and OAO Coal Company Bain-Zurhe, engaged in the development of Gusinoozyorsk brown coalfield.

The area of the Baikal Pulp and Paper Mill. In 2013 the Government of the Russian Federation adopted a resolution on the closure of OAO Baikal Pulp and Paper Mill. On 14th September, 2013 the main production activities, associated with the production of sulphate viscose pulp, discontinued. In 2013 the production volume amounted to 24.8 thousand tonnes of pulp.

The discharge of waste waters from the treatment facilities of OAO BPPM into Lake Baikal in 2013 amounted to 20,470 thousand m^3 (in 2012 - 37,920 thousand m^3). The decrease in the discharge volume compared to the previous year amounted to 17.45 million m or 46.0%.

The volume of air emissions of the Baikal Pulp and Paper Mill in 2013 amounted to 3,321 thousand tonnes (in 2012 - 5,486 thousand tons). In comparison with 2012 the total emissions of polluting substances decreased by 39%, of sulphur oxides - by 45% and nitrogen oxides - by 40%. The commercial production was reduced by 63% over the year.

Nearly 40 thousand tonnes of waste was generated on OAO Baikal Pulp and Paper Mill in 2013 (in 2012 - 73.1 thousand tonnes). Two landfills with a total area of 154 hectares were allocated in order to store wastes accumulated during the period of its operation, where both active and retired sludge- lignin tanks are present. The total accumulated volume of waste exceeds 6 million tonnes.

Taking into account the groundwater condition observations at the industrial site of the Baikal Pulp and Paper Mill in 2013, it is evident that tense ecological situation still continues. In order to eliminate the source of pollution in the coastal zone, it is necessary to construct the following stage of catching water intake structure closer to Lake Baikal. In the area of the Baikal Pulp and Paper Mill it is necessary to revise the production control methodology, placing focus on the study and analysis of hydrogeodynamic characteristics of the pollution source to adjust further activities for its localization and elimination.

In accordance with the decisions of the Interdepartmental Commission on Protection of Lake Baikal, OAO Baikal Pulp and Paper Mill, together with OOO VEB Engineering, need to ensure the observance of the legislative requirements in the course of the preparation of a hazardous production facility to conservation and liquidation.

Baikal-Amur Mainline route zone. The condition of the environment around the Baikal-Amur Mainline route zone, located within the boundaries of BNT, remains satisfactory. In 2013 no environmental emergencies, sewage volleys or emergency discharges and emissions into the atmosphere were registered. The emissions from stationary sources into the atmosphere decreased by 0.007 thousand tonnes. In 2013, similarly to the previous years, the negative impact of discharges of Severobaykalsk town on the water of Lake Baikal was insignificant. The amount of generated waste increased by 62.4% compared with 2012 (decreased by 14.5% compared to 2011).

Other natural and anthropogenic facilities. In 2013 the intensity of groundwater pollution within the territories of Ulan-Ude and Nizhneseleginsky industrial hubs, similarly to the previous years, remained high.

The contamination of groundwater of low-powered quaternary and lower cretaceous aquifers at the sites of Gusinoozyorskaya GRES (hydroelectric power plant) (ash ponds, industrial site and auxiliary facilities) continued within the territory of Gusinoozyorsky industrial hub.

The facilities of the idle Dzhidinsky GOK (Mining and Processing Plant) - rock dumps and tailing pits continued to affect the surface water and groundwater within the territory of the Zakamensky industrial hub.

3. Measures aimed at the protection of Lake Baikal taken in 2013 were as follows.

Statutory regulation and coordination of Lake Baikal protection. In the course of 2013 two sessions of the Interdepartmental Commission on Protection of Lake Baikal (hereinafter- the Commission) were held. As a result of the Commission work, the following activities have been excluded in 2013 from the list of

activities prohibited in the Central ecological zone of BNT by the Government Decree of the Russian Federation dated 28/02/2014 No. 159:

- bottling of drinking water from Lake Baikal;
- processing of wild plants, vegetables and fruit production from smallholdings and farms;
- manufacture of herbal medicinal products.

On 20th February, 2013 the draft law "On Introducing Amendments to Certain Legislative Acts of the Russian Federation on the Baikal Natural Territory" was unanimously passed on its first reading at the plenary session of the State Duma of the Russian Federation. The main purpose of the law adoption is the harmonization of the regulations of the Federal Law dated 01/05/1999 No. 94-FZ "On the Protection of Lake Baikal" (hereinafter - the Law) with the provisions of the acts, which entered into force after its adoption. The amendments were entered by the Federal Law dated 20/06/2014 No. 181-FZ "On Introducing Amendments to Certain Legislative Acts of the Russian Federation".

In 2013, following the Government Decree of the Russian Federation dated 09/08/2013 No. 681, the Provision on the state ecological monitoring (state environmental monitoring) and public database of state ecological monitoring (state environmental monitoring) was adopted, while, following the Government Decree of the Russian Federation dated 06/06/2013 No. 477, the Provision on the state monitoring of the environment condition and pollution was adopted. These resolutions were adopted with consideration of the requirements of articles 63.1 and 63.2 of the Federal Law dated 10/01/2002 No. 7-FZ "On Environmental Protection" (as amended by the Federal law dated 21/11/2011 No. 331-FZ). The Provision on state ecological monitoring establishes that the state ecological monitoring information about the unique ecological system of Lake Baikal is included into the public database of state ecological monitoring.

Measures for protection of Lake Baikal. In 2013 the implementation of the Federal Target Program "Protection of Lake Baikal and Socio-economic Development of the Baikal Natural Territory for 2012-2020" continued.

Protective activities for Lake Baikal were funded from the Federal budget in 2013 in the amount of 1,182.06 million Rubles (in 2012 - 982.87 million Rubles), of which 976.36 million Rubles were allocated within the framework of the Federal Target Program "Protection of Lake Baikal and Socio-economic Development of the Baikal Natural Territory" and 205.70 million Rubles - from other sources. The distribution of funds by type of expenditure was as follows: Capital investments amounted to 160.87 million Rubles, state monitoring of the BNT subsoil - to 13.53 million Rubles, R&D - to 60.89 million Rubles and 946.77 million Rubles were allocated for other purposes. The budgets of the constituent entities of the Russian Federation spent 235.08 million Rubles on the projects and activities associated with Lake Baikal protection, in 2012 - 62.582 million Rubles. The funds raised from extra-budgetary sources amounted to 201.36 million Rubles (estimated 140 million Rubles).

Certain works related to the bank protection of Lake Baikal were carried out near Maksimikha village of Barguzinsky district, the Irkutsk Reservoir, the Selenga River in Kabansk village of Kabansky district and other locations and project documentation for 10 facilities was developed, including type II fire-chemical stations, administrative and museum complex in Kyren village (Federal State Budgetary Institution Tunkinsky National Park) and a research in-patient hospital with the visitor centre at the Pokoyny Cape (Federal State Budgetary Institution Zapovednoye Pribaykalye).

In 2013 the works began on the elimination of accumulated environmental damage at such areas as Dzhidinsky Tungsten-Molybdenum Plant, underground accumulation of petroleum products, polluting the water of the Selenga River near Steklozavod settlement of the city of Ulan-Ude. A project aimed at the elimination of negative impact of wastes accumulated as a result of the activities of the Baikal Pulp and Paper Mill has been developed.

The environmental monitoring in 2013 was carried out by the organisations of Roshydromet, Rosprirodnadzor (Russian Federal Service for Supervision of Natural Resource Management), Rosvodresursy (Russian Federal Water Resources Agency), Rosnedra (Russian Federal Subsoil Resources Management Agency), Rosrybolovstvo (Russian Federal Agency for Fishery), Rosreestr (Russian Federal Service for State Registration, Cadastre and Cartography) as well as by the competent authorities of federal constituent entities - the Republic of Buryatia, Irkutsk region and Zabaykalsky Krai. In addition, some accounting and control records acquired by Rostekhnadzor (Russian Federal Service for Ecological, Technological and Nuclear Supervision), Rospotrebnadzor (Russian Federal Service for Supervision of Consumer Rights Protection and Human Well-Being), Rostransnadzor (Russian Federal Service for Supervision of Transport), Rosstat (Russian Federal State Statistics Service) and the Russian Ministry of Emergency Situations were used for the purpose of BNT monitoring.

The existing system of monitoring of the unique environmental system of Lake Baikal and Baikal Natural Territory is in need of the reconstruction of the monitoring network of Roshydromet (Federal Service for Hydrometeorology and Environmental Monitoring of Russia), restoration of the full scheme of hydro-chemical and hydro-biological monitoring, improvement and replenishment of laboratory facilities with up-to-date devices, rehabilitation of Lake Baikal research fleet, further development of aerospace monitoring, optimisation of statistical reporting and improvement of interaction of competent authorities in the sphere of state environmental monitoring.

Environmental supervision. The activities related to the Federal environmental supervision over the observance of the environmental legislation within the Baikal Natural Territory in 2013 included 727 inspections (in 2012 - 416). 619 violations were detected in 2013 as a result of these inspections (385 in 2012). 496 orders were issued with regard to these violations and administrative fines in the total amount of 12,003 thousand Rubles were imposed (in 2012 - 6,931 thousand Rubles), of which 6,577 thousand Rubles were paid (in 2012 - 4,132 thousand Rubles). 237 individuals were held liable for an administrative offence (in 2012 - 186).

639 inspections for environmental legal compliance, initiated through the means of the regional state environmental supervision, were conducted in 2013 (in 2012 - 794 inspections). 599 violations were detected in 2013 as a result of these inspections (1,144 in 2012). 401 orders were issued with regard to these violations and administrative fines in the total amount of 10,214 thousand Rubles were imposed (in 2012 - 9,075 thousand Rubles), of which 5,183 thousand Rubles were paid (in 2012 - 5,083 thousand Rubles). 485 individuals were held liable for an administrative offence (in 2012 - 765).

Environmental violations. In 2013 the number of administrative environmental offences and violations registered within BNT decreased by 26% (from 2,211 to 1,632) compared to 2012, while the number of crimes decreased by 0.3% (from 2,572 to 2,579).

International cooperation. The following events were considered the most significant in 2013.

On 18 - 19th June, 2013 the city Phnom Penh (Kingdom of Cambodia) hosted the 37th session of the World Heritage Committee of UNESCO, where the delegation of the Ministry of Natural Resources and the Environment of the Russian Federation, led by the Deputy Minister R.R. Gizatulin, took part. The session involved a discussion about the state of preservation of five Russian natural objects, included in the World Heritage List of UNESCO: "Lake Baikal", "Western Caucasus", "Virgin Komi Forests", "Golden Mountains of Altai" and "Volcanoes of Kamchatka". The member states of the World Heritage Committee of UNESCO noted the progress in the preservation of Lake Baikal with appreciation. This was facilitated by the statement of the Prime Minister of the Russian Federation D.A. Medvedev about the shutdown of the Baikal Pulp and Paper Mill.

In August 2013 the city of Irkutsk hosted a meeting of the joint Russian-Mongolian working group.

The following matters were considered at the 2013 session:

- water situation, spring floods and summer floods of 2013 in the basins of trans-boundary rivers;

- assessment of trans-boundary water quality (according to hydrochemical and sanitary-epidemiological indicators);

- monitoring program for the bottom and shores of the border sites of the river Chikoy (Tsokh);

- impact of economic activities of enterprises on the water bodies located in the basins of trans-boundary rivers;

- implementation of water conservation and water resource development activities in trans-boundary water bodies;

- prospects of water resource development complex in the basin of the Selenga River.

On 26th April, 2013 the Second meeting of the Coordinating Committee related to the management of UNDP-GEF (United Nations Development Programme of the Global Environmental Foundation) Project titled "Integrated natural resource management in the transboundary ecosystem of the Lake Baikal basin" took place in Ulan-Bator. The purpose of the meeting was the presentation of the achieved Project results, diagnostic analysis of the Lake Baikal basin and discussion of issues related to the improvement of international cooperation in the field of use and protection of trans-boundary water resources between Russia and Mongolia. The project supports the joint efforts of Russia and Mongolia on the establishment of effective structures and mechanisms for the protection of water resources and biodiversity through integrated management at the trans-boundary, national and local levels.

On 8-10th July of 2013 the Government of the Republic of Buryatia, supported by the Siberian branch of the Russian Academy of Sciences organised an International scientific and practical conference "Baikal - Strategic Resource of the Planet in the 21st Century". The conference in Ulan-Ude was attended by representatives of federal and regional legislative and executive authorities, public and other organisations, leading Russian and foreign scientists, representatives of international conservation organisations and Inter-regional Association "Siberian Agreement".

In August 2013 the international ecological-educational centre Istomino of Kabansky district of the Republic of Buryatia hosted the Russian-Mongolian workshop on "Environmental Problems in the Lake Baikal Basin and Role of "Green Economy" in their Solving", organised by the Siberian branch of the Russian Academy of Sciences, the UNDP-GEF (United Nations Development Programme-Global Environmental Facility) Project "Integrated natural resource management in the trans-boundary ecosystem of the Lake Baikal basin" and the Ministry of Natural Resources of the Republic of Buryatia. The workshop was attended by representatives of the Ministry of Environment and Green Development of Mongolia, civil police supervision and environmental protection of Mongolia and the public organisation "Green Chamber" of Mongolia.

Providing access to information. During the period from January to December 2013, 299,512 visits were recorded on the website of the Ministry of Natural Resources and the Environment of Russia "Protection of Lake Baikal" and 802 gigabytes of data was downloaded. In 2013 the number of visits to website compared with 2012 increased by 58% and amounted to an average of 820 visits per day. The amount of downloaded data increased 1.7 times.

4. In 2014-2015 the activities aimed at the protection of Lake Baikal shall include the following key measures:

- in the field of accountability management of Lake Baikal protection - to effectively implement activities and use all the funds allocated within the framework of the Federal Target Program "Protection of Lake Baikal and Socio-economic Development of the Baikal Natural Territory for 2012-2020";

- due to the termination of the BPPM activities - to provide for the observance of the legislative requirements in the course of the preparation of hazardous production facility to conservation and liquidation, as well as to maintain a system of comprehensive monitoring in the area of the plant wastewater discharge to determine the dynamics of recovery of water column, aquatic organisms and bottom sediments.

- to enhance work on suppression of illegal extraction of Baikal omul and Baikal sturgeon, conducting additional raids during periods of spawning (in the framework of the activities No. 36, 37 of the Federal Target Program "Protection of Lake Baikal and Socio-economic Development of the Baikal Natural Territory for 2012-2020");

- in the field of environmental monitoring: to develop and adopt Provisions on the implementation procedure of the state ecological monitoring of unique ecological system of Lake Baikal; to develop a programme of state ecological monitoring of the unique ecological system of Lake Baikal and the Baikal Natural Territory; to reconstruct the observation network of Roshydromet within BNT, including the construction of a vessel, ensuring the selection and transportation of water samples, bottom sediments and aquatic organisms;

- complete the development of a new version of "The provision on the rules of use of water resources in reservoirs of the Angara cascade of hydroelectric power station".