

# **THE STATE OİL COMPANY OF REPUBLIC OF AZERBAIJAN**



## **2013 ANNUAL REPORT OF THE STATE OİL COMPANY OF REPUBLIC OF AZERBAIJAN**

**B A K U 2014**

## I. TRIUMPH OF OIL STRATEGY



The victorious energy strategy of national leader of Azerbaijan, Heydar Aliyev is successfully continued under the leadership of President Mr. Ilham Aliyev and continuously rises up Azerbaijan economy, particularly oil and gas industry, brings him unprecedented achievements. Regional and global importance of oil and gas projects which are realized with the initiative and the participation of Azerbaijan, raised our country's image in the international arena and introduced as a reliable partner all over the world.

Azerbaijan is in the focus of the international community not only as an ancient oil country, the country providing an invaluable contribution to the development of the world oil industry, but also as a rich source of natural gas, reliable and secure natural gas supplier. Currently, Azerbaijan gas is exported to Georgia, Turkey, Russia, Iran and Greece. In the near future the names of new countries will be added to this list. In diversification of natural gas supplies "Southern Energy Corridor" project which the European Union hopes and supports, will provide energy security of the Commonwealth countries, as well as, will allow full disclosure of potential energy of Azerbaijan, diversification of energy export routes.

Exploration, drilling and production rates are rising year by year within the oil-gas projects which was held by SOCAR that became a leading company in the region. Now we can confidently say that energy security of Azerbaijan has been provided in a complete and irreversible. Today, increase of the capacity of the natural gas is one of the priority issues. After 20-year interval, exploration and drilling operations that independently carried out by the SOCAR's internal resources, resulted in discovery of "Umid" field, production from the field started as soon as possible and in 2011 was memorable by the discovery of "Absheron" gas-condensate field that strengthens the energy potential of Azerbaijan. The exploration work is continued in other good structures. Taking into account the high prospectivity, the new wells are drilled into the reservoir in "Bulla-Deniz" field. Exploration well No. 90 was already put into operation, new stationary offshore platform No. 122 which planned for 3 production wells, was2

installed. A total of 2.4 million cubic meters of gas and 450 tons of condensate per day will be extracted from these wells which would be drilled from the platform of 10 blocks placed at a depth of 26 meters from the sea.

Discovery of huge gas reserves also requires the diversification of these volumes transported to world markets. Last year, the works on "Shah Deniz-2" project was started. In accordance with the concept of the project development, in this stage production is expected to reach at least 16 billion cubic meters. In this respect, 30 production wells should be put into operation, a new platform and communications system should be built. 6 billion cubic meters of gas which will be produced within "Phase-2" is expected to export to Turkey, but 10 billion cubic meters to Europe. For this purpose, the expansion of the South Caucasus Pipeline will be carried out, the new transport system will be established. Trans-Anatolian Pipeline (TANAP) project being realized by initiative of the President of the Republic of Azerbaijan Mr. Ilham Aliyev allows for transportation of natural gas volumes to the Europe through Turkey, which to be produced initially from "Shah Deniz", "Umid" and "Absheron" fields as well as existing exploration targets of Azerbaijan, then from Caspian Basin and other Eastern countries. So, SOCAR becomes into master link of "South Gas Corridor" playing a crucial role in energy security of the Europe by implementing TANAP project and its operatorship. One of the main components of this corridor, which would make an important change in energy map of the Europe, is Trans Adriatic Pipeline (TAP) project.



TAP pipeline to the length of 870 km will tie in TANAP in Turkey-Greece border, then will extend for south coasts of Italy across Adriatic sea by getting through territories of Greece and Albania. TAP project which will supply South-Eastern Europe with natural gas, will create great opportunities for delivery of natural gas produced in Caspian Basin to other large gas consumers of the continent – Germany, France, Great Britain, Switzerland and Austria by stretching into one of the largest gas market of the Europe. In this regard, sanctioning of final investment decision on second phase of development of "Shah Deniz" field at the end of the past year, is supposed to be a major success which gained as a result of intensive negotiations with companies of the EU-member states and transit countries that lasted more than five years. It is not occasion that the President of the Republic of Azerbaijan Mr. Ilham Aliyev specified this document as3

contract of XXI century and evaluated "Shah Deniz Phase 2" project as energy security and energy diversification project in the capacity of one of the largest energy projects all over the world.

The works carried out in processing complex of the State Oil Company aim to both satisfaction of countrywide need for petroleum derivatives and minimization of negative impact upon the environment. Output of light oil products in refineries of the Company increased and operating depth totalled to 92%. We are going to construct new Oil-Gas Processing and Petrochemical Complex (OGPC) concurrently by using efficiently opportunities of the existing refineries. Works on realization of OGPC project are ongoing under the time schedule. There allocated a site for the Complex approximately to the extent of 4200 ha in the vicinity of Sangachal terminal. Proper works are carried out in respect to movement of existing infrastructures in the same area. Meanwhile, geophysical, geotechnical and hydraulic works are carried out in the site. In parallel, studies are conducted towards development of Environmental and Social Impact Assessment (ESIA) reports. At the present, a process of involvement of stakeholders started in regard to implementation of OGPC project by SOCAR. The works performed make confidence for successful implementation of this project being particularly important in respect to upgrading quality oil & gas processing and petrochemicals produced by SOCAR and improvement of ecological situation in Baku city.

Apparently, management of "Petkim" petrochemistry holding of Turkey is fulfilled by SOCAR for several years. Within these years "Petkim" company gained records on gross output, income, profit and export. Ground-breaking ceremony of STAR oil refinery with 10 million tons annual output was held in the presence of the President of Azerbaijan Mr. Ilham Aliyev and Prime Minister of Turkey Mr. Rajab Tayyip Erdogan in 2011. It was largest investment project carried out through private sector in Turkey. In May of the past year an agreement was signed by and between SOCAR and consortium headed by "Tecnicas Reunidas" company (Spain) which would implement construction of STAR oil refinery. Thus, Turkey will save an amount of billions USD on import products and SOCAR will get an additional profit to the large extent from realization of end processing products by commissioning of STAR oil refinery to be established on the basis of state-of-the-art technologies from ecological standpoint.



The State Oil Company started construction of nitrogen fertilizer - carbamide plant in Sumgayit city. Construction of the plant where nitrogen fertilizer would be produced in compliance with international high standards, is carried out under the "State Programme on reliable provision of the population with foods in Republic of Azerbaijan in the years of 2008-2015" approved by proper Decree of the President of the Republic of Azerbaijan. The construction of carbamide plant ground-breaking of which attended by our respectable President Mr. Ilham Aliyev is financed through state investments. Design capacity of the plant is 1200 ton ammonia and 2000 ton carbamide per day. Natural gas will be used as key raw materials. The plant should be handed over being fully available for commissioning on turn-key terms including all necessary tests within the framework of contract signed with "Samsung Engineering Co. Ltd." company last year. SOCAR will render a strong support in development of agriculture in the capacity of major industry division of countrywide economy by implementation of this project. Also, SOCAR launches a construction of similar plant in Georgia in view of strong demand for nitrogen fertilizer in the region.

After incorporation of "Azerigaz" Production Unit into organizational structure of SOCAR by the Decree of the President of Azerbaijan Mr. Ilham Aliyev, large-scale works are carried out towards upgrading of countrywide gas supply system and providing of the people and industry with natural gas. The works oriented to establishment of gas supply system of surrounding settlements and villages of Baku city at the level of international requirements have been accelerated. Design works oriented to implementation of expansion, upgrading and reconstruction of the existing gas supply network, are successfully continued in Baku city and Absheron peninsula in order to meet demand to be increased in the future as a result of prevention of natural gas loss as well as growth of population and sustainable development of industry according to service contract signed by and between "Azerigaz" Production Unit of SOCAR and "E.ON Ruhrgas AG" company (Germany) in respect to preparation of feasibility study for upgrading of gas supply system in Baku city and Absheron peninsula.

At the present, business image of SOCAR continuously rises up and its international reputation consolidates more and more. The Company has already been recognized as an organization which complies with its obligations timely and in due form before international financial institutions. Corporate rating of SOCAR has been assessed as a stable by 3 worldwide large rating agencies. One of major successes of the Company was putting into circulation of Eurobonds in order to get benefit from new financial instruments and to attract investment from international capital market. Such securities which put into circulation in London in 2012 roused keen interest among investors. SOCAR put into circulation more securities to the extent of 1 billion USD in 2013 by assessing correctly potential variability in international monetary market. If existing market prices are taken into account, SOCAR saved approximately 10 million USD average, in total 100 million USD over 10 years. Of course, all these are major successes and resulted obviously from strengthening of economy of Azerbaijan and increase of its role in global economy.

Regular and relevant works are ongoing by the Company towards personnel development. Every year tens of students are sent to get education in well-known universities all over the world within the framework of Study Abroad programme and the graduates are provided with relevant jobs in proper departments and enterprises of the Company. However, regular development of the Company continuously increases<sub>5</sub>

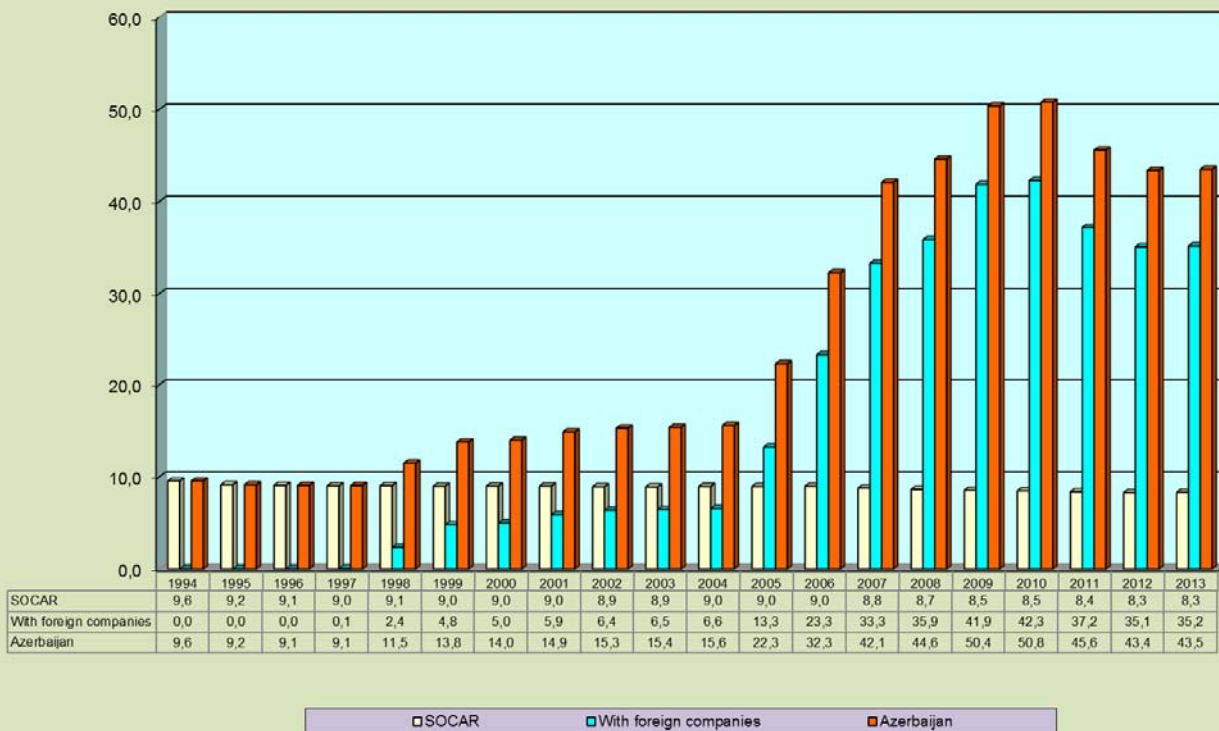
demand for new specialists. There established Baku High Oil School in organizational structure of the State Oil Company under the Decree of the President of the Republic of Azerbaijan in order to develop highly qualified specialists meeting up-to-date requirements of the industry by organization of learning proces through modern curricula and education technologies in compliance with international standards in view of satisfaction of such demand. In the short run, close relationships have been established with leading scientific and education centres in oil & gas sector throughout the world and efficient works are carried out jointly.

Large-scale state programs and major finance-based projects are implemented in our country in respect to protection of environment and ecological balance. The State Oil Company is flagman of such process. There established Ecology park and it has been put into use successfully in 9.3 ha oil decontaminated area of H.Z.Tagiyev OGPD. The park serves to widening of green zones, cultivation of exotic trees, bushes and decorative plants adaptable to local climate conditions and creation of rare plant species endangered in the Absheron peninsula in order to normalization of ecological situation. Power supply of the park is provided through alternative energy sources. Four wind generators each of which has 10 kilowatt hour capacity and solar panels with 20 kilowatt hour overall design capacity have been installed here. The Ecology park plays an important role in upbringing of young generation in environment-friendly attitude development and embodies visually environmental challenges as a first-priority social task set before every citizen.

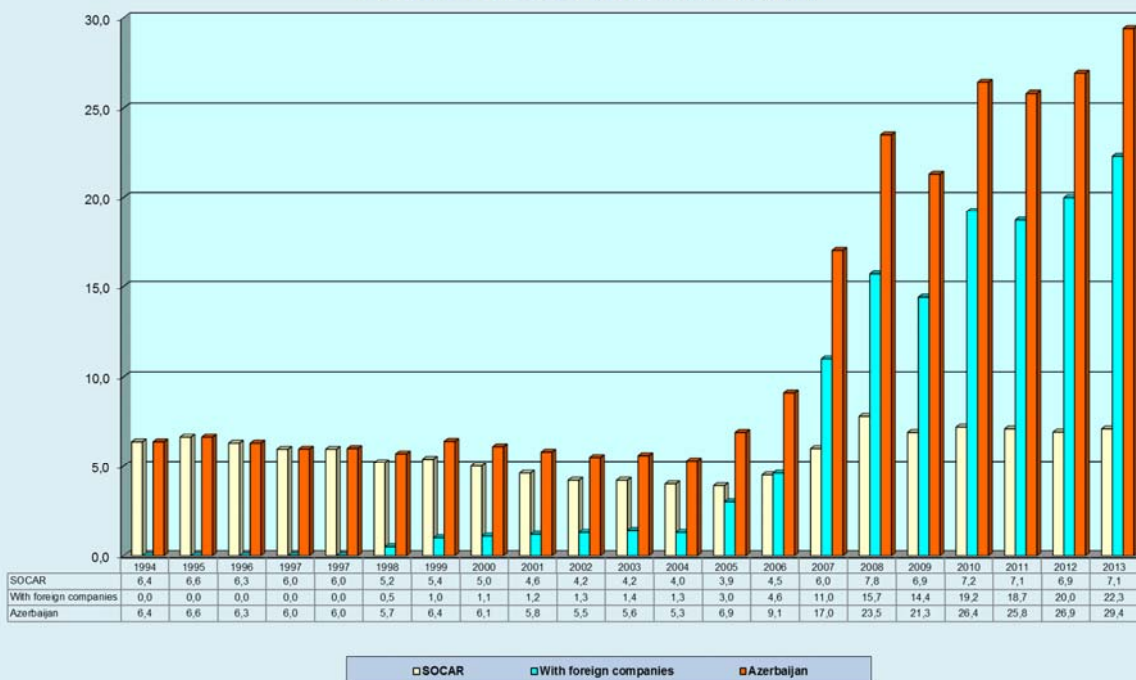
SOCAR is constantly developing, enhancing and transforming into internationally important company through rising trend. Modern management, experienced and initative staff and dynamic activity lead the State Oil Company to new successes.

**Rovnaq Abdullayev**  
**President of SOCAR**

Oil Production in Azerbaijan Republic (mln. tons)

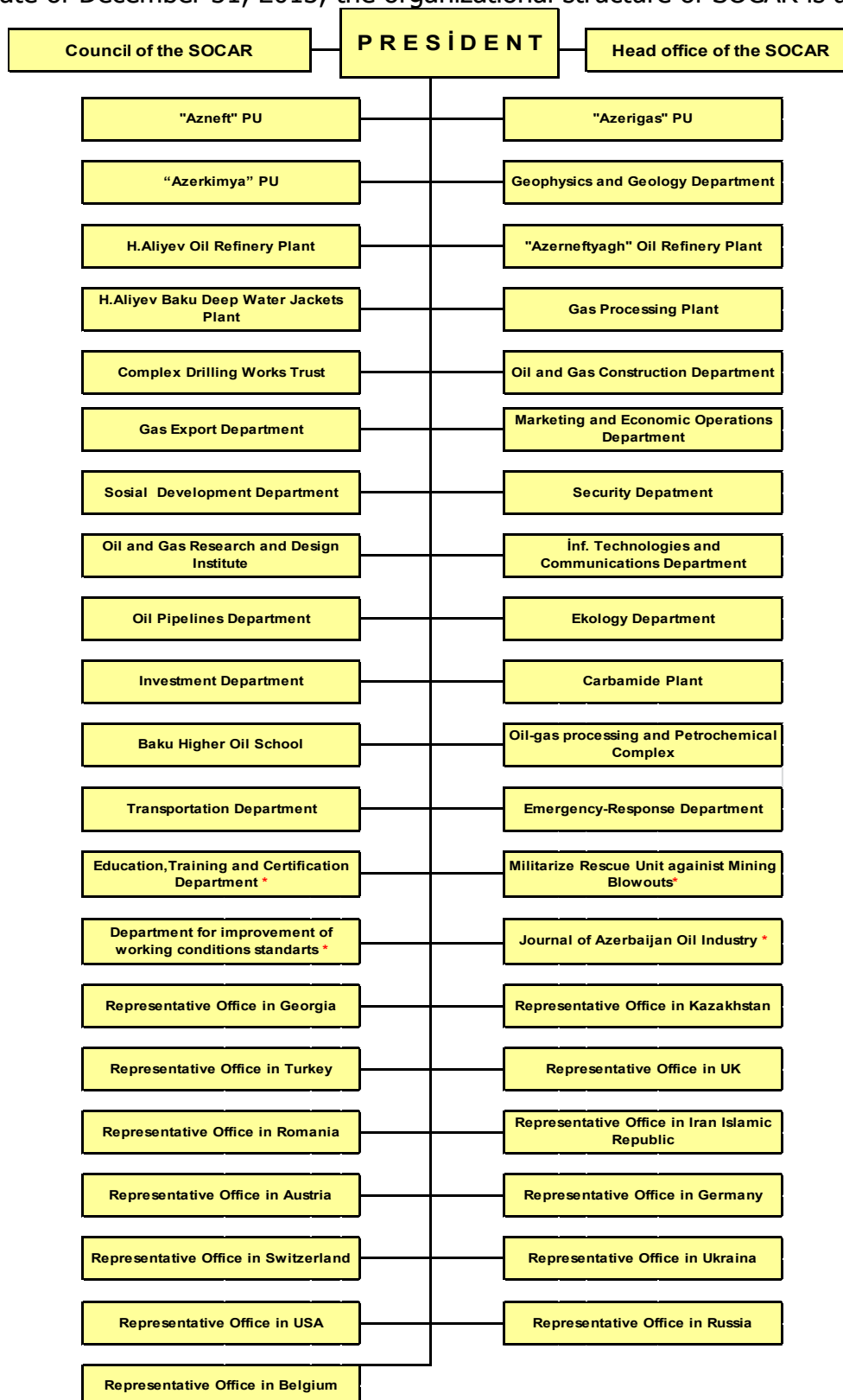


Gas Production in Azerbaijan Republic (bln.m3)



## II. ORGANISATIONAL STRUCTURE of the SOCAR

At the date of December 31, 2013, the organizational structure of SOCAR is as follows:



\* SOCAR's direct subordinate organizations not having the status of legal entity



### **III. JOINT VENTURES, OPERATING COMPANIES AND ALLIANCES FOUNDED BY SOCAR AND FOREIGN COMPANIES**

The following joint SOCAR and foreign company projects were implemented in 2013:

#### **JOINT VENTURES:**

##### **I. Oil and gas production:**

1. "AzGerneft" JV
2. "Aztechizat Trading" JV

##### **II. Joint venture on insurance:**

1. "Ateshgah" Insurance Company CJSC

##### **III. Joint ventures on drilling:**

1. Caspian Drilling Company JV
2. "SOCAR-AQSh" LLC
3. SOCAR- Umid" LLC
4. "SOCAR-Construction" LLC

##### **IV. Engineering-works sector:**

1. Azeri-Fugro LLC
2. SOCAR Fugro LLC
3. "AzLab" JSC JV

##### **V. Joint venture on barytes and drilling mud sector:**

1. Azeri-MI Drilling Fluids JC

##### **VI. Construction sector activities:**

1. "AzFen" JV
2. "BosShelf" LLC
3. "Caspian Shipyard Plant" LLC
4. "Caspian Shipyard Company" LLC
5. SOCAR - Cape LLC
6. Sarmatia LLC

##### **VII. Gas compression and sales:**

1. SOCAR-CNG LLC

##### **VIII. Oil outburst refining works activitie:**

1. "EKOL Engineering Services" CJSC
2. SOCAR- Baglan LLC

##### **IX. Information sector:**

1. "Interfax-Azerbaijan" LLC

##### **X. Joint venture on geophysical surveys:**

1. Caspian Geophysical Company

##### **XI. Joint venture on require of the oil and gas equipment:**

1. "Oil and Gas ProServ" LLC
2. "SOCAR - KPSH" LLC

**XII. Joint venture on Transport Works:**

1. Cross Caspian and Gas Logistics LLC

**XIII. Oil and gas refining and Marketing sector:**

1. SOCAR Energy Georgia LLC
2. SOCAR Turkey Energy AC
3. SOCAR –Petroleum CJSC
4. SOCAR – Gas Export-import LTD

**XIV. Joint venture on gunpowder and drilling mud sector:**

1. Azeri-MI Drilling Fluids JC

**XV. Joint venture on Pipe Coating services:**

1. Caspian Pipe Coatings LLC

**XVI. Engineering and design works:**

1. Azerbaijan Rigs LLC
2. SOCAR Foster Viler Engineering Services

**XVII. Nitrogen fertilizer production sector:**

1. SOCAR Georgia Investments LLC

**XVIII. Engineering and design works:**

3. SOCAR Energy Georgia LLC
4. SOCAR Petroleum CJSC
5. SOCAR Gas Import-Export LLC
6. Agri LNG Project Company S.R.İ.

**ALLIANCES:**

**I. Construction sector activities:**

1. SOCAR- McDermott
2. SOCAR HC Heavy Crane
3. SOCAR Maersk

**II. Diving works sector:**

1. SOCAR-SAIPEM

**III. Shipping Management sector:**

1. SOCAR CSOF Bue Caspian

**IV. Maritime transport sector:**

1. SOCAR Caspian Marine Services

**V. Communications sector:**

1. SOCAR-Optilan

**OPERATING COMPANIES:**

1. Azerbaijan International Operating Company (AIOC)
2. "BP (Shahdaniz) OC
3. "Salyan Oil" OC
4. "Karasu" OC
5. "Gobustan" OC

6. "Binagadi" Oil Company
7. "Surakhani Oil" OC S.A.
8. "Petro-HongKong-Pirshat Oil Limited" Oil Company
9. "Balakhani" OC
10. "Kura Valley" OC
11. "Absheron" OC
12. "Shirvan" OC
13. "Neftchala" OC
14. "Bahar" OC
15. BP "Shafaq-Asiman" BV
16. Total E&P Absheron BV

**I. Operating on the pipeline transport companies:**

1. BTC Co. LLC
2. South Caspian Pipeline LLC



## IV. GEOPHYSICAL AND GEOLOGICAL WORKS

Structure of Geophysics and Geology Department of SOCAR consisted of "Prospect Geophysics" Unit, "Mine Geophysics" Unit, "Transport and Special Machinery" Unit and Complex Geological Exploration Expedition in 2013.

According to order № SOCAR/13-1000/01/SM-05-000033 dated 27.12.2013 of SOCAR "On improvement of the structure of Geophysics and Geology Department", "Prospect Geophysics" Unit, "Mine Geophysics" Unit, "Transport and Special Machinery" Unit, operating within the Geophysics and Geology Department (GGD), were liquidated from 01.01.2014 and there established "Prospect Geophysics" Producton Division, "Mine Geophysics" Producton Division, "Complex Geological Exploration" Producton and "Transport and Special Machinery" Division that in this respect, appropriate changes were introduced in the program of works, which was scheduled to be implemented by GGD.

### 1. Geophysical and geotechnical works

Offshore and onshore geophysical and geotechnical works were performed by Geophysics and Geology Department of SOCAR (hereinafter called GGD) in 2013.

Geophysical prospecting works. "Prospect Geophysics" Unit of Geophysics and Geology Department carried out 94.5 km<sup>2</sup> 3D seismic and 1221.5 linear km 2D seismic, 400 linear km gravimetric, 392 linear km magnetometric and 980 meter vertical seismic profiling (VSP) works in 1 well throughout the year.

In addition to these works, totally data such as 6237 linear km 2D seismic and 112 km<sup>2</sup> 3D seismic, 5580 m vertical seismic profiling and 792 linear km gravimetric-magnetometric were processed and 897 linear km 2D seismic and 2188 km<sup>2</sup> 3D seismic, 5580 m vertical seismic profiling and subsequently, 361467 traces were digitalized and basic geological outcomes on 4 fields were achieved and reported.

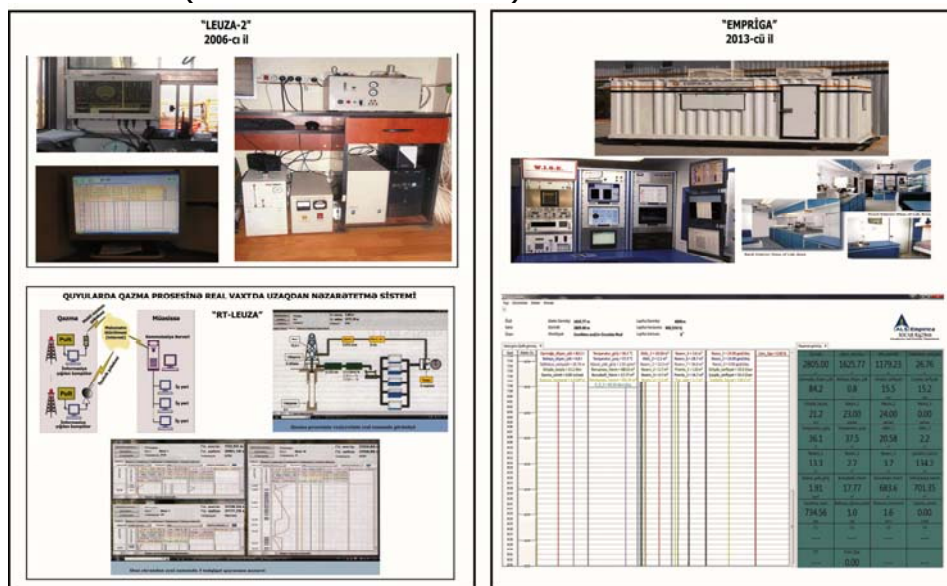


**2D seismic field surveys** by "Prospect Geophysics" Unit were conducted to the extent of 432 linear km in the area of Caspian-Guba NGR, 12 linear km in "Tumbul-Nehram" area of Nakhichevan AR and 777.5 linear km south-western downhills of Great Caucasus at onshore field by using the total depth point method (TDPM) according to contract signed with "ConocoPhillips" under the order of "Azneft" PU.

**Gravimetric works** to the extent of 400 linear km and **magnetometric works** to the extent of 392 linear km were executed in the area of Caspian-Guba NGR.

**Vertical seismic profiling works** to the extent of 980 m were performed in exploration well 1 drilled in Tumbul area of Nakhichevan AR under the order of "Complex Drilling Works" Trust.

**Processing and interpretation works: Offshore** - processing of 2D seismic data to the extent of 300 linear km and interpretation of 2D seismic data to the extent of 552 linear km on Bulla-deniz field (customer: "Azneft" PU); interpretation of 3D seismic data to the extent of 416 km<sup>2</sup> on Umid field (customer: "SOCAR Umid" LLC); interpretation-time scaling of 3D seismic data to the extent of 1660 km<sup>2</sup> on Shafag-Asiman field (customer: "BP" Company); processing of 2D seismic data to the extent of 5840 linear km on North Absheron-deniz, North-Western Absheron transition and Caspian-Guba ashore zone fields (customer: "Statoil" Company); processing of 2D seismic data to the extent of 97 linear km and interpretation of 2D seismic data to the extent of 345 linear km on Hamamdagh-deniz-Garadagh-deniz transition zone field (customer: "RWE" company); Onshore - processing and interpretation of 3D seismic data to the extent of 112 km<sup>2</sup> on "Naftalan-Northern Naftalan" field as well as processing of gravimetric data to the extent of 400 linear km and magnetometric data to the extent of 392 linear km on Caspian-Guba NGR (customer: "Azneft" PU).



Vertical seismic profiling data were processed and interpreted to the extent of 5580 m, including 980 m on Tumbul-1 well and 4600 m on Alat-deniz well 23 (customer: "Complex Drilling Works" Trust) in the reporting year.

In the reporting year, the processing and interpretation of exploration geophysics data on 4 fields - Umid, south-eastern plunge of Bulla deniz field, Eldaroyugu-Boyuk Palantokan and Naftalan-Northern Naftalan fields were completed and basic geological outcomes were achieved and reported.

As a result of processing and interpretation of 3D seismic exploration data conducted in Umid field, the geological structure of survey area was specified, existing tectonic fissures and their amplitudes and directions as well as hydrocarbon saturation limits of

reservoir beds on different horizons on the basis of comparative analysis of seismic wave zone parameters were determined;

As a result of processing and interpretation of 2D seismic exploration data conducted in south-eastern plunge of Bulla-deniz field, the geological structure of survey area was specified, existing tectonic fissures and their amplitudes and directions were determined;

As a result of processing and interpretation of geophysical data achieved in Eldaroyugu-Boyuk Palantokan field, the geological structure of survey area was specified, new tectonic elements were determined and oil & gas bearing areas were separated;

As a result of processing and interpretation of geophysical data achieved in Naftalan-Northern Naftalan field, the geological structure of survey area was specified, structural map on four seismic horizons between upper edges of Maykop and Tebashir sediments was compiled. As a result of comparative analysis of seismic and well data, regular zonal variation of petrophysical parameters of the sediments forming geological section and dissemination area of oil bearing basins was forecasted;

67 reports, 322 maps, 666 operator sheets and 1168 time sections were digitalized by Corporate base establishment group.

**Mining geophysical works.** In the reporting year, "Prospect Geophysics" Unit of GGD carried out mining geophysical works in the onshore areas of Azerbaijan and in the oil and gas wells and non-oil and gas wells under drilling and exploitation in Azerbaijan sector of the Caspian Sea under the orders of "Azneft" PU, Complex Drilling Works Trust, operating companies, joint ventures and outside companies working in Azerbaijan.

Total number of orders makes up 4247 (in 1161 wells) of which 1536 (192 wells) were executed in the open hole, while 2711 (1145 wells) in the cased hole. The fulfilled orders on well logging operations totaled to 3080 (in 711 wells) and the measured diagrams totaled to 9053. Perforation works were performed in 793 wells to the extent of 1167 orders and 110836 holes were perforated.

Geophysical survey and perforation (buried shot) works were carried out in wells under drilling and exploitation in 57 fields of Azerbaijan, including 19 fields offshore and 38 fields onshore.

6511 strata were appraised as per geophysical survey works throughout the year. Of them, 2611 strata were assessed as industrially significant oil and gas bearing, 8 strata as indefinite and 3892 strata as watery. As a result of the perforation and testing works performed in 237 strata out of the appraised 6511 strata, oil was recovered from 201 out of 210 strata assessed as oil and gas bearing, while water was produced from 9 strata. Besides, oil was recovered from 2 out of 27 strata appraised as watery, while water was produced from 25 strata.

Complex geophysical surveys were conducted in 157 completed wells; the control of development of fields through geophysical methods was carried out in 447 wells (against 756 orders); and the geological-geochemical-technological supervision of gas logging and drilling works was conducted in 20 wells in the reporting year.

Processing and interpretation expedition of the Department carried out digitalization, scan copying, PDF formatting of geophysical data to the extent of 9053460 m on 613 wells and scan copying, PDF formatting and stacking of inclinometric materials on 523 wells in order to create corporate database in 2013.

Geotechnical survey. In the reporting year, the Complex Geological Exploration Expedition of GGD carried out a total of 34399 m drilling survey, including structural mapping and geotechnical survey to the extent of 1041 m on a contractual basis and 3900 m under annual work program, 29158 m drilling in view of blowout well for geotechnical survey drilling and seismic prospecting works to the extent of 300 m by machine in the area of Baku Olympic Stadium, 1859 km continuous seismo-acoustic profiling (CSAP), 2729.9 km sonar planning, 2700.8 km hydrographic surveys (bathymetry) and 1.95 km<sup>2</sup> (66 km) multi-beam survey (measurement of sea bed in 3D format).

Geotechnical drilling works: In 2013 the Complex Geological Exploration Expedition of GGD carried out (in total, 34399 m drilling survey, including 3900 m within plan and 30499 m on a contractual basis) geotechnical drilling works at offshore (4941 m) by "Zohrab Valiyev" vessel to the extent of 4551 m in Azerbaijan sector of the Caspian Sea, such as "Zorat-deniz", "Western Absheron", "Goshadash", "Bulla-deniz" and "Agburun" fields (customer: "Azneft" PU) and 220m in the Russia sector of the Caspian Sea such as "Titonskaya" field (customer: "Moringgeology" JSC of Latvia) and 170 m in Umid field (customer: "SOCAR-Umid" LLC); at onshore (29458m) to the extent of 29158 m in Tumbul-Nehram area of Nakhichevan AR in respect to drilling of blowout wells for seismic exploration works (customer: "Prospect Geophysics" Unit), 300 m in the area for construction of Baku Olympic Stadium in "Boyuk Shor" (customer: Social Development Department).

Seismo-acoustic profiling: Such operations were performed totally to the extent of 1859 km, (including 1291 km according to plan and 568 km under contracts) such as 1347 km in "Zorat-deniz", "Goshadash" and "Agburun" fields (customer: "Azneft" PU), 498 km in Goshadash field (customer: "Prospect Geophysics" Unit) and 14 km in "Umid" field (customer: "SOCAR-Umid" LLC).

Sonar planning works: Such works were carried out totally to the extent of 2729.9 km (including 945 km according to plan and 1784.9 km under contracts) such as 1973.2 km in "Zorat-deniz", "Goshadash", "Sangachal"- "Duvanny"- "Khare-Zira", "Bulla-deniz", "Gunashli", "Darvin bank", "Sangachal"- "Duvanny", "Umid"- "Bulla" interoffshore, "Neft-Dashlary"- "Gunashli" transition and "Agburun" fields (customer: "Azneft" PU), 36.2 km in Bulla-deniz field (customer: "Complex Drilling Works" Trust), 671.5 km in Goshadash field (customer: "Prospect Geophysics" Unit, 25 km in "Western Absheron" and "Neft Dashlary" fields (customer: "Oil and Gas Construction" Trust), 4 km in the area of "South basin" ATA (Azfen, Tekfen and AMEC) company (customer: "Azeri Fugro" LLC) and 20 km in "Umid" field (customer: "SOCAR-Umid" LLC).

Bathymetric survey: Such works were carried out totally to the extent of 2700.8 km (including 1011 km according to plan and 1689.8 km under contracts) such as 1870.3 linear km in "Zorat-deniz", "Goshadash", "Sangachal"- "Duvanny"- "Khare-Zira", "Bulla-deniz", "Gunashli", "Darvin bank", "Sangachal"- "Duvanny" and "Agburun" fields<sub>15</sub>

(customer: "Azneft" PU), 671.5km in Goshadash field (customer: "Prospect Geophysics" Unit, 22 km in "Western Absheron" field, including 18 km zonal and 4 km stellate, 76 km in "Darvin bank" (customer: "Oil and Gas Construction" Trust), 6 km in the area of "South basin" ATA (Azfen, Tekfen and AMEC) company (customer: "Azeri Fugro" LLC) and 55 km in "Umid" field (customer: "SOCAR-Umid" LLC).

Multi-beam (measurement of sea bed in 3D format) survey works were carried out totally to the extent of 1.95 km<sup>2</sup> (66 km), including 0.25 km<sup>2</sup> (10 km) in Goshadash field and 0.56 km<sup>2</sup> (15 km) in Sangachal-Duvanny field (customer: "Azneft" PU), 0.25 km<sup>2</sup> (10 km) in Western Absheron field, 0.25 km<sup>2</sup> (15 km) in "Darvin bank" field and 0.64 km<sup>2</sup> (16 km) in Neft Dashlary field (customer: "Oil and Gas Construction" Trust).

Sonar planning, bathymetry, uninterrupted seismo-acoustic profiling and multi-beam survey works were carried out through "Mammad Suleymanov" and "Orion-3" ships.

**2. Structural prospecting drilling works.** In 2013, exploration works were executed in cored well 5 completed with drilling in "Northern Shikhigaya" field onshore in 2012 under the order of "Azneft" PU.

The target depth of "Northern Shikhigaya" cored well №5 is 1000 m, the target horizon is X horizon of productive strata (on Shikhtapa division). Drilling of cored well № 5 was commenced on 17.01.2012. Drilling works were carried out to the extent of 1000 m in depth in the reporting year. The well passed to 2013 with development and according to the rock samples taken and the results of the complex mining geophysical surveys, development works were conducted in the intervals characterized positively in terms of oil and gas bearing. So, produced water was extracted at I facility (IX horizon of PS) to the extent of 40 m<sup>3</sup>/days in 857-853 m and 829-822 m intervals, II facility (IV horizon of PS) to the extent of 6 m<sup>3</sup>/days in 348-341 m and 340-337 m intervals. No flow was observed at III facility (III horizon of PS) in 261-259 m interval. The well was handed over to be abandoned for geological reasons under Ia category due to absence of positive result.

**3. Exploratory-prospecting drilling works.** In 2013, exploratory-prospecting drilling works were carried out in onshore and offshore fields (in oil and gas deposits and prospective structures) of Azerbaijan Republic on own resources of SOCAR and jointly with foreign companies.

In total, exploratory-prospecting drilling works to the extent of 8234 m, including 6991 m on own resources of SOCAR and 1243 m jointly with foreign companies were carried out in six fields - in "Northern Shikhigaya" (№5) and "Tumbul" (№1, №2) fields onshore, as well as in "Bulla-deniz" (№90), "Alat-deniz" (№23), "Shah Deniz" (by BP operatorship № SDX-7) fields and at "Goshadash" area (№2) offshore.

In the reporting year, 3 wells were commenced with drilling in "Tumbul" (№1, №2), "Goshadash" (№2), 4 wells were completed with drilling in Alat-deniz (№ 23), Bulla-deniz (№90), Tumbul (№1), Shah Deniz (by BP operatorship, №SDX-7), 5 wells were completed with construction in Alat-deniz (№23), Bulla-deniz (№90), Northern Shikhigaya (№5), Tumbul (№ 1), Shah Deniz (by BP operatorship, № SDX-7).



**“Alat-deniz” field exploration well №23 (jacket №63).** The target depth of the well is 4900 m, target horizon is Girmakialty suite of PS, azimuth 270°, deviation 250 m, depth of water is 6 m, height of rotary table is 15.45 m. The drilling works were commenced on 17.03.2011. According to outcomes of well geophysical surveys conducted in the wells, the drilling works were stopped due to full opening of target horizon in 4795 m depth. The well passed to 2013 with development. According to outcomes of well geophysical surveys, development works were carried out in some intervals appraised as oil & gas bearing in 2013. GA horizon of productive strata was perforated in 4632-4637 m interval and no flow was generated from reservoir as a result of the development. 3847-3837 m interval of VII horizons of productive strata was perforated in order to follow up the development works and subsequently, daily 70 thousand m<sup>3</sup> gas and 9 m<sup>3</sup> condensate were achieved.

The well was handed over to balance of N.Narimanov OGPD of “Azneft” PU as from 17.05.2013.

**“Bulla-deniz” field prospecting well №90 (jacket №29).** The target depth of the well is 5800 m, target horizon is VIII horizon of PS, azimuth 320°, deviation 800 m, depth of water is 26.5 m, height of rotary table is 19.5 m. The drilling works were commenced on 06.11.2012. The well passed to 2013 with drilling in depth of 1998 m (Surakhany suite). The drilling works were carried out to the extent of 3870 m in the duration of the year. Actual depth of the well was 5868m up to 17.08.2013 (actual average total azimuth - 3220, deviation - 777.14 m in 5784 m depth). There observed blowout in the well while drilling in 5868 m depth on 17.08.2013 and a fire occurred. Antifire measures were carried out in the well from 18.08.2013 till 25.10.2013 (within 68 days) and the well was recovered and recommissioned. Initially average daily recovery totaled to 4300 thousand m<sup>3</sup> gas and 600 tons condensate in the well. High output generated VIII horizon of productive strata in prospecting well №90 gave a stimulus to drilling of new wells in VIII horizon at the same block.

The well was handed over to balance of N.Narimanov OGPD of “Azneft” PU as from 25.10.2013.

**“Goshadash” exploration well №1 (“Khazar-6” floating drilling unit).** The target depth of the well is 3500 m, target horizon is Mesozoic (Lower Cretaceous + Jurassic), depth of water is 25m, height of rotary table is 25 m. The drilling works were commenced on 11.07.2012. Drilling works to the extent of 1584 m were performed in the reporting period. Cementation works were conducted due to the complications (gas appearances, absorptions) occurred in the well in the depth of 1584 m. While lifting the tool, it was found to have been retained. Nevertheless various geotechnical actions were taken to release the retained drill tool and to eliminate the complication, it was not possible to eliminate the accident occurred in the well due to the existing difficult geological-technological situation. The well passed to 2013 with drilling. It was decided to stop emergency response actions in exploration well №1 drilled in 1584 m depth through “Khazar-6” floating drilling unit in “Goshadash” structure and to abandon the well under IIIa category for technical reasons in order to prevent extra costs might be arisen later in view of impossibility of the emergency response actions. The well passed to 2014 to be abandoned.

**"Goshadash" exploration well №2 ("Khazar-6" floating drilling unit).** The target depth of the well is 3500 m, target horizon is Mesozoic (Lower Cretaceous + Jurassic), depth of water is 25m, height of rotary table is 25 m. The drilling works were commenced on 02.06.2013. Drilling works to the extent of 1314 m were performed in the reporting period. In the course of the drilling works, rock samples were taken to the extent of 1221-1227 m (3.6 m) və 1300-1305 m (2.5 m). Lack of capacity of the drilling rig to deliver to target depth of the well, low output of drilling pumps, space limitation of the floating rig and impossibility of placement of additional equipment, low-level status of mud system, poor hydraulic system of pillars, malfunctioning of diesel generator, incompliance of preventor system with technical requirements and other shortages and in view of eventuality of reservoirs saturated with high-pressure gas in an interval to be drilled later, delivery of the well to the target depth deemed to be highly risky. So, considering the lack of capacity of the "Khazar-6" floating drilling unit to deliver to target depth of the well, it was decided to stop drilling works in exploration well №2 drilled in 1314 m depth in "Goshadash" structure and to abandon the well under IIIa category for technical reasons.

The well passed to 2014 to be abandoned.

**"Tumbul" prospecting well №1.** Exploration-prospecting and drilling works were started in order to create gas storages in Tumbul area of Nakhichevan AR in respect to execution of Action Program approved for improvement of gas supply and enhancement of gas production of the Republic. The target depth of the well is 1000 m, target horizon is middle Miocene Kong-Karaganga. The drilling works were commenced on 11.01.2013. Drilling works to the extent of 1150 m were performed in the reporting period. Salt formations were discovered in 631-688 m interval in log of the well drilled in 1000 m depth. According to joint interpretation of 2D, 3D seismic works carried out in the field and mining-geophysical survey, seismic logging and vertical seismic profiling works conducted in the drilled well, the target depth of the well was enhanced and accepted as 1150 m due to recurrence of similar wave zone peculiarized with amplitude-frequency aspect of seismic wave zone generated by the salt formation which discovered in 631-688 m interval in log of "Tumbul" prospecting well №1 in view of probability of occurrence of prospective salt formation in the same interval. As per results of analyses of core samples and rock cuttings taken from the well drilled in 1150 m depth, the drilling works in 1150 m depth were stopped due to appearance of Oligocene-Miocene rocks in such interval and non-probability of occurrence of the salt formation later.

Rock samples were taken through column tools in 41 m interval starting from 47 m interval up to 1150m and analyzed at the laboratories of "Azlab" LLC and "Geolab" International Scientific Production Company in order to survey stratigraphic sequence, lithological and reservoir properties of the rocks. According to results of analyses of the core samples and rock cuttings, occurrence of salt formation in 631-688 m interval.

Pursuant to minutes dated 16.12.2013 approved by first vice-president of SOCAR, Mr. Kh.Yusifzade, it was decided to hand over well №1 for conservation up to completion of prospecting period in Tumbul field.

**"Tumbul" prospecting well №2.** The target depth of the well is 1000 m, target horizon is middle Miocene Kong-Karaganga. The drilling works were commenced on 18

01.11.2013. Drilling works to the extent of 657 m were performed in the reporting period. The well passed to 2014 with drilling in 657 m depth.

**“Shah-Deniz” field exploration (appraisal) well №SDX-7 (WF1) (“Istiglal” SDDR).** The target depth of the well is 6167 m, target horizon is Pereriv formation of productive strata, azimuth 76°, deviation 2105 m, depth of water is 163 m, height of rotary table is 22.6 m. The drilling works were commenced on 21.03.2011. The well (Sabunchu suite) passed to 2013 with drilling (seabed 4940 m). Drilling operations to the extent of 1243 m were carried out in the reporting period. Actual depth of the well was 6183 m, horizon is Pereriv formation of productive strata (B+C+D), average total azimuth is 74.50 and deviation is 1759 m in 6162 m depth. Balakhany IX horizon of productive strata was fully opened in 5654-5781 m interval, X horizon in 5857-5928 m interval, Pereriv formation in 5943-6167 m (B-5943-5969 m, C-6071-6108 m, D-6122-6167 m) interval in the well. Well geophysical surveys were run throughout the hole. Lithology of stratigraphic sequence was surveyed through rock cuttings and core sampling. Trial test works were performed through reservoir tester (“DST”) in Pereriv formation (in B-5943-5969 m interval). As a result of test works, daily 1.16 mln. m<sup>3</sup> gas, 250 ton condensate was calculated. Conservation works were carried out in the well towards implementation of underwater production within Shah Deniz 2 (SD-2) project.

The geological structure and oil & gas bearing of fields were studied as a result of the prospecting and exploratory works conducted by SOCAR and jointly with foreign companies in 2013.

## V. DEVELOPMENT OF OIL AND GAS FIELDS

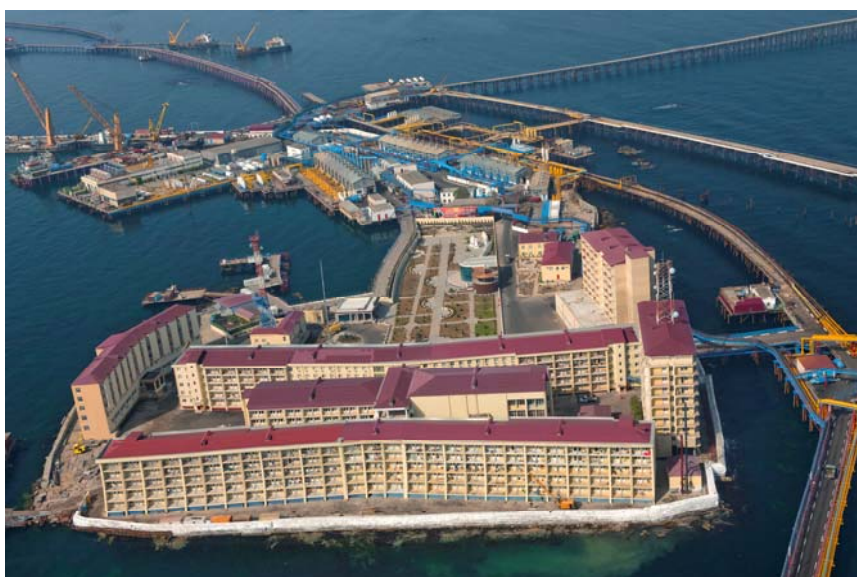
82 oil and gas deposits were discovered for the whole country up to 01.01.2014. At the present, the hydrocarbon is extracted from 59 deposits, 23 deposits have not been involved to the operations for this or other reason or their development have been abandoned. 40 fields of those under development are in onshore (including 16 fields are operated by "Azneft" PU, 24 fields by Joint Ventures and Operating Companies) and 19 of them are in offshore (including 13 fields are operated by "Azneft" PU, 6 fields by JVs and OCs) sites of Azerbaijan. 1843.0 mln. tons oil-condensate and 679.1 bln. m3 of gas were produced from the developed fields for the whole country from the beginning of the development up to 01.01.2014.

1.7 mln. tons oil-condensate and 0.2 bln. m3 of gas were produced on onshore and 41.8 mln. tons oil-condensate and 29.2 bln. m3 of gas were produced on offshore fields of the country in 2013.

323.2 mln. tons oil and 90.9 bln. m3 of gas have been produced on Azeri-Chirag-Gunashli oilfield from the beginning of the development (since 1997) by AIOC. Since May 2000 there started injection of water and gas to the Pereriv formation and 224.7 mln. m3 of water and 46.3 bln. m3 of gas were injected to the reservoir for maintaining pressure of the formation.

12.8 mln. tons oil-condensate and 0.2 bln. m3 of gas were produced on Shah Deniz field from the beginning of the development (since 2006) 43 ths. tons oil-condensate and 260 mln. m3 of gas were produced on Umid gas-condensate industry development field which involved in 2012 from the beginning of the development.

Development drilling to the extent of 135700 m were carried out in the fields operated by "Azneft" PU, 69 wells were put into operation (including 6 gas injection wells) and 170000 ths. tons oil were produced from these wells in 2013. 3.4 ths. tons oil were produced from 13 new wells drilled in onshore and 166.6 ths. tons oil were produced from 50 new wells in offshore. 31 new wells were put into operation by JVs and OCs.

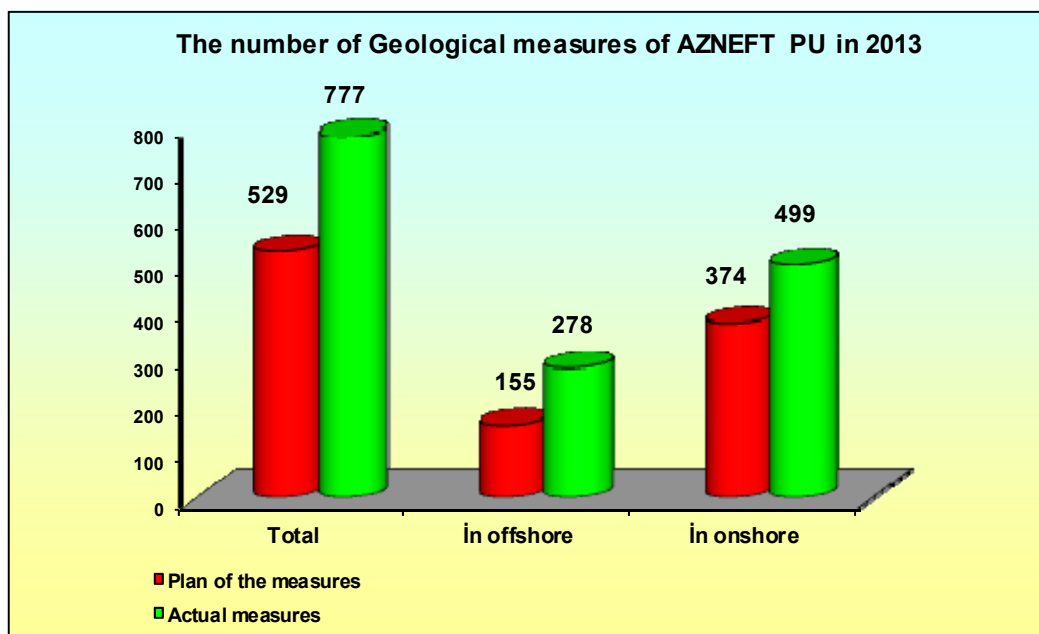


Analysis of results of the operation drillings carried out during the last years proves drilling and commissioning of new wells to be one of the key actions for stabilization and partial enhancement of production on wells. Well network under development is partially recovered through production drilling, old wells out of operation are replaced with new ones and subsequently, there emerged opportunities for necessary technological operation of any field.

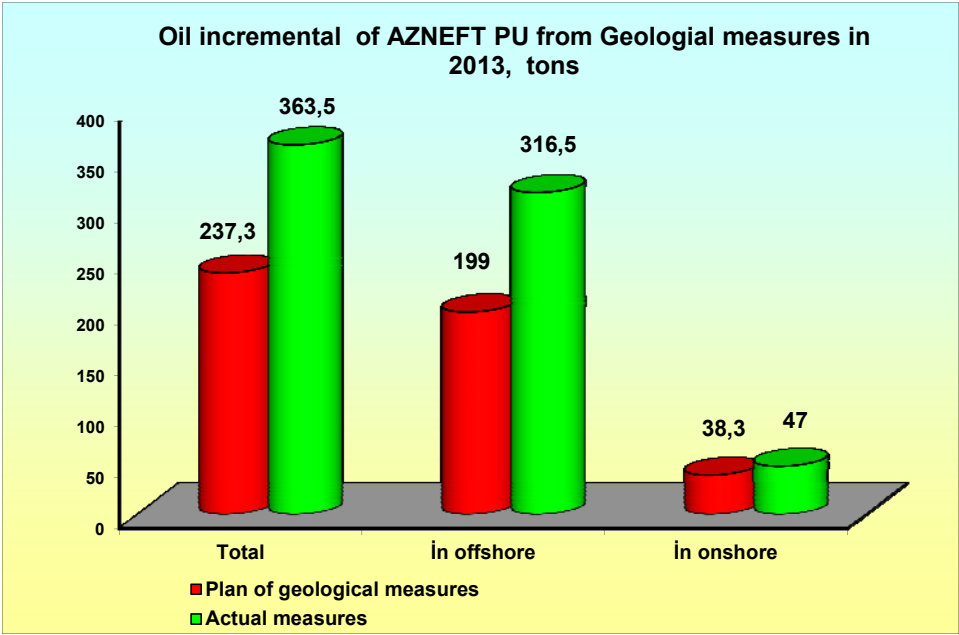
For maintaining pressure of the formation in the reservoirs on OGPDs of "Azneft" PU, there injected 3885.8 ths. m<sup>3</sup> water to the reservoirs and 115.9 ths. tons of additional oil were produced. For the purpose of the artificial conditions of the offshore fields water to the extent of 3186.6 ths. m<sup>3</sup> were injected to the reservoirs and as a result, 99.4 ths. tons of additional oil was produced. Also, for the purpose of the artificial conditions of the onshore fields water to the extent of 699.2 ths. m<sup>3</sup> were injected to the reservoirs and as a result, 16.5 ths. tons of additional oil was produced. There produced 272.3 ths. tons of additional oil, including 99.4 ths. tons oil in offshore and 172.9 ths. tons oil in onshore from water injected targets by "Azneft" PU and JVs respectively in 2013.

10.6 ths. tons oil of additional oil (including 10.4 ths. tons oil in offshore and 0.2 ths. tons oil in onshore) was produced by "Azneft" PU through other methods (III stimulation methods) for enhancement of the oil output of strata.

"Azneft" PU carried out 777 geological actions in 2013 and as a result of these actions, 363.5 ths. tons of additional oil was produced. 278 geological actions were carried out in offshore fields and as a result of these actions, 316.5 ths. tons of additional oil was produced. Also, 499 geological actions were carried out on onshore fields and as a result, 47 ths. tons of additional oil was produced.



**Diagram V-1**



*Diagram V-2*

## VI. DRILLING

The drilling works were carried out to the extent of 142656 m against plan of 174238 m by the drilling organizations of SOCAR in 2013 and the plan for both purposes was fulfilled as 81.9%. The plan for development drilling was fulfilled as 83.9%, i.e. 135665 m against plan of 161706 m. The plan for exploration drilling was fulfilled as 55.8%, i.e. 6991 m against plan of 12532 m.

74 wells (plan 95 wells) such as 70 operating wells and 4 exploration wells were completed with construction in 2013.

Plan for offshore drilling works was fulfilled as 89.7%, totally 95268 m against plan of 106180 m, including production drilling to the extent of 90084 m (plan 98378 m) such as 91.5%, exploration drilling to the extent of 5184 m (plan 7802 m) such as 66.4%. 40 exploitation wells and 2 exploration wells out of 45 exploitation wells and 2 exploration wells to be constructed, were finished.

Plan for onshore drilling works was fulfilled as 69.6%, totally 47388 m (plan 68058 m), including production drilling to the extent of 45581 m (plan 63328 m) such as 72.0%, exploration drilling to the extent of 1807 m (plan 4730 m) such as 38.2%. In total, 32 wells (plan 48) were finished with construction in 2013, including 30 exploitation wells (plan 43) and 2 exploration wells (plan 5).

Production drilling works were carried out in offshore - Umid, Gunashli, Neft Dashlary, Darwin section area, Pirallahy section area, Palchig Pilpilasi, 8 March fields and exploration drilling works were carried out in Bulla-deniz and Goshadash fields.

Production drilling works were carried out in onshore - Galmaz, Lokbatan, Pirallahy, Seadan, Amirkhanly and Garadagh fields and exploration drilling works were carried out in Tumbul field.

Drilling works to the extent of 124654 m were performed instead of planned 157338 m by "Complex Drilling Works" Trust. The plan was carried out on both targets to the extent of 79.2%, on production drilling plan was fulfilled to the extent of 81.3%; the drilling works were performed to the extent of 117663 m against plan of 144806 m. Exploratory drilling was fulfilled as 55.8% during the year and drilling works were performed to the extent of 6991 m as compared to plan to the extent of 12532 m. The plan on wells finished with construction by the Trust was fulfilled as 90.8% totally 68 wells (-22) instead of 90 wells were handed over. Neft Dashlary ODOD handed over 33 wells (-5) instead of 38 wells, Absheron DOD handed over 32 wells (-16) instead of 48 wells, Sahil DOD handed over 3 wells (-1) instead of 4 wells.

SOCAR-AQS LLC fulfilled the drilling progress plan to the extent of 106.5% in 2013. The drilling works to the extent of 18002 m were performed actually instead of 16900 m. 6 wells (+1) were handed over nevertheless 5 wells were assumed to be completed with construction.

Certain works were carried out in SOCAR on upgrading of the technical means,

utilization of the modern and new technologies concerning development of the drilling works in 2013.

Onshore drilling works were carried out in wells 477, 476 located in Garadagh field and offshore drilling works were performed in wells bored through jacket 2585 located in Neft Dashlary field and exploratory well Bulla-deniz 90 were carried out by new and modern drilling facilities and rigs produced by US and China companies. Use of such facilities have positively influenced to increase of the quality and the technical-economic parameters of the drilling works.

Construction works were commenced on approved project for new and modern semisubmersible floating drilling rig DSS 38E in order to run exploration and drilling works in the deepwaters of the Caspian Sea. Furthermore, exploration and prospecting works were carried out in Goshadash field through self-lifting floating drilling rig "Khazar-6" which overhauled, and it is supposed to be involved in exploration and prospecting drilling in Agburun area in 2014.

The process of replacement of drilling rigs, which used for long time by SOCAR in drilling of deep oil and gas wells in offshore and onshore fields, with cutting-edge rigs complying with world standards is ongoing. Two modern drilling rigs "ZJ-50" and two "ZJ-40" manufactured by Chinese company were purchased for drilling operations in 2013. Sustainable procurement of such new rigs has been planned. One drilling rig "ZJ-70" is being installed inside module of jacket 7 planned to be constructed in "Gunashli" field in order to continue drilling operations in offshore fields, too. Moreover, wells to be drilled through jacket 122, which constructed for full assessment and operation of hydrocarbon resources in Bulla-deniz field, are supposed to be drilled by drilling rig "ZJ-70". As it has been noted, totally 8 drilling rigs (four drilling rigs "ZJ-70", two "ZJ-70" and two "ZJ-40") were purchased for replacement of obsolescent rig fleet.

The use of new and modern technologies (PDC with high hydromonitor effect, as well as bicentric bits, well bottom motors, MWD devices, stabilizers, JASS, thick-wall drill pipes and application of polymer and hydrocarbon-based drilling muds etc.) in the wells were important in view of acceleration of the drilling and prevention of the risks and accidents in the procedure.

Use of MWD devices resulted positively for regular control of parameters of well hole in drilling of the horizontal wells. So, our local specialists using such new technologies succeeded to drill first horizontal well 350 through deepwater jacket №13 located in Gunashli field.

Several softwares were purchased and delivered in industrial facilities in order to implement increase of process control over well drilling by SOCAR and to provide direct visual control of parameters of drilling practices. It has been positively influencing upon well drilling.

Fulfilment of the drilling works to the extent of 172022 m and consequently commissioning of 109 wells on SOCAR are forecasted in 2014. Proposals on drilling area concerning the improvement of the operational-financial situation of SOCAR:



Arrangement of drilling works according to international standards and wide use of the modern technologies are important for safe and efficient development of the drilling works. Implementation of the following actions are planned for achievement of the forthcoming purposes:

- Deployment of application of new modern mobile drilling rigs for improvement of quality indicators of well drilling;
- Upgrading of rig fleet in compliance with high requirements;
- Achievement of drill upside by using services of competent subcontractors through more advance techniques and technologies;
- Continuation of the drilling of the exploitation wells through current offshore drilling rigs in Umid, Bulla-deniz, Gunashli and Neft Dashlary fields as well as new jackets to be constructed for keeping annual oil and gas production stable;
- Application of new type products used for maintenance of ecological cleanness as well as prevention of pollution of reservoirs while well drilling
- Use of modern perforators reducing pollution of reservoirs and performance of such works through brines for perforation of casing pipe;
- Achievement of well completion with casing pipe and perforation through alternative technologies by gravel pack on back of filter pipe or filter by bottoming of extending filter and by cementation in compliance with every method selected;
- Continuation of exploratory-prospecting works in Aghburun and Eldaroyugu structure, and start-up of preparation works in Babek structure;
- Raising skills of the specialists; the arrangement of the company internal seminars, discussions, participation in seminars and conferences carried out by foreign companies and international organizations for increasing the effectiveness of the works carried out and works assumed to be implemented.



## VII. OIL AND GAS PRODUCTION

43.5 mln. tons oil and 29.4 bln. cubic meters gas were produced in the country in 2013. The oil production was less to the extent of 0.1 mln. tons and gas production was higher to the extent of 2.5 bln. cubic meters as compared to 2012;

8314.9 thousand tons oil (together with condensate) and 7140.1 mln. cubic meters gas were produced from fields developed by SOCAR in 2013.

### Oil production on SOCAR, thousand ton

Table VII.1

	2013				2012 actual	2013/2012 difference +/-
	forecast	actual	+ / -	%		
SOCAR	<b>8250</b>	<b>8314,9</b>	<b>64,9</b>	<b>100,8</b>	<b>8289,8</b>	<b>25,1</b>
"Azneft" PU	6752	6808,0	56,0	100,8	6807,6	0,4
OC/ JV	1454	1477,1	23,1	101,6	1469,4	7,7
SOCAR Umid LLC	44	29,8	-14,2	67,7	12,8	17,0

8314.9 thousand tons oil (together with condensate) and 7140.1 mln. cubic meters gas were produced from fields developed by SOCAR in 2013 that subsequently forecast was fulfilled higher to the extent of 64.9 thousand tons, i.e. 100.8%. The oil production in 2013 was higher to the extent of 25.1 thousand tons as compared to 2012.

32717.7 thousand tons oil was produced from ACG fields and 2451.3 thousand tons condensate was produced from Shah Deniz field in 2013.

### Gas production on SOCAR, million m3

Table VII.2

	2013				2012 actual	2013/2012 difference +/-
	forecast	actual	+;-	%		
SOCAR	<b>6745</b>	<b>7140,1</b>	<b>395,1</b>	<b>105,9</b>	<b>6924,5</b>	<b>215,6</b>
"Azneft" PU	6170	6573,2	403,2	106,5	6517,5	55,7
OC/ JV	305	383,8	78,8	125,8	330,5	53,3
SOCAR Umid LLC	270	183,1	-86,9	67,8	76,6	106,5

The gas production forecast was fulfilled to the extent of 105.9 % and totaled to 7140.1 mln. m3 on SOCAR in 2013. The gas production was higher to the extent of 215.6 mln. m3 as compared to 2012.

There produced gas by SOCAR from ACG field to the extent of 2207.4 mln. cubic meters and from Shah Deniz field to the extent of 4887.8 mln. cubic meters in the reporting period.

96.1% of the produced oil was extracted from declining well stock, 2.7% from the new wells and 1.2% from the non-operating stock:

Table VII.3

	Total oil production, ths. tons	Including:					
		On declining well stock		On wells of non-operating stock		On new wells	
		Production, ths. tons	Share in total production, %	Production, ths. tons	Share in the total production, %	Production, ths. tons	Share in the total production, %
<b>SOCAR</b>	<b>8314,9*</b>	<b>7990,6</b>	<b>96,1</b>	<b>101,2</b>	<b>1,2</b>	<b>220,4</b>	<b>2,7</b>
"Azneft" PU	6805,3	6558,2	96,4	68,4	10,1	178,7	2,6
OC/JV	1477,1	1402,6	95,0	32,8	22,2	41,7	2,8
SOCAR Umid LLC	29,8	29,8					

\* 2.7 thousand tons condensate generated from Underground Gas Storage is added.

20.4% of the total oil production was carried out by blowout, 58.4% by gaslift and 21.2% by borehole pump methods:

Table VII.4

	Total oil production (ths. tons)	including:					
		Blowout		Gas lift (air-lift)		Borehole pumps and swabbing	
		Production (ths. tons)	Share in the total production, %	Production (ths. tons)	Share in the total production, %	Production (ths. tons)	Share in the total production, %
<b>SOCAR</b>	<b>8314,9*</b>	<b>1693,0</b>	<b>20,4</b>	<b>4859,1</b>	<b>58,4</b>	<b>1760,1</b>	<b>21,2</b>
"Azneft" PU	6805,3	1608,6	19,3	4705,3	56,6	491,4	5,9
OC/JV	1477,1	54,6	0,7	153,8	1,8	1268,7	15,3
SOCAR Umid LLC	29,8	29,8	0,4				

\* 2.7 thousand tons condensate generated from Underground Gas Storage is added.

The well stock on SOCAR up to 01.01.2014 is shown in the following table: the operating well stock totaled to 9141 wells (including 182 gas wells), the development well stock totaled to 6843 wells (including 126 gas wells):

Table VII.5

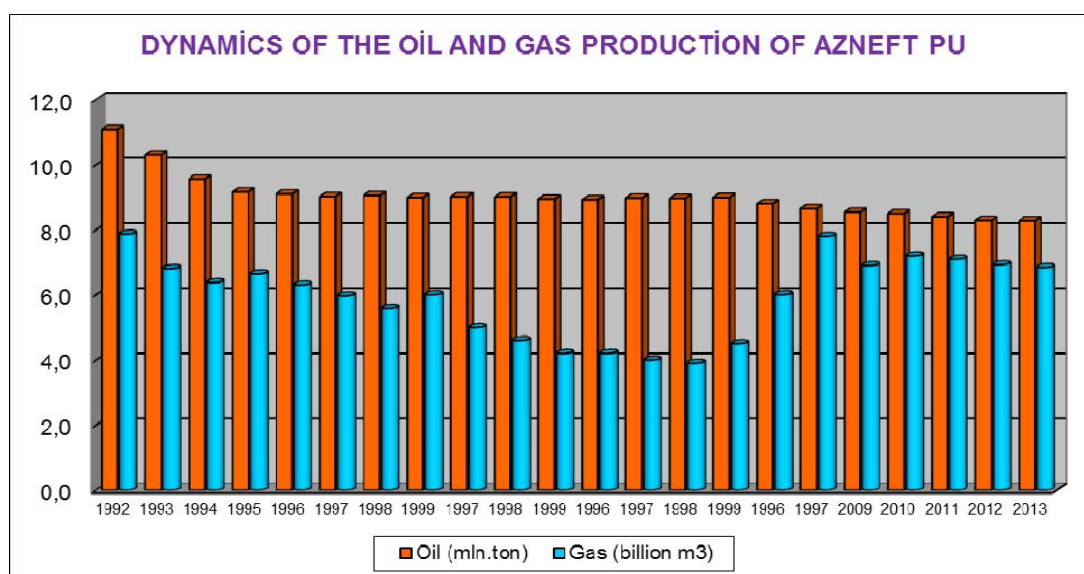
	Operating well stock		Development well stock		Non-operating well stock		Well development after drilling	
	01.01.13	01.01.14	01.01.13	01.01.14	01.01.13	01.01.14	01.01.13	01.01.14
<b>SOCAR</b>	<b>9120</b>	<b>9141</b>	<b>6682</b>	<b>6843</b>	<b>2409</b>	<b>2263</b>	<b>29</b>	<b>35</b>
"Azneft" PU	3828	3744	3224	3303	586	421	18	20
OC/JV	5291	5396	3457	3539	1823	1842	11	15
SOCAR Umid LLC	1	1	1	1				
<b>UGS</b>	<b>165</b>	<b>158</b>	<b>142</b>	<b>148</b>	<b>23</b>	<b>10</b>	<b>0</b>	<b>0</b>

Western Chirag platform through which annual oil production was forecasted to be reached to 8.8 mln. tons, was launched.

The active gas volume in "Garadagh" and "Galmaz-2" underground gas storages (UGS), which are the property of Gas Storage Exploitation Unit, was reached to 3423.0 mln. m<sup>3</sup> in 2013. Gas to the extent of 1877.0 mln. m<sup>3</sup> was pumped to "Garadagh" UGS and 1546.0 mln. m<sup>3</sup> gas was pumped to "Galmaz" UGS that as a result, the formation pressures increased from 99 atm to 192 atm in "Garadagh" UGS, while from 68 atm to 160 atm in "Galmaz" UGS.

Integrated actions developed and carried out on oil and gas recovery by SOCAR in 2013 are as follows:

- Surveys were carried out for involvement of exploration targets to intensive development, oil and gas resources were reestimated and infrastructures were expanded through designing of new hydrotechnical facilities and construction works in view of optimization of field development projects and remaining oil & gas reserves. Furthermore, design and construction of jackets 112 in "Chilov" field, jackets 1954a, 602a, 1637a in "Neft Dashlary" field and jackets 700 in Darvin bank field were started and construction of fixed deepwater jackets 20 in "Western Absheron" field was continued and enhancement of oil recovery was achieved as result of the taken actions.
- Expansion works were completed for drilling of 6 wells at fixed deepwater jacket 14 in "Gunashli" field. Construction works at fixed deepwater jackets 418a and 2150 in "Neft Dashlary" field and construction of fixed deepwater jacket 740 in "Darvin bank" field and of platforms 1140 at onshore of "Absheronneft" OGPD were completed.
- New gas distributing facilities supplied with modern equipment for 60 wells were installed and put into operation at jackets 3, 4, 5, 14, 15 in "Gunashli" field.
- Scientific-research and engineering works were expanded and state-of-the-art technologies were tested and applied in the production in order to optimize oil and gas recovery processes from technological and economic standpoints. Furthermore, positive outcomes were resulted from application of different structured depth pumps, chemical compositions, nanotechnologies, new repair and maintenance equipment;
- Works on installation of vacuum compressors in platforms were continued in order to collect low-pressure gases in "Neft Dashlary" OGPD and daily average gas to the extent of 970 thousand m3 was collected and delivered through overall 69 compressors and elimination of environmental damage was achieved;
- Design and construction works were expanded towards refurbishment of the fields being under development for a long time and reconstruction works were carried out in optimization of oil & gas collection-delivery systems and utilization of produced waters in "Pirallahy", "Bibiheybat" and other fields.



## VIII. COLLECTION AND TRANSPORTATION OF GAS

### **The following actions were implemented in the area of collection and transportation of gas:**

- Associated gas to the extent of 900-1000 thousand m<sup>3</sup> per day is collected from the wells and returned to the system by 69 OGC vacuum compressors which installed in sites for collection of low pressure gas in "Neft Dashlary" OGPD.
- Collection of 4 panels in Zyxh field of gas-lift compressor station in deep water jacket №4 of "28 May" OGPD was completed and transported onto expanded part of the deep water jacket №4. At the present, interpanel communication lines are being connected and set up.
- Gas output of Umid field has been handed over to ashore since September 2012.
- The several works in gas collection and transportation field in onshore OGPDs are ongoing.

Reconstruction works were continued in terms of increase of the volume of active gas of Garadagh and Galmaz Underground Gas Storages.

Totally gas to the extent of 13335.6 mln.m<sup>3</sup> was handed over from outlet of Gas Processing Plant, directly from OGPDs, JVs, OCs and Sangachal Master Facilities (ACG and Shah Deniz) in 2013.

Gas to the extent of 9288.4 mln. m<sup>3</sup> countrywide, including 5073.2 mln. m<sup>3</sup> was sold to Azerenergy JSC, 2021.6 mln. m<sup>3</sup> to subscribers, 1382.7 mln. m<sup>3</sup> to industrial enterprises, 280.8 mln. m<sup>3</sup> communal - public sector entities and 350.1 mln. m<sup>3</sup> to "Nakhichevangaz" PU in 2013.

Gas to the extent of 2412.5 mln. m<sup>3</sup>, including 1037.4 mln. m<sup>3</sup> was exported to Georgia and 1375.1 mln. m<sup>3</sup> to Russia in 2013. Besides, interchange gas to the extent of 424.0 mln. m<sup>3</sup> was transported to the Islamic Republic of Iran in 2013 in order to provide Nakhichevan AR with natural gas.

Supply of consumers with uninterrupted natural gas in autumn-winter season and management of surplus gas volumes in spring-summer season are regulated with gas intake from Underground Gas Storages and gas injection to Underground Gas Storages accordingly.

Gas to the extent of 1661.5 mln. m<sup>3</sup> was taken from Garadagh and Galmaz Underground Gas Storages existing in the republic in winter months of 2013 (January-April and November-December).

The measures were carried out in the gas supply field in Republic in 2013:

Gas pipelines totally to the extent of 1774.7 km on "Azerigaz" PU were overhauled in 2013, including gas supply network of Baku city to the extent of 848.6 km, gas supply

network of the regions to the extent of 921.4 km, main gas pipelines to the extent of 4.7 km in 2013.

New gas pipelines totally to the extent of 9048.1 km were installed in 2013, including - gas supply network of Baku city to the extent of 671.1 km, - gas supply network of the regions to the extent of 8370.2 km, main gas pipelines to the extent of 6.8 km.

Newly installed gas distributing and regulatory points totaled to 5, overhauled gas distributing and regulatory points totaled to 2.

Total 449157 domestic gas meters were installed and replaced in apartments of the subscribers, including - 209351 meters in Baku, - 239806 meters in regions. In general, the provision level of domestic gas meters for subscribers who supplied with natural gas reached to 99.99% for overall Republic.

263905 "smart-card" type domestic gas meters installed and replaced for subscribers, including 205963 meters in Baku and 57942 meters in regions.

217 localities were supplied with gas by "Azerigaz" PU in 2013 and they received natural gas.

The number of new subscribers supplied with gas totaled to 167536, including 41706 subscribers in Baku and 125830 subscribers in regions in 2013.

The total number of the subscribers utilizing the natural gas was 1628076, including 691448 subscribers in Baku and 936628 subscribers in regions and up to 01.01.2014 (Diagram VIII.1).

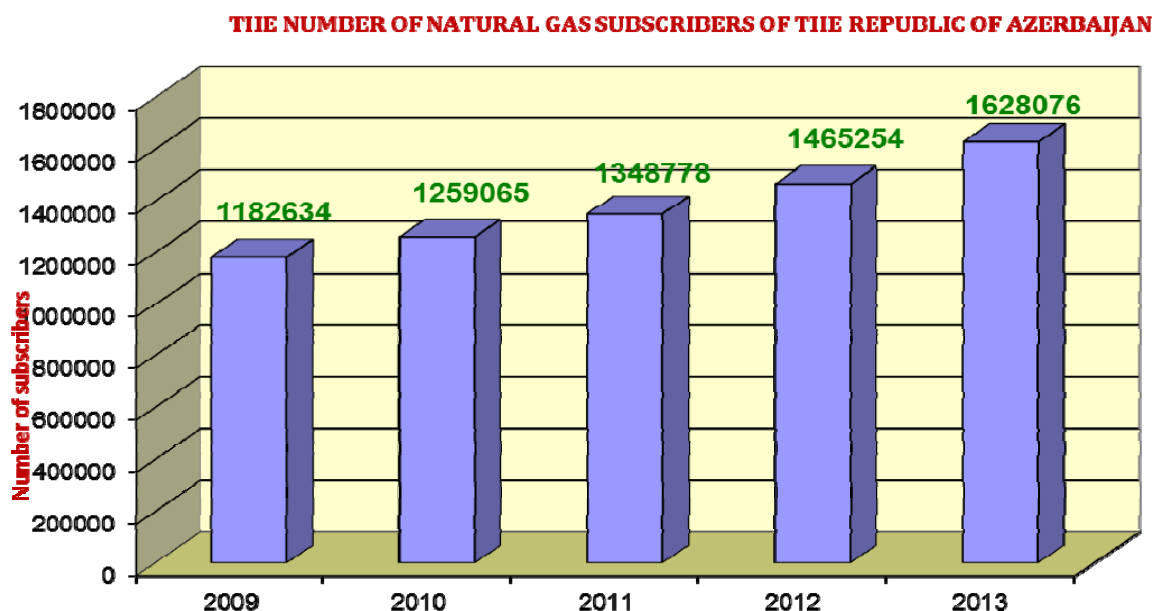


Diagram VIII.1

Main gas pipelines overhauled by Gas Export Department totaled to 89.6 km and newly installed gas pipelines totaled to 4.56 km.

Gas distributing and regulatory points newly installed by Gas Export Department totaled to 4, overhauled gas distributing and regulatory points totaled to 23.



## IX. OIL AND GAS PROCESSING AND PETROCHEMISTRY

**Oil refinery.** In 2013 the employees of the oil refinery complex of SOCAR worked successfully for providing the demand of our country on oil derivatives and for implementing the commitments of the Company on exporting oil derivatives as every year. 6533 thousand tons crude oil were processed in the refinery complex of SOCAR in 2013. Out of the crude oil refined in the reporting period, there derived 1407.1 thousand tons gasolines, 703.2 thousand tons jet kerosene, 2307.5 thousand tons diesel fuels, 244 thousand tons liquid gas, 312.7 thousand tons petroleum bitumen, 223 thousand tons coke and other products. The output of the light-colored petroleum derivatives increased as 3.0% as compared to forecast and output of coke and bitumen products derived from heavy fractions increased as 8.0% which resulted from effective use of the potential of recycling facilities in the plants in the reporting period. The processing depth totaled to 92.0% as a result of such actions and others (Diagram IX.1).

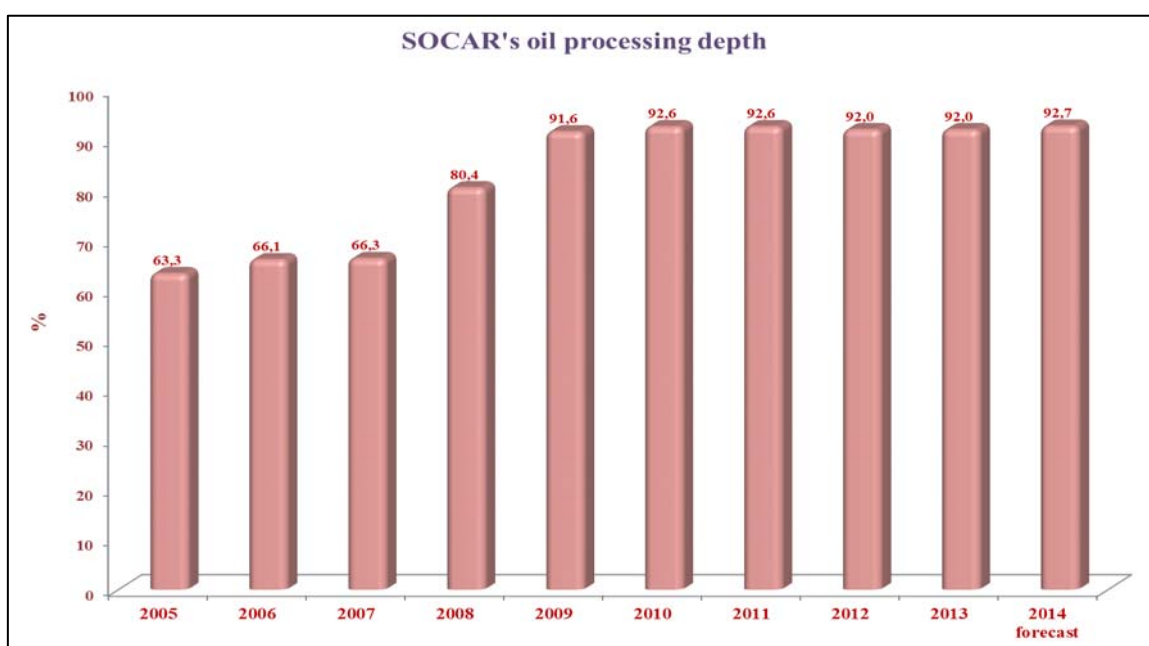


Diagram IX.1

Nevertheless scope of the processed crude oil increased as 5.8% in relation to 2012, gasolines increased as 8.5%, jet kerosene increased as 12.3%, diesel fuels increased as 5.2%, liquid gas increased as 27.8%, DT type engine fuel increased as 5.8% and petroleum bitumen increased as 8.5% (Table IX.1).

### ***Oil refinery and the production of oil derivatives in 2012-2013***

Table IX.1 (in thousand tons)

	2013			2012	
	Forecast	Actual	%	Actual	%
<b>Oil refinery-total</b>	<b>6400,0</b>	<b>6533,0</b>	<b>102,1</b>	<b>6172,5</b>	<b>105,8</b>
including H.Aliyev Baku Oil Refinery	4300,0	4241,3	98,6	4002,5	106,0
"Azerneftiyagh" Oil Refinery	2100,0	2291,7	109,1	2170,0	105,6
<b>Gasolines – total</b>	<b>1557,8</b>	<b>1514,5</b>	<b>97,2</b>	<b>1416,6</b>	<b>106,9</b>



including petrol	1357,8	1407,1	103,6	1296,6	108,5
From it A-95	40,0	160,9	402,3	61,4	262,1
A-92	1308,8	1234,9	94,4	1226,6	100,7
A-80	9,0	11,3	125,6	8,6	131,4
Oil fractions for chemical	200,0	107,4	53,7	120,0	89,5
Jet kerosene	630,0	703,2	111,6	626,4	112,3
Diesel fuel:	2204,5	2307,5	104,7	2193,6	105,2
<b>Light-colored products</b>	<b>4392,3</b>	<b>4525,2</b>	<b>103,0</b>	<b>4236,6</b>	<b>106,8</b>
Liquid gas, in total	263,1	244,0	92,7	191,0	127,8
Treated dry gas	84,4	52,5	62,2	34,4	152,9
Engine fuel DT	382,6	187,9	49,1	177,6	105,8
Lubricant oils	73,0	46,6	63,8	62,7	74,3
<b>Furnace fuel oil</b>	<b>176,4</b>	<b>268,0</b>	<b>151,9</b>	<b>267,2</b>	<b>100,3</b>
Oil bitumen	296,5	312,7	105,5	288,1	108,5
Oil coke	199,6	223,0	111,7	231,0	96,5
Processing depth	93,1	92,1	98,9	92,0	100,1

74.0% of overall petroleum derivatives produced within the year was exported to domestic market, the remaining 26.0% was exported abroad. 2791 thousand tons motor fuel was delivered to inside of the republic that 50% of the aforesaid comprised automobile gasoline. As compared to 2012, volume of motor fuels sold inside of the republic in 2013 increased as 219.9 thousand tons or 8.6% that out of it 45% made up by automobile gasoline, 55% by diesel fuel.

Output of petroleum derivatives was considered in Table IX-2 subject to dependency from loading of running processing units with crude in refineries.

### Information on loading of processing units with crude in refinery complex of SOCAR

Table IX.2 (in thousand tons)

Units	2013			2012	
	Forecast	Actual	%	Actual	%
<b>At Baku Oil Refinery:</b>					
Roughing-out unit N21	4300,00	4256,19	99,0	4018,23	105,9
including residual oil	0,00	14,91		15,72	94,8
Catalytic reforming unit N31	636,20	539,07	84,7	544,68	99,0
Delayed coking unit N43	950,92	1239,26	130,3	955,45	129,7
Fluid catalytic cracker N55	1885,09	1996,46	105,9	1679,34	118,9
Hydrotreatment section N100	2413,90	2214,84	91,8	1977,11	112,0
<b>At "Azereftyagh" Oil Refinery:</b>					
Roughing-out unit N202	1000,00	1258,15	125,8	1232,07	102,1
including residual oil	-	24,49		26,53	92,3
Roughing-out unit N305	1100,00	1058,01	96,2	964,44	109,7
Bitumen output unit N401	297,99	314,09	105,4	289,37	108,5
Hydrotreatment unit N501	891,56	323,26	36,3	262,97	122,9



Off-schedule overhaul and maintenance of processing units caused to non-fulfilment of refinery forecast in some processing units.

Data on output interests of designated products in processing units characterizing efficient refinery of crude and consumption of crude for designated products in plants are reviewed in Table IX.3.

Information on output interests of designated products in processing units (%)

Table IX.3

Units	2013			2012	
	Forecast	Actual	Difference	Actual	Difference
<b>At Baku Oil Refinery:</b>					
Roughing-out unit N21	46,0	45,7	-0,3	46,1	-0,4
Catalytic reforming unit N31	83,0	83,0	0,0	83,0	0,0
Delayed coking unit N43	84,0	64,8	-19,2	79,6	-14,8
Fluid catalytic cracker N55	58,0	56,9	-1,1	55,2	1,7
<b>At "Azerneftiyagh" Oil Refinery:</b>					
Roughing-out unit N202	52,4	54,8	2,4	55,7	-0,9
Roughing-out unit N305	52,4	52,7	0,3	53,0	-0,3
Bitumen output unit N401	99,5	99,5	0,0	99,5	0,0

As evident from the Table that plan on output interests of designated products in all processing units was fulfilled except to roughing-out unit, delayed coking units and fluid catalytic cracker of Baku Oil Refinery in 2013. In the reporting year output of designated product in roughing-out unit of Baku Oil Refinery was fulfilled as 0.3%, in delayed coking unit fulfilled as 19.2%, in catalytic cracker fulfilled as 1.1% shortage. The output of the designated product on catalytic reforming unit and bitumen output unit were stable and roughing-out unit of "Azerneftiyagh" Oil Refinery increased as 2.7%.

**About the losses of oil and petroleum derivatives.** Design and regulation documents of each processing unit operated in oil refinery complex show data on loss norms generated during the process. Therefore, the formation of the losses depends on the volume of the raw material processed in roughing-out units during forecast in plants. The staff of the oil refinery plants carried out systematic works in the direction of the minimizing the losses. As a result, the amount of the losses were lower from

the expected amount by norms for the actually refined raw material to the extent of 4.1 thousand tons or 0.07% in H. Aliyev Baku Oil Refinery, the amount of the losses were lower to the extent of 6.6 thousand tons or 0.28% in "Azerneftiyagh" Oil Refinery in 2013. Total amount of the losses in overall refinery complex were lower from the expected amount by the forecast norms for the actually refinery to the extent of 10.7 thousand tons.

**About the consumption of catalyzer and reactant.** Different catalyzers and reactants are used for the normal operation of each process according to the regulations in the exploited technological units in plants. The consumption of the catalyzers and reactants was accordingly lower from the expected amount calculated for the actual refinery by the forecast norms to the extent of 2.6 and 2.5 thousand tons in Baku Oil Refinery and "Azerneftiyagh" Oil Refinery in the reporting year. Different catalyzers and reactants were saved to the extent of 5.1 thousand tons in the reporting year and 4.3 thousand tons out of it were sodium chloride, sulphate acid and gumbrine in the reporting year.

**About the consumption of fuel and energy resources.** Taking into consideration the major role of the consumption of fuel and energy resources in the formation of expenses concerning the production of petroleum derivatives, information related to their consumption were review in the reporting year (Table IX.4).

*About the consumption of fuel, thermal and electrical power in oil refinery complex in 2013*

Table IX.4

Indicators	Unit of measurement	Consumption on norm	Actual consumption	Savings (-) surplus consumption (+)
<b>H. Aliyev Baku Oil Refinery</b>				
Fuel:	tfe	566681	570500	3819
Including Natural gas	->-		137887	
Liquid fuel	->-		16703	
Dry gas	->-		327866	
Coke fuel	->-		88044	
Electrical power	ths. kW/h	463524	375398	-88126
Thermal power	Hcal	602103	436246	-165857
Utilizator boilers	->-		399897	
From S-2 furnace	->-		36349	
<b>"Azerneftiyagh" Oil Refinery</b>				
Fuel	tfe	83093	74341	-8752
Electrical power	ths. kW/h	105364	69106	-36258
Thermal power	Hcal	467798	283945	-183853
<b>Total:</b>				
Fuel	tfe	649774	644841	-4933
Electrical power	ths. kW/h	568888	444504	-124384
Thermal power	Hcal	1069901	720191	-349710

\*tfe – ton fuel equivalent

Analysis of the information about the consumption of fuel and energy resources indicates that process fuel, thermal and electrical power resources were utilized efficiently. The energy resources were saved in oil refineries and process fuel was<sub>35</sub>

saved to the extent of 4.9 thousand tons, electrical power was saved to the extent of 124.4 mln. kW/h and thermal power was saved to the extent of 349.7 thousands Hcal as compared to the norms intended for the refinery in the whole oil refinery complex of SOCAR resulted from the different organizational and technical actions carried out in the direction of the reducing of energy resources in both plants during the reporting year.

**Gas processing and derivatives from gas processing.** Main indicators about the processing of natural gas and output of finished products on Gas processing plant were as follows in 2013 (*Table IX.5*):

*Information on processing of natural gas and output of finished products in gas processing plant in 2013*

*Table IX.5*

Products	Unit of measurement	2013			2012	
		Forecast	Actual	%	Actual	%
Natural gas	mln m <sup>3</sup>	4100,00	3768,83	91,9	3991,40	94,4
Treated dry gas	mln m <sup>3</sup>	4022,80	3703,00	92,1	3915,25	94,6
Production of technical butane	ths. tons	26,20	18,70	71,3	23,11	80,8
Production of gas gasoline (naphtha)	ths. tons	28,00	31,10	110,9	28,07	110,6

Evidently, actually gas to the extent of 3768.8 mln m<sup>3</sup> were processed in the plant and the forecast parameters were complied to the extent of 91.9 % in the reporting year. The compliance of the processing forecast with shortage was related to the low volume of the gas as compared to the forecast handed over to the plant by "Azneft" PU. This indicator was to the extent of 94.4 % in comparison with the relevant indicator of 2012. Technical butane was produced to the extent of 18.7 thousand tons and gas gasoline to the extent of 31.1 thousand tons alongside with the treated gas to the extent of 3703.0 mln. m<sup>3</sup> in the plant during 2013.

The whole volume of gas gasoline were delivered to "Azerikimya" PU and H.Aliyev Baku Oil Refinery, and 93.2% of technical butane were directed to sales for the internal market, 6.8% to export.

**The production of petrochemicals.** As a result of the stabilization of the production activity and improvement of the level of raw material, material and technical support in the processing enterprises "Azerikimya" PU finished the reporting year with the following technical-economic parameters as compared to 2012 (*Table IX.6*).

*Some main parameters of "Azerikimya" PU in 2013*

*Table IX.6*

Description of products	Unit of measurement	2013			2012	
		Forecast	Actual	%	Actual	%
Crude	ton	385500	287263,0	74,5	256652,7	111,9
Polyethylene	ton	105257	76186,4	72,4	67092,0	113,6
Propylene	ton	107978	78468,9	72,7	69157,4	113,5
BBF	ton	57054	40848,0	71,6	35014,0	116,7
Liquid pyrolysis resin	ton	30840	24815,0	80,5	20278,0	122,4
Hard pyrolysis resin	ton	73283	55385,0	75,6	54185,0	102,2

Pure IPS	ton	15420	15295,1	99,2	13082,3	116,9
Total of output	ton	15000	13825,6	92,2	7400,7	186,8
Total of commodity output	ton	422233	319910	75,8	276110	115,9
Total of commodity output	thousand Manat	284742	215114	75,5	189379	113,6

Petrochemistry raw material to the extent of 287.3 thousand tons were processed and 78.5 thousand tons ethylene, 40.8 thousands tons propylene, 95.5 thousand tons other valuable pyrolysis products were delivered in "Azerikimya" PU in 2013. Actual output interest of olefins in pyrolysis unit EP-300 totaled to 41.5%. Number of polyethylene produced within the year totaled to 76.2 thousand tons. Processing of crude and output of prime products in the reviewed period increased as 11-14% in comparison with relevant period of the year.

Information on the fuel, thermal and electrical power used "Azerikimya" PU in 2013 are shown in the following table (Table IX.7).

*The consumption of fuel, thermal and electrical power in Azerikimya PU*

*Table IX.7*

Nº	Energy resources	Unit of measurement	Consumption on norm	Actual consumption	(-savings) (+surplus consumption)
1	Fuel, natural gas	ths. m <sup>3</sup>	<b>314385</b> 237574 76811	<b>247024</b> 170213 76811	<b>-67361</b> -67361 0
2	Electrical power	ths. kW/h	222642,40	235861,87	13219,47
3	Thermal power	hcal	1685224,10	1669211,00	-16013,10

As evident from the table, fuel and thermal energy were economically used in refineries of "Azerikimya" PU in the reporting year.

22.8% of petrochemicals produced and sent for sale were sold in the domestic market and 77.2% were exported in 2013.



## X. PRIME COST

The ultimate products of SOCAR are oil, gas and petroleum derivatives. 85-90% of prime cost of petroleum derivatives constituted the expenses spent for crude oil. Therefore, analysis of prime cost of oil and gas are important. Prime cost is reviewed only on oil and gas production departments of SOCAR.

The productional prime cost of per ton of oil was 98.31 Manat in 2013 and 10.84 Manat or 12.4% were increased as compared to the appropriate period of the previous year.

The actual costs spent by Company to the oil production are shown in the following table.

*Table X.1*

<b>Cost items</b>	<b>Unit of measurement</b>	<b>2013</b>	<b>Share</b>	<b>2012 (comparison)</b>	<b>Share</b>
Utilized materials and components	thousand Manat	43503	6,4	35343	5,9
Fuel costs	->-	2007	0,3	1677	0,3
Electricity costs	->-	8637	1,3	7570	1,3
Salary expenses	->-	120761	17,7	105487	17,6
Social insurance and expenses of pension fund	->-	23143	3,4	20162	3,4
Depreciation of fixed assets	->-	94517	13,9	103804	17,4
Overhaul expenses	->-	96996	14,2	69371	11,6
Maintenance costs for fixed assets	->-	14113	2,1	11033	1,8
Exploitation of transport and transport means	->-	106642	15,7	85362	14,3
Security expenses	->-	14475	2,1	12406	2,1
Mine tax	->-	75264	11,0	75253	12,6
Other taxes	->-	26508	3,9	21885	3,7
Other services	->-	39916	5,9	34789	5,8
Other costs	->-	14659	2,2	13999	2,3
<b>Total production expenses</b>	->-	<b>681141</b>	100,0	<b>598140</b>	100,0
<b>Spent expenses for the commercial product</b>	->-	<b>666446</b>		<b>592662</b>	
Commercial product	ton	6778959,2		6775915,3	
<b>Cost price of per ton oil</b>	<b>Manat</b>	<b>98,31</b>		<b>87,47</b>	
Assessment of change of internal turnover and residuals	thousand Manat	14695		5478	

Share of the material and component costs in the composition of total output expenses spent for oil production on SOCAR amounted to 6.4%, salary to 17.7%, social allocations to 3.4%, depreciation of fixed assets to 13.9%, repair costs to 14.2%, maintenance costs to 2.1%, transportation costs to 15.7% and mine tax to 11% etc.

The actual productional prime cost of 1000 m3 gas was 38.02 Manat in 2013 and it reduced to the extent of 6.09 Manat or 13.8% as compared to the previous year.

The actual costs spent for the gas production on Company are shown in the following table.

Table X.2

Cost items	Unit of measurement	2013	Share	2012 (comparison)	Share
Utilized materials and components	thousand Manat	11356	5,0	12044	4,7
Fuel costs	->-	524	0,2	571	0,2
Electricity costs	->-	795	0,4	1203	0,5
Salary expenses	->-	25388	11,2	30171	11,8
Social insurance and expenses of pension fund	->-	5555	2,5	6414	2,5
Depreciation of fixed assets	->-	60901	26,9	78455	30,6
Overhaul expenses	->-	26755	11,8	24746	9,7
Maintenance costs for fixed assets	->-	1299	0,6	3936	1,5
Exploitation of transport and transport means	->-	33558	14,8	34028	13,3
Security expenses	->-	3427	1,5	4427	1,7
Mine tax	->-	38482	17,0	38127	14,9
Other taxes	->-	7315	3,2	7809	3,0
Other services	->-	8104	3,6	9680	3,8
Other costs	->-	2976	1,3	4442	1,7
<b>Total production expenses</b>	->-	<b>226435</b>	100,0	<b>256051</b>	100,0
<b>Spent expenses for the commercial product</b>	->-	<b>221734</b>		<b>256051</b>	
Commercial product	thousand m <sup>3</sup>	5831636,6		5804658,4	
<b>Cost price of 1000 m<sup>3</sup> gas</b>	<b>Manat</b>	<b>38,02</b>		<b>44,11</b>	
Assessment of change of internal turnover and residuals	thousand Manat	4701			

Share of the material and component costs in the composition of total output expenses spent for gas production on SOCAR amounted to 5.0%, salary costs to 11.2%, social allocations to 2.5%, depreciation of fixed assets to 26.9%, repair costs to 11.8%, maintenance costs to 0.6%, transportation costs to 14.8% and mine tax to 17.0% etc. Prime costs of 1000 m<sup>3</sup> commercial gas reduced as 6.09 Manat (13.8%) as compared to 2012 on SOCAR. Therefore, let us compare production prime cost of total output unit (without mine tax) indicators on table.

Table X.3

	Production prime cost of total output (without mine tax), in Manat		In comparison with 2012	
	2013	2012	%	+,-
1. Oil, 1 ton	87,21	76,36	114,2	10,85
2. Gas, 1000 m <sup>3</sup>	31,42	37,54	83,7	-6,12

As evident from the Table, the prime cost of oil increased and the prime cost of gas reduced in all directions of SOCAR. Increasing of the prime cost of oil was due to increasing of materials and components, salary, depreciation of fixed assets, exploitation of transport and means of transportation and other costs as compared to the last year. So, materials and components increased as 8160 thousand Manat (23.1%), salary expenses as 15274 thousand Manat (14.5%), exploitation of expenses for transport and means of transportation as 21280 thousand Manat (24.9%) and other costs increased as 660 thousand Manat (4.7%). Analysis shows that increasing of the prime cost of oil is due to increasing of overall prime costs and decreasing of overall production.

## **XI. PERSONNEL AND SALARY**

Personnel and Salary division of Economy and Record Department received 1239 documents. The received documents were duly executed after proper review by the relevant division.

Upon appropriate surveys, 545 documents out of the received documents were handed over to "permanently functioning Commission on determining the worktime standards, income and costs estimate and the organizational structure in the organizations constituting the management structure of the Company". 225 of the requests were about the making amendments in the personnel lists, approving the organizational structure and reviewing the optimal number of the employees of the organizations including in the Company, 43 of them were about stimulation of laying off of surplus labor forces due to implementation of actions for optimization of number of employees of SOCAR, 50 of them were about the application of "Rules on payment of the additional salary to the employees of SOCAR who participated in the execution of the commitments intended in the contracts signed between the enterprises and organizations of SOCAR and third parties", 59 of them were about the annual estimates of the administrative and maintenance costs and budget costs of the enterprises including to the structure of SOCAR, Affiliate oil companies and Representative offices, 32 of them were about the determining "the additional payments for the leading, administrative employees and according to authority" for the employees working in the enterprises including to the structure of the Company, 49 of them were on approval of "List of the determined professions and duties with hard and harmful working conditions in the enterprises and organizations of SOCAR", 20 of them were on reviewing the personnel lists of representative offices of SOCAR and the amount of the additional payments set for the employees working in those representative offices, 7 of them were on approval of the Regulations of the divisions and job descriptions of the employees of Head office, 6 of them were on the involvement of employees in overtime, 22 of them were on awarding and 32 of them were on miscellaneous issues.

Also, the other 694 requests and reports received were addressed properly and fulfilled accordingly.

Average number of employees in SOCAR in 2013 totaled to 65568 persons that as a subsequence, 5333 persons were reduced as compared to 2012 (70901 persons).

The main reasons of reducing average number of employees of the Company as 5333 persons (7.5%) in 2013 were related to execution of the following orders and statutory orders:

- According to statutory order on "Stimulation of laying off surplus labor forces due to implementation of actions for optimization of number of employees of SOCAR under order 81 and 14-29a dated 03 July 2012 of SOCAR and the Republican Committee for Oil and Gas Industry Employees Trade Unions", the employees was paid lump-sum compensation to the extent of 5-fold of average monthly salary (2269689 Manat) due to liquidation of work places;
- Improvement of efficiency of activity in Complex Drilling Works Trust and some enterprises of SOCAR under order 180 dated 28.12.2012 of SOCAR;
- Exclusion of Garachukhur Amalgamated Oil Mine from organizational structure of "Azneft" Production Unit according to order 169 dated 11.12.2012;



- Improvement of efficiency of activity in Caspian Sea Oil Fleet and some enterprises of SOCAR under order 51 dated 18.04.2013 of SOCAR;
- Improvement of structure of Geophysics and Geology Department under Order 104 dated 10 August 2012 of SOCAR;
- Improvement of structure of Caspian Sea Oil Fleet under Order 105 dated 10 August 2012 of SOCAR;
- Liquidation of "Organic synthesis" Plant and "Mechanical repair" Plant of "Azerikimya" Production Unit as well as structural changes within the Production Unit under Order 153 dated 01.11.2013 of SOCAR;
- Proper structural changes due to liquidation of Primary Education Unit of Social Development Department under Order 117 dated 24.08.2012 of SOCAR and liquidation of "Cultural-Mass Events, Rest Arrangement and Administration" division and "Medical Service Control and Insurance Arrangement" division of Social Development Department under Order 160 dated 01.11.2013 of SOCAR;
- Proper actions were carried out regularly for optimization of number of employees in the enterprises and organizations of SOCAR within 2013 in relation to execution of statutory order on "Stimulation of laying off surplus labor forces due to implementation of actions for optimization of number of employees of SOCAR" under order 81 and 14-29a dated 03 July 2012 of SOCAR and the Republican Committee for Oil and Gas Industry Employees Trade Unions.

Reduction of average number of employees of enterprises in 2013 in comparison with 2012 (5333 persons) was as follows:

- on Azneft Production Unit 357 persons;
- on Azerikimya Production Unit 610 persons;
- on Geophysics and Geology Department 166 persons;
- H.Aliyev Baku Deepwater Jackets Plant 1752 persons;
- on Social Development Department 1392 persons;
- on Complex Drilling Works Trust 732 persons;

Salary structure is reviewed and adequate proposals are developed on the basis of reports on salary and other payments being its equivalent calculated for enterprises included in structure of the Company.

Totally calculated salaries and other payments on SOCAR amounted to 660.39 mln. Manat in the reporting period that so, this figure is lower as 2.28 mln. Manat or 0.34% as compared to 2012 (662.67 mln. Manat).

Within the totally calculated salaries and other payments for the employees the amount of the tariff salaries was to the extent of 365.54 mln. Manat or the share in the wage fund was to the extent of 55.4% in 2013.

Average monthly salary of the Company employees amounted to 839.32 Manat. In comparison with 2012 (778.87 Manat), it increased as 60.45 Manat or 7.8%.

Main reason of increase of average monthly salary of per employee of the Company as 60.45 Manat or 7.8% is due to 10% increase of tariff salaries of the employees working in the enterprises included in the structure of SOCAR according to Statutory order №71 dated 16.05.2013 of SOCAR and Statutory order №02-13a dated 01.06.2013 of the Republican Committee for Oil and Gas Industry Employees Trade Unions.

The information on status of the balance of usage of the working time in structural organizations of the Company is analysed and proper proposals are developed.

Thus, in SOCAR maximum possible working time fund made 13414943 person/day in

2013 and 95% or 12687709 person/day of this time was used efficiently. Average monthly working time per one person is 16.2 person/day (12687709:65294:12), overtime work per one person makes 2.5 person/day (2261453:8: 9423:12).

The outcomes of attestation of work places conducted duly in the enterprises and organizations upon review by the division were submitted to the Central Attestation Commission to be considered and necessary documentation works were provided for relevant actions according to decision of the Commission.

Proper measures were assumed in order to determine and formalize list of work places at unfavorable climatic conditions and adequate statutory increase coefficients of tariff salaries.

The performers were encharged with appropriate methodical instructions and were supervised concerning rational application of the established increases to tariff salaries of the employees working in the enterprises and organizations, including statutory increases due to hard and hazardous production factors and unfavorable climatic conditions.

In respect to establish compliance of payment of salary of the employees working in the bodies included in the structure of the SOCAR to the applicable legislation and statutory documents of the Company, significant monitorings were carried out and there implemented general control over correct calculation of salaries of the employees.

## **XII. MECHANICS AND ENERGETICS**

Mechanics and energetics division of SOCAR closely took part in carrying out appropriate measures for fulfillment of government tasks by providing technical and methodical direction over energetics and mechanics services in structural units on the basis of norms and guidelines in exploration, development, production, processing, storage, transportation, distribution and usage of energy materials and products in 2013.

It increased control over certain operations and provided technical management over relevant organizations in regard to running electric equipment and facilities and extension of the facilities operating life and overhaul period in view of continuous and reliable maintenance of electricity supply of enterprises and organizations of SOCAR.

Preparatory works were carried out for autumn-winter seasons of 2013-2014 years, overhaul and current repair, corrective maintenance and pre-commissioning works were duly carried out in the power equipment, mechanical and energy facilities as well as power transmission lines.

The fulfillment of current repairs of pump jacks, pumping plants and electricity units and equipment of control panels of electrical engines under to the plan and the replacement of electric engines with the new ones were provided accordingly in mechanics and energetics.

As a result of the measures carried out, lack of power supply was eliminated and power reserve was increased and early failure cases were minimized by enhancing energy quality.

The electrical power was supplied on time for newly onstream drilling wells and the installation of casing equipment in the newly drilled wells were implemented.

The following works provided for enterprises were carried out in a planned manner in order to ensure safe and reliable operation facilities and equipment running in the balance of enterprises and departments:

Construction of new heat power station (new GTES) and central distribution unit in "Neft Dashlary" were completed and put into commission.

1 gas-turbo generator in old GTES was sent to Ukraine for overhaul and obsolescent gas-turbo generator 3 was replaced with the refurbished gas-turbo generator and recommissioned.

6 kV emergency subsea cable lines among DWJ (2-3); DWJ (6-11); DWJ (5-15) and DWJ (8-13) were refurbished and recommissioned, all electricity consumers were provided with new 0.4 kV Distribution Unit in DWJ 2.

First complex (subsea part) of newly laid 35 kV subsea cable line 3 between "Neft Dashlary" QTES-48 and DWJ-2 was put into operation.

New 6/04 kV 2x1000 kVA transformer point was installed and put into commission, and emergency diesel generator AKSA-703 kVA was connected into 0.4 kV electricity network of the transformer point.

Overall subsea cable lines (3.38 km) between SDWJs in "Absheron", "Darvin bank" and other fields were overhauled and returned to use. Control panel and 6/0.4 kV (1x160kVA and 1x630kVA) transformer points were installed in SDWJ 670 and 6 kV 3x95 subsea cable lines were laid to the extent of 420 m between SDWJS 340 and 670.

Construction of 6kV Distribution Unit was completed, facilities were procured and installed and set-up works started within the existing project "Reconstruction of Gradient unit and water pump-house" in Gas Compressor Station of N.Narimanov OGPD. The project "Replacement of facilities of 6kV part of 35/6 kV "Sangachalburnu" substation with state-of-the-art equipment" were completely finalized and put into commission. 6kV electricity transmission lines (ETL) between PSP 607 and 604 (4168 meter) were installed, subsea cable lines to the extent of 3.5 km were repaired and 0.4 kV electricity transmission lines were replaced with new ones to the extent of 1130 m.

Eight substation buildings were constructed under project "Transition from 2 kV power grid to 6 kV power grid" for A.Amirov OGPD and electrical equipment were installed in five substations in line with up-to-date standards. Besides, new electrical equipment installed in three substations were tested and adjusted, electricity transmission lines to the extent of 40.515 km were laid. Static condenser units were installed and put into use at the capacity of 450 kVAR in substation 503 and 450 kVAR in substation 510 in order to reduce power losses.

0.4 kV electricity transmission lines to the extent of 8510 m were strained and 0.4 kV electricity transmission lines to the extent of 9000 m were overhauled in intra-field power network of "Siyazanneft" OGPD. The parts such as 0.4 kV to the length of 2170 m, 6 kV to the length of 1450 m and 35 kV to the length of 600 m of 0.4 kV and 6 kV electricity transmission lines were cleaned from woods passing through forest massive which feed oil wells in Zykh field (OGPD 3). 0.4 kV electricity transmission lines to the length of 900 m were laid onto 10 oil wells after drilling and 0.4 kV electricity transmission lines to the length of 2500 m were laid onto 12 oil wells re-commissioned from non-operating stock and pump jack blocks and power engines were set up and put into operation. Obsolescent cable lines feeding control panels and power engines in 34 wells were replaced with new ones. The second 35/6 kV power transformer at the capacity of 2500 was installed and put into operation in Zeyva 35/6 kV substation.

6 and 0.4 kV type new facilities were installed and put into operation in Distribution Unit 865, 916, 917, 918 and 907 in the area of OGPD 3 and 4 in Buzovna field of H.Z.Taghiyev OGPD. New cable lines were laid from substation 491 up to compressor units 9, 10, 11, 12, 13, 14, 15, 16 which installed in integrated station 4. Three vacuum holes, three 6 kV power engines at the capacity of 200 kVt were installed in integrated station 4 for launching of compressor units 9, 10, 11 and two 6/0.4 kV transformer to the extent of 1000 kVA were installed and put into operation in integrated station 16. Static condenser units were installed and put into use at the capacity of 3500 kVAR in substation 491 and 1320 kVAR in Distribution Unit of integrated station 16 and in 720 kVAR in Distribution Unit of integrated station 913 (totally 5540 kVAR) in order to increase power coefficient of electricity network.

Old distribution units 2, 61, 94 were abandoned, three 6 kV distribution units (DU 2, DU 61, DU 94) newly constructed and supplied with modern equipment were put into use and 0.4 kV electricity transmission lines were replaced with 0.4 kV cable lines passing from such distribution units through to oil wells according to project "Construction of collection-transportation systems of reservoir products and area accomplishment on OGPS 1, 2, 5 of Bibiheybatneft" OGPD. Reliable power supply of 70 oil wells from operating stock was provided.

6 kV electricity transmission lines to the extent of 450 m were laid and Agammadli 35/6 kV substation provided energy in order to improve power supply of Jafarli area of Muradkhanly INM. The bent anchor pile of 35 kV air line feeding 35/6 kV substation 5 was refurbished, 3 piles damaged in 110 kV Sabirabad-Muradkhanly electricity transmission lines were replaced, 785 dirty insulators were washed up and cleaned and the broken insulators were replaced with new ones.

Works under the project for construction-assembly works of 35/6 kV substation in "Galmaz" area of Gas Storages Operation Unit were completed and put into operation and emergency diesel generator (Teksan 405 kVA) was connected into circuit on EAQ scheme which intended in GSS I block on design. Six 900 kVA uninterrupted power sources (UPS), two 1410 kVA diesel generators and two 1100 kVA diesel generators were put into commission in GCS. Five fluent launching units were put into operation in order to commission fluently and increase reliability of 250 kVt electric-drive water pumps in water pump-house in Galmaz GCS.

Reconstruction works were carried out in 110/6 kV substations 204N and 204P which supply production workshops of H.Aliyev Baku Oil Refinery with electricity. Exposure boxes of power engines of compressors PKA 101 (1, 2, reserve), PKA 102 (1, 2, reserve) in hydrotreatment unit (№100) were replaced with modern digital exposure boxes.

Routine maintenance and testing-setting works were carried out, low-voltage distribution facilities were reconstructed and electrical equipment were replaced with modern ones in electricity system of Azerneftlyagh Oil Refinery.

Reconstruction works were implemented in electricity supply of gas measurement junction of New Zabrat (Carpet manufacture) of Absheron CGCS, Zabrat-1 GSP, "Bina" GDS, Shorsulu GDS of Astara CGCS, Garabaghli CS of Hajigabul CGCS, Hajili GDS of Siyazan CGCS, Western Interstate Gas Measurement Junction and Morul GSP on the basis of design-estimate documents within Gas Export Department. Oil switches and circuit breakers (together with drives) were inspected and repair-setting works were carried out in 110/10 kV substation of Baku Deepwater Jackets Plant feeding Garadagh CS of Absheron CGCS, 10 kV DU of CS, DU of CS 2 of Astara CGCS, substation 77 feeding Garabaghli CS, 6 kV DU of Garabaghli CS, 6-10 kV hubs of Agdash CS. RLND-110 type 110 kv circuit breakers were adjusted in 110/6 kV ADU, relay protector, automation schemes, winding resistance and earthing loops of 25 MVA 110/6 kV transformers 1 and 2 in Hajigabul CS. 122 obsolescent accumulators of two UPSs at 300 kVA capacity were replaced with new ones and AVR system of AKSA type generator was refurbished in Astara CS 1. Two KEMSAN type UPSs were installed in Astara CS 2. 170 kVA diesel generator was repaired and control panel was replaced in Agdash CS.

Repair, testing, setting, commissioning, and inspection of relay protector systems and earthing resistance measurement were carried out in 6kV hubs of 6/0.4 kV substations in order to put into operation of drilling rigs running with 27 electric drives within Complex Drilling Works Trust. 117 electric equipment (including, 111 equipment in Drillingservice and Logistics unit and 6 equipment for outsourcing organization) were overhauled and recommissioned in view of normal running of drilling rigs in 2013.

In view of overrun from life-cycle standpoint of 25% of 58 crude booster pumps being used in technological processes of oil transportation in structural units of Oil Pipelines Department, setting works were carried out in 30 pump aggregates existing in the balance, and axle centering and current repair works were conducted between pump and engine, and normal running regime was reinstated in order to provide technological processes. Overhaul works were started and depreciated electric equipment were replaced with modern type new equipment in 35/6 kV substation feeding of Dashgil OTS. Life-cycles were extended and frequent failures were avoided for the purpose of timely performance of testing-setting works under the schedule.

Appropriate actions were taken with regard to efficient use of electrical power, electric equipment under operation were replaced with lower capacity equipment by selecting options in compliance with more optimal working regime of processing units and if taking into account the energy consumed by the facilities granted to outside organizations, the power consumption declined as 10793 thousand kW/h in comparison with relevant period of 2012.

The enterprises and organizations of SOCAR purchased a total of 945827 thousand kW/h electric energy from energy supplying enterprises in January-December of 2013.

Including:

61171 thousand kW/h electric energy was purchased from "Azerenergy" OJSC, 721510 thousand kW/h from "Bakuelektrikshebeke" OJSC, 162073 thousand kW/h from "Sumgayitelektrikshebeke" OJSC and 1073 thousand kW/h from other organizations (Diagram XII.1);

Electric energy outsourced in the enterprises and organizations of SOCAR in January-December of 2013

"Azerenergy" OJSC	61171 thousand kW/h
"Bakuelektrikshebeke" OJSC	721510 thousand kW/h
"Sumgayitelektrikshebeke" OJSC	162073 thousand kW/h
Outside organizations	1073 thousand kW/h

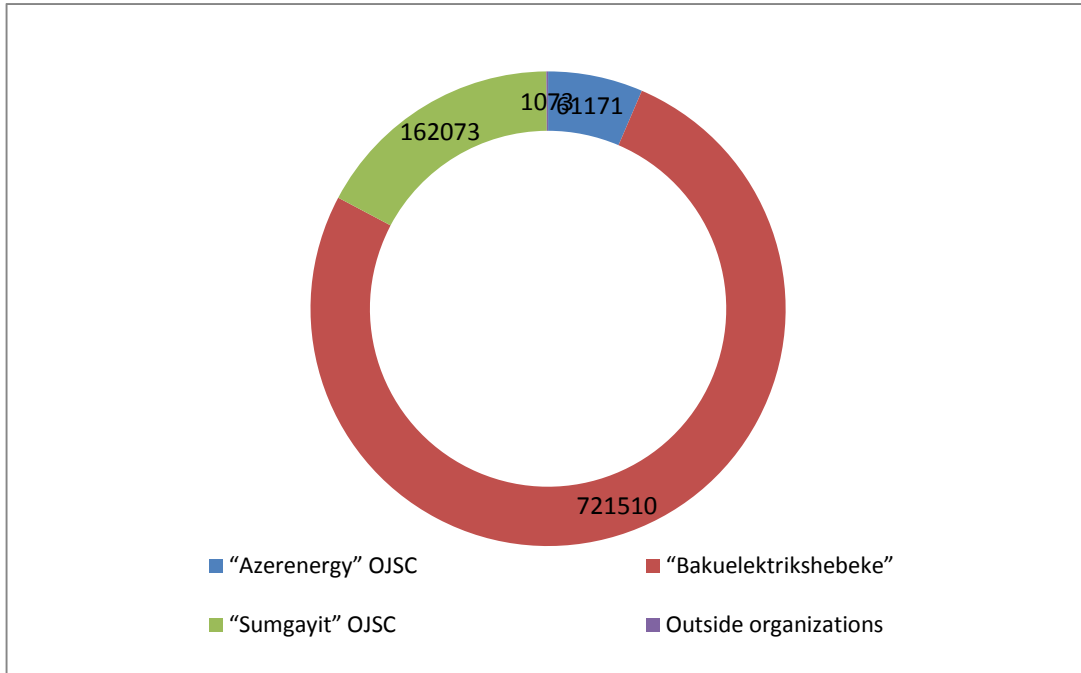


Diagram XII.1

In January-December of 2013, 79611 thousand kW/h electric energy was produced in "Azerikimya" PU and 142720 thousand kW/h in "Azneft" PU (including 137759 thousand kW/h in GTES-48, 4961 thousand kW/h in DES) (Diagram XII.2);

Electric energy used in the enterprises and organizations of SOCAR in January-December of 2013:

"Azneft" PU	142720 thousand kW/h
GTES-48	137759 thousand kW/h
"Azerikimya" PU	79611 thousand kW/h
DES	4961 thousand kW/h

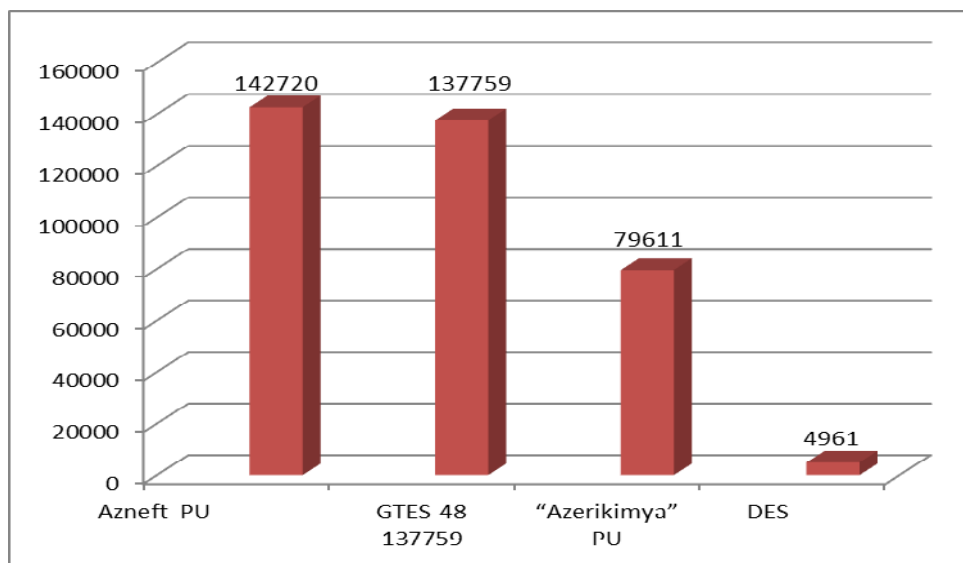


Diagram XII.2

Electric energy to the extent of 1162686 thousand kW/h was consumed for production in the structural enterprises and organizations of SOCAR in 2013. Moreover, 2924 thousand kW/h electric energy was sold to outside organizations and 304 thousand kW/h electric energy to the inhabitants of Chilov island respectively (Diagram XII.3).

Electric energy consumed in the enterprises of SOCAR in January-December of 2013:

For production	1162686 thousand kW/h
Sold to outside organizations	2924 thousand kW/h
Sold to population	304 thousand kW/h

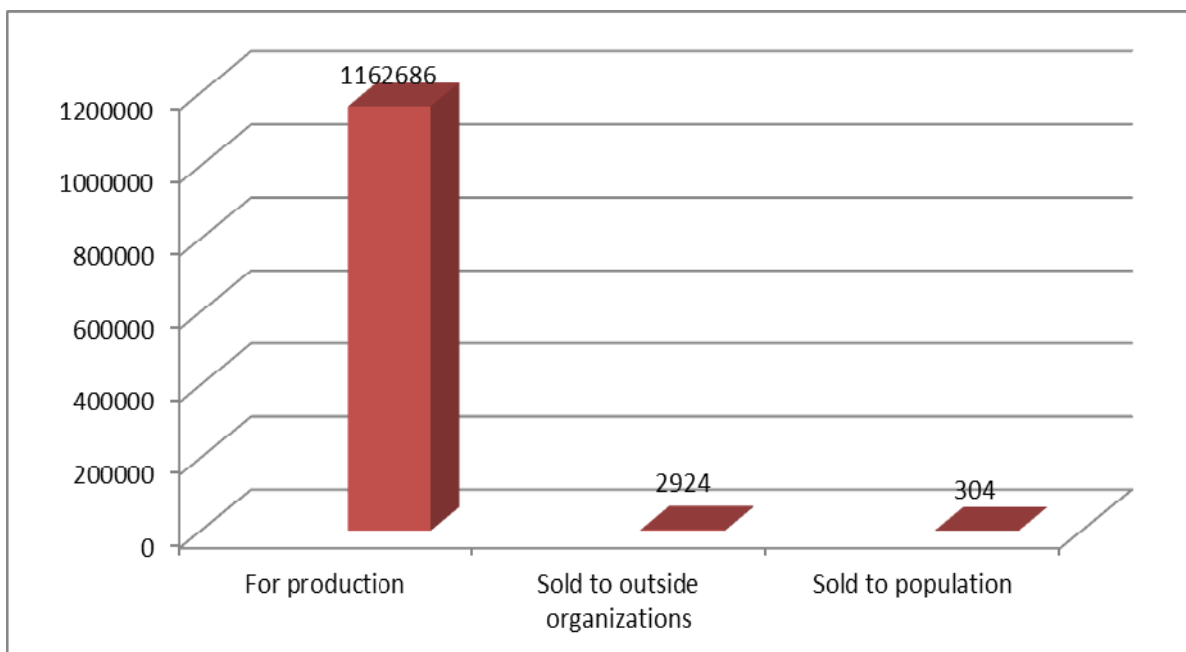


Diagram XII.3

Relevant works were regularly controlled in respect to taking actions on efficient use of energy resources and prevention of illegal consumption of electric energy.

Although there were interruptions in power supply to the enterprises, departments and organizations of SOCAR due to failures in the electric system and network of energy supplying enterprises, no stagnation was allowed through the fault of personnel operating the intra-field power network.

Testing and adjustment works to the extent of 3420 thousand Manat were carried out in electrical installations and equipment, while overhaul works were performed for electric equipment to the extent of 1571 thousand Manat and for drilling and oil-mine facilities to the extent of 4290 thousand Manat in 2013. The operating hours of such equipment were extended and they were returned to operation.

In the reporting period appropriate measures were taken to procure and stockpile 94583 tons of ferrous and 388 tons of non-ferrous scrap and waste metal written off from the balance sheet of installations and equipment unfit for production.



No standby cases were allowed due to early failure and lack of spare parts under the operation of drilling, oil-mine equipment and processing units in 2013.

Certain activities were also carried out in the area of fire protection. "Vikhr" type fire-fighting vessels kept a vigil on intended oil and gas fields. The departments and enterprises were provided with primary fire extinguishing equipment and foam generating liquid.

The water spray systems in DWJs, circular fire extinguishing water lines, firefighting supports, shafts of dive pumps and access areas for vessels were repaired. Voluminous works were carried for replacement of manifold systems as well as low pressure and high pressure separators with new ones.

With a view to carry out rapid and quality drilling works, two ZJ70/4500DZM drilling rigs, six 3NB-1600F pump units, nine DOOSAN PU 180TI diesel engines, one MRB2-80x35 manifold, two MB-2Ux250, MB-2Ux350 manifolds, two KPB-3M rotating cranes, one KP12-3U rotating crane, four MI-WACO clay mud cleaning systems, one ZJ700 winch, one 500 ton 800HP AKER Top Driver, eighteen NJ-1 mud mixers, four 4"-13 5/8" switch stations were purchased, installed and put into operation in 2013.

The completed oil and gas wells were timely provided with wellhead equipment, which had a positive effect on oil and gas production.

Two UNB 160x40 aggregates over Kamaz chassis, one VN 120/80 pump unit, two VU 0.6/13M1, PV 3091- 7.5 - 500 type compressors, one NAK 250/18 lifting crane, one NAK 300/24Mx7T lifting crane, one NSP 125x400 diesel pump aggregate, one UPT-50 (tractor based) lifter, one UP100x125 "Ruslan" type lifter and one Straj type software controlled fire extinguishing robot were purchased, installed and put into operation by "Azneft" PU within the year. Wellhead equipment in "Galmaz" and "Garadagh" UGS were replaced with new ones.

Two NK210/200 pump aggregates were installed and put into operation in Binagadi OTS, two 1D200/90 pump aggregates in DNAB and five 1D200/90 type pump aggregates in Dashgil OTS in Oil Pipelines Department within 2013.

Works are ongoing on the basis of LSS in reconstruction of Katalparaq OGDAs of Agdam CGCS, Alat GDA of Hajigabul CGCS, Agsu radio-communication transmission tower, 2.3 km EKM unit of Shirvan HES wing, 35/10 and 10/0.4 kV substations of Siyazan CGCS.

The implementation of the following measures aimed at improving power supply in 2014 is deemed to be necessary:

- Installation and commissioning of fluent launching unit for N322/1.2 hydrocutting pumps of production facility 4 and cable lines of electric power equipment for Azote compressor in workshop 12 within H.Aliyev Baku Oil Refinery;
- Commissioning of the circular water spray and foam fire-extinguishing systems newly installed in Puta OTS of Garadagh Oil Pipelines Office of Oil Pipelines Department;

- Development of a project for upgrading the fire-extinguishing system of "Dashgil" OTS and commencement of construction and installation operations;
- Saving of fuel and lubricants as well as of spare parts required for oil-mine facilities, and overhaul of drilling and oil-mine facilities on internal resources;
- Procurement, stockpiling and hand-over of wear and tear equipment being unfit for production as ferrous and non-ferrous scrap metal by writing off from the balance;



- Purchase and installation of a new 35 kV subsea cable between GTES-48 in "28 May" OGPD and 35/6 kV substation in Chilov island;
- Completion of second complex (trestle part) of 35 kV subsea cable line 3 newly laid between "Neft Dashlary" GTES-48 and DWJ-2;
- Installation and commissioning of one NBO 160D drilling rig in DWJ-10, one H250 crane in DWJ-15 in "Gunashli" field, eleven new 42-seater NPT58F rescue boats manufactured in Korea in SDWJ of "Neft Dashlary" and "Absheronneft" OGPDs and, as well as installation of up-to-date fire-extinguishing system under a project;
- Installation and commissioning of four MISWACO clay mud treatment system, nine Mangoses PT vibrating sieves, one JC70D winch and one ZJ70DZM drilling rig purchased for "Complex Drilling Works" Trust, as well as purchase of two JZ-40 mobile drilling rigs and their application in wells;
- Overhaul of gas wells in Underground Gas Storages and their provision with new wellhead equipment;
- Reconstruction of DUs 1, 2, 3 and 22 on "Neft Dashlary" OGPD; provision of electricity supply of new compressors to be installed at sites 1100 and 1201; replacement of 250 kVA transformer with 630 kVA transformer at site 1284 in view of increase of capacities of drivers hereof;
- Installation of three HAK-300 lifting cranes at DWJ-7 in 28 May OGPD; completion of construction of second complex (laying out toptrestle cable) of 50

- 35 kV cable line 3 from GTEs-48 onto DWJ-2 in Neft Dashlary OGPD; upgrading of electricity supply system in Chilov island; reconstruction of 6/0.4 kV distribution units 40, 41, 42, 43 in Neft Dashlary field; overhaul of electricity system of DWJs 5, 14, 15 in Gunashli field; setting and commissioning of three 42-seat rescue boats in DWJ-4 in 28 May OGPD, of six 42-seat rescue boats in Neft Dashlary OGPD and of one 42-seat rescue boat in Absheronneft OGPD (site 340);
- Repair of 6 kV electricity transmission lines 1 and 2 feeding 6 kV distribution unit 2 through 35/6 kV master substation 403 "Absheronneft" NQÇİ; repair of 6 kV electricity transmission lines between 35/6 kV master substation 403 and 6/0.4 kV transformer substation 14; construction of six substation buildings (11, 13, 14, 23, 26, 28), supply with equipment and laying out 0.4 kV SIP cable lines; laying out 6 kV electricity transmission lines to the extent of 1950 m between 6/0.4 kV offshore substation 6-8 and 6/0.4 kV offshore substation 8-9 under the project "Overhaul of 6/0.4 kV substations 8-9 and 2-circuit electricity transmission line feeding them in North wrinkle field"; construction of top trestle substation buildings 6 and 401 and hand-over upon provision with equipment under the project "Reconstruction of substation buildings 2, 3, 4, 5, 6, 401 and upgrading of equipment";
  - Laying out 6 kV cable electricity transmission lines among EYM-171 - EYM - 407 - EYM-482 within N.Narimanov OGPD; laying out 6 kV cable electricity transmission lines between DU 26 and DU 12 (NYM-1); DU 12 (NYM-1) and DU 110; DU 26 and DU 28, commissioning of 6 kV DU for the project on construction of new 6 kV DU and reconstruction of the existing Gradir facility and pump unit in EYM 607; upgrading of electricity supply of offshore facilities; completion of works under the project for reconstruction of Dashgil 35/6 kV substation; implementation of overhaul of 35/6 kV substation at Sumgayit NTS;
  - Continuation of installation of electric equipment on project for Facility of transition from 2 kV power grid to 6 kV power grid in A.Amirov OGPD; upgrading of electricity supply system of OGPDs 2 and 3; liquidation of 6 kV DU being in emergency condition and commissioning of newly installed of 6 kV DU at 35/6 kV substation 520;
  - Laying out 0.4 kV cables onto oil wells from 6/0.4 kV DU 41 within "Bibiheybatneft" OGPD. Supply of 6/0.4 kV DU 80 with modern equipment and putting into operation of DU;
  - Installation of 6/0.4 kV new modern equipment at DU 913 in the areas of OGPs 3 and 4 in Buzovna site and reconstruction of TM- 23 under design in Gala site within H.Z.Tağiyev OGPD;
  - Implementation of the project "Reconstruction of electricity network and 35/6/0.4 kV distribution units within "Siyazanneft" OGPD and continuation of cleaning from the trees of protection zone of the electricity transmission lines in Zyxh site;

- Continuation of replacement of unfit and dirty insulators with new ones at 110 kV Sabirabad-Muradkhanly electricity transmission lines in "Muradkhanly" INM;
- Completion of construction of cable trestle from 35/6 kV substation up to control room within Gas Storages Operation Unit; completion of works on project for reconstruction of compressor station 2 of Garadagh GCS; provision of electricity supply on the project for enhancement and expansion of 5-well manifold system in old gas distribution point in Garadagh Underground Gas Storage; installation of one condenser battery at the capacity of 450 KVAR in order to compensate reaction force in 10/0.4 kV substation 2 of Garadagh GCS; installation and commissioning of five 65x35 Mpa manifolds and seven 65x35 Mpa christmas trees in production sites;
- Repair and commissioning of four MKS logging winches on internal resources in order to carry out minery and geophysical works in offshore oil and gas wells of "Madangeofizika" Production Unit of Geophysics and Geology Department etc.



### XIII. CAPITAL INVESTMENT AND OVERHAUL

Capital investment program within SOCAR for 2013 was planned to the extent of 1271508.5 thousand Manat, including for drilling 294143.3 thousand Manat, for construction 841983.5 thousand Manat, for equipment not to be installed 132781.7 thousand Manat, geological exploration works 2600.0 thousand Manat. Actual capital investment within SOCAR for 2013 was fulfilled to the extent of 1294201.3 thousand Manat (101.8%), including for drilling 381287.1 thousand Manat (129.6%), for construction 741675.3 thousand Manat (88.1%), for equipment not to be installed 162409.7 thousand Manat (122.3%), geological exploration works 8829.2 thousand Manat (339.6%) (Table XIII.1).

Comparison with 2012 of key data included in structure of capital investment

Table XIII.1 (thousand manat)

	2013			2012		
	plan	actual	%	plan	actual	%
Capital investment	1271508,5	1294201,3	101,8	1219882,6	1112561,7	91,2
including:						
Drilling	294143,3	381287,1	129,6	322505,4	272375,5	84,5
- exploration	33591,3	54830,3	163,2	59853,1	42015,3	70,2
- operation	260552,0	326456,8	125,3	262652,3	230360,2	87,7
Geological exploration works	2600,0	8829,2	339,6	2600,0	6694,5	257,5
Construction	841983,5	741675,3	88,1	772870,3	604786,9	78,3
Equipment not to be installed	132781,7	162409,7	122,3	121906,9	228704,8	187,6
Capital investment for non-industrial construction	82724,3	50701,4	61,3	51959,4	122767,2	236,3
including:						
- construction of housing	76239,3	45058,1	59,1	16961,4	77242,7	4,6d
- construction of utilities						
- construction of education facilities	14000,0	17175,8	122,7	3000,0	21623,2	7,2d
- construction of healthcare facilities	54274,3	27472,1	50,6	30452,3	23745,9	78,0
- construction of cultural facilities	1000,0	3244,2	324,4	1545,7	155,4	10,1

Comparison with 2012 of handover data of fixed assets within SOCAR in the reporting year

Table XIII.2 (thousand manat)

	2013			2012		
	plan	actual	%	plan	actual	%
Handover of fixed assets	1715996,2	1045081,2	60,9	1230745,4	862144,3	70,1
including:						

- drilling	323636,1	393328,2	121,5	265988,2	295767,0	111,2
- construction	1256985,4	487568,8	38,8	842850,3	337672,5	40,1
- equipment	135374,7	164184,2	121,3	121906,9	228704,8	187,6
- geological exploration works						

As evident from table XIII.2, the handover of fixed assets within the SOCAR made up 1045081.2 thousand Manat that it is higher to the extent of 182936.9 thousand Manat as compared to 2012. The handover of fixed assets on drilling totaled to 393328.2 thousand Manat that it is higher to the extent of 97561.2 thousand Manat as compared to 2012. The handover of fixed assets on construction totaled to 487568.8 thousand Manat that it is higher to the extent of 149896.3 thousand Manat as compared to 2012.

Residential buildings to the extent of 3868 m<sup>2</sup> within SOCAR were handed over in 2013. This figure totaled to 6254 m<sup>2</sup> in 2012.

Capital Investments Department of SOCAR implements control over fulfillment of capital construction and capital repair plans by structural organizations of SOCAR timely, qualitatively and in compliance with design estimate documents.

The construction and assembly operations carried out by force of contractor organizations, involved in the implementation of plans for capital construction and overhaul, were monitored in the structural organizations incorporated in SOCAR: "Azneft" PU, Geophysics and Geology Department, Oil Pipelines Department, H.Aliyev Baku Oil Refinery, "Azneftiyagh" Oil Refinery, H. Aliyev Baku Deep Water Jackets Plant, "Azerikimya" PU, Social Development Department, Ecology Department, Caspian Sea Oil Fleet, "Complex Drilling Works" Trust, Gas Processing Plant, "Oil and Gas Research and Design" Institute, Gas Export Department and Information Technologies and Communication Department. At the same time, acceptance of scope of physical activities within different facilities were examined in some organizations.

In-place inspections were conducted for acceptance and documentation of scopes of physical activities in other facilities and the quality of construction and assembly activities on gasification of Gunashli and Ismatli villages of Bilasuvar region, Garazanjir, Ojagli, Tazakand cities of Jalilabad region, Turkan, Bina and Gala settlements of Khazar district, Masazir and Saray villages of Absheron region, H.Z.Tagiyev settlement of Sumgayit city, Yenikand and Dadashbeyli villages of Sabirabad region; on construction of administrative building of Nizami Gas Maintenance Area in Baku city; on gasification of villages, settlements and housing estates in Fizuli region, Bagman and Silyan villages of Kurdamir region; on repair of oil pipelines in Dubandi-Surakhany De300 mm 0.1-5.6 km section and anticorrosion painting of 92.4-95.4 km section of OTD Buta-Boyukshor De500 mm oil pipelines, capital repair of 9-floor production block and construction of 5-floor laboratory building of "Oil and Gas Research and Design" Institute, repair of Hovsan-Digah-Garadagh De700 mm main gas pipeline and construction of storage buildings of Gas Export Department, on drainage-sewerage system within facility "Seed-plot in 9.3 ha area in the territory of H.Z.Tagiyev OGPD", accomplishment of sidewalk, reconstruction of Disposal Centre located in northern part of Akhtarma mountain of Garadagh district for Ecology Department, repair works in the territory of workshop 10 of H.Aliyev Baku Oil Refinery, overhaul of tank 110 at commodity park 1 of production area 7, overhaul of facade of administrative building of workshop 13, Reconstruction of Centralized Publication House of SOCAR located at 113 H.Aliyev avenue in Baku city of Information Technologies and Communication Department, construction of maintenance area for autotransport (ancillary building), repair of Cultural house of "Azerneftiyagh" Oil Refinery and tank farm in the territory of facility 112 decommissioned

for kerosene fraction generated from processing units of the Oil Refinery. The defects detected as a result of inspections were brought to the notice of construction managers and supervisors of the relevant organization and elimination of such defects were controlled.

As a result of the investigation it was found that a number of shortcomings specific to all organizations working in the facilities still exist. So, construction-assembly works are carried out in some facilities without preparation of design-estimate documents, in some facilities the requirements of the Construction Management Plan, which is the integral part of design documentation of the facility, are met imperfectly during the execution of construction works, quality of repair-construction works and materials are deficient, the general log of construction and installation operations, the logs on designer's supervision and special operations and the acceptance acts of follow-up covered works and critical structures as well as the test acts of equipment, industrial pipelines, internal and external water, heating, gas supply and sewer systems, drainage facilities, electricity, radio, telephone and television equipment and lines, and explosion, fire and lightning protection equipment are drawn up improperly; construction and installation operations are carried out by contractor organizations without working out a Work Execution Plan. As a consequence, the mentioned facts cause an increase in the cost price of construction and the extension of construction period.

According to the outcomes of 2013, the implementation of programs for capital construction and overhaul were analyzed in organizations and the measures were taken to eliminate the factors causing an increase at cost of the performed works and to execute works more qualitatively.

The existing laws and other normative legal acts of the Republic of Azerbaijan, the orders, decisions and directions of SOCAR and normative documents of the Company, as well as the tasks and instructions by the President of SOCAR and Capital Investments Department were governed while performing these works.



## XIV. OVERHAUL

Construction-assembly works were carried out to the extent of 448531.7 thousand Manat (120.5%) (plan 372135.0 thousand Manat) under the orders of SOCAR enterprises for processing units, communication systems, oil-mine hydrotechnical facilities and buildings in 2013. The performance of the overhaul of fixed assets of SOCAR enterprises in 2013 is shown in the following table:

*Table XIV.1 thousand Manat*

№	Name Of Customer enterprises	Plan for 2013	Performed actually in 2013	%	Performed actually in 2012
1	"Azneft" PU	73500	117291.8	159.6	84437.3
2	"Azerigaz" PU	40000	70616.6	176.5	119328.4
3	"Azerikimya" PU	1580.0	603.7	38.2	3418.9
4	H. Aliyev Baku Oil Refinery	9000	8130.2	90.3	10633.3
5	"Azneft" Oil Refinery	8000	9208.0	115.1	11883.6
6	Gas Processing Plant	3325	1718.2	51.6	3019.7
7	H. Aliyev Baku Deep Water Jackets Plant	70.0	294.3	42.0	2374.8
8	Oil Pipelines Department	7000	7805.1	111.5	6290.3
9	Marketing and Economic Operations Department	200.0	703.9	3.5 times	933.5
10	Geophysics and Geology Department	1500	351.4	23.4	809.5
11	Social Development Department	150000.0	188309.7	125	179387.9
	including:				
	For SOCAR enterprises		21656.6		4766.3
	On regions		30320.9		40379.8
	On the basis of the letter of Baku city Executive Power		136332.1		134241.8
12	Security Department	0	0		0
13	Information Technologies and Communication Department	800	142.3	17	568.3
14	Ecology Department	200	11.4	0,00	28.5
15	"Gas Export" Department	68164.0	35147.0	51.6	38.6
16	"Oil and Gas Construction" Trust	1796	1589.1	88.4	1267.7
17	"Complex Drilling Works" Trust	2500	322.6	12.9	2350.6
18	Caspian Sea Oil Fleet	2500	4825.5	193	2451.2
19	Oil and Gas Research and Design Institute	1500	1402.9	93,3	1153.0
20	Training, Education and Certification Department	500	48.5		159.8
	Total:	372135.0	448522.2	120.5%	430534.9

Significant works were carried out by Azneft PU for drilling high production oil and gas wells, establishing a modern infrastructure as well as reconstructing the existing system for collection, processing and transportation of produced oil and gas by applying cutting-edge drilling technologies in order to stabilize oil output and increase gas production in 2013. Overhaul works for fixed assets of Azneft PU were performed on three directions:

First direction: the works carried out for the purpose of implementation of the Actions



Program on stabilization and increase of oil & gas production in the duration of 2013-2015 approved by the President of SOCAR;

Second direction: the works carried out for the purpose of safe and continuous use of the existing transportation system, technological and hydraulic structures for production and transportation of oil and gas;

Third direction: the works performed for overhaul of hydraulic structures to resume the operation of non-operating wells due to the emergency condition of such structures in order to stabilize and boost oil and gas production;

In view of all directions, overhaul works amounted to 117291.9 thousand Manat were carried out on platforms, subsea oil and gas pipelines of different diameters and relevant communication systems with a view to ensure uninterrupted and safe use of the oil and gas collection and transportation system in "Gunashli", "Neft Dashlary", Bulla-Deniz, Western Absheron and other offshore and onshore fields. Moreover, overhaul works to the extent of 75075.3 thousand Manat were performed for offshore oil-mine hydraulic structures and for pipelines to the extent of 8599.9 thousand Manat. A total of 1698 km long pier and 10 platforms with a total area of 17290 m<sup>2</sup> were completely overhauled and accepted for operation by the state acceptance commission. Among the completely overhauled oil and gas production facilities are as follows:

- integrated overhaul of DWJ 2 in "28 May" OGPD - 3454.5 m<sup>2</sup>;
- overhaul of jacket 95 at "Chilov" island of "28 May" OGPD - 680 m<sup>2</sup>;
- overhaul of interplatform pier № BM2 - 5A of "Neft Dashlary" OGPD - 633 linear meter;
- overhaul of platform № 2346 of "Neft Dashlary" OGPD - 2500 m<sup>2</sup>;
- overhaul of platform № 1296 of "Neft Dashlary" OGPD - 700 m<sup>2</sup>;
- overhaul of interplatform pier 501 of "Neft Dashlary" OGPD - 2500 m<sup>2</sup>;
- overhaul of platform 2164 of "Neft Dashlary" OGPD - 1800 m<sup>2</sup>;
- overhaul of platform 1770 of "Neft Dashlary" OGPD - 1720 m<sup>2</sup>;
- overhaul of CS 4 of "Absheronneft" OGPD - 900 m<sup>2</sup>;
- overhaul of DWJ 11 of "Absheron bank" field - 840 m<sup>2</sup>;
- overhaul of DWJ 51 of "Absheron bank" field - 1196 m<sup>2</sup>;
- overhaul of parts 203-562 of North trestle of "Absheronneft" OGPD - 601 linear meter;
- overhaul of area of pier № 423-426 of Narimanov OGPD - 464.0 linear meter;
- overhaul of EYM № 618 of Narimanov OGPD - 1890 m<sup>2</sup>;

At the same time, 22 jackets and EYM were partially repaired in view of running of special machinery and 43 wells being at non-operating stock due to emergency condition of hydrotechnical facilities were recommissioned in 2013. Daily production of such wells totals to 283 ton/day.

In addition, "Azneft" PU carried on complex overhaul works on platforms № 2, 3, 4 and 6 in "Gunashli" field in order to ensure safe exploitation of platforms. For the purpose of improvement of social and living conditions of the employees, the overhaul of dwelling blocks for 72 persons on DWJs № 8, 9 and 15 in "Neft Dashlary" field was completed and handed over to state acceptance commission.

Repair of manifold blocks and processing lines in jackets 10, 15 and 5, and power supply facilities of DWJ 19 in Gunashli field was completed. Subsea reinforcement works at 16 m level for pilot shafts of wells at DWJ 3, 11 and 15 in Gunashli field were

completed by OASU in order to operate the wells safely in hard offshore condition. At the present, the works on this direction are ongoing.

The principal activities of "Azerigaz" PU in 2013 were the implementation of "State Program for social-economic development of regions of the Republic of Azerbaijan in 2009-2013", which was approved by decree of the President of the Republic of Azerbaijan, the uninterrupted, safe and stable supply of natural gas to consumers across the country.

At the same time, ancillary activity related to such main activity - the installation of gas meters and capital construction (gas supply) and repair works with respect to gas supply was carried out in accordance with the approved work plan. The specified works were carried out in three directions.

First direction: Repair and reconstruction of the existing gas distribution system in view of prevention of gas losses;

Second direction: The supply of gas to all regions of the country, the restoration of gas supply to the regions that were earlier provided with natural gas, the supply of natural gas to new settlements and residential areas, and consequently, the implementation of the program on acceleration of socio-economic development of regions.

Third direction: The improvement of record of natural gas in gas supply facilities and provision of all consumers with gas meters.

At the same time, taking into account the fact that the existing infrastructure, compressor and gas-distributing stations and equipment were in operation for a long period on the above three directions, works amounted to 70616.6 thousand Manat within repair and rehabilitation of such stations and equipment were carried out against the order of "Azerigaz" PU in 2013 with a view to ensure uninterrupted and safe gas supply to residential settlements across the country. Distributing and network gas pipeline at the length of 1774.7 km was laid and overhauled.

Including, by "Azerigaz" PU:

- in Baku city: planned 17587.0 thousand Manat; actual 33781.5 thousand Manat - 848.6 km
- in regions: planned 19092.6 thousand Manat; actual 33598.8 thousand Manat - 921.4 km
- on Main Gas Pipelines: planned 1691.6 thousand Manat; actual 1691.6 thousand Manat – 4.7km.

Gas pipelines of different diameters were overhauled. A total of 236503 gas meters were mounted for population in private houses.

Including:

- in Baku city: 178572 gas meters of «Smart card» type;  
1242 gas meters of mechanical type
- in regions: 30446 gas meters of «Smart card» type and 26243 gas meters of mechanical type.

It should be noted that Main Gas Pipeline was handed over to Gas Export Department from the balance of "Azerigaz" PU as from 15.01.2013 according to order of SOCAR.

With a view to ensure the rhythmical operation of processing facilities in the plants and boost the production process in the auxiliary facilities owned by "Azerikimya" Production Unit, repair works were carried on according to schedule in the reporting period of 2013. Overhaul works amounted to 8943.44 thousand Manat were carried out in 2013 by the Repair and Construction Department of "Azerikimya" PU and contractor<sup>58</sup>

organizations in the processing facilities of plants and all auxiliary facilities, including administrative, domestic and production buildings. Overhaul works totaled to 603.7 thousand Manat were actually carried out by contractor organizations, while overhaul works to the extent of 8339.7 thousand Manat were performed by the Repair and Construction department. It is gratifying case that share of the Repair and Construction Department in performance of construction-assembly works recently rises year by year.

In the area of processing, more attention was paid to the overhaul of communication systems for storage and transportation of the existing facilities and fuel in order to mainly improve the processing level and produce ecologically pure fuel. The volume of overhaul works performed in the area of oil and gas processing in 2013 made up 19056.4 thousand Manat.

Piping systems of heat exchangers and pipe fittings in liquid gas tank were replaced in pretreatment unit (№31) in H.Aliyev Baku Oil Refinery. Repair works were carried out and piping systems of heat exchangers were replaced in 2000 m3 tank 308 of tank farm of production facility №2 and atmosphere and vacuum blocks of unit 21, and repair works were performed at reactor and furnace section, pump houses and column section of coke unit (unit 43). Processing lines such as diesel, vapor, wet reflux, alkali, technical water and flame were repaired and overhaul works were carried out in catalytic cracking (№ 55) and catalytic reforming equipment. Besides, 10000 m3 tank 202 in Guzdak workshop №10 for acceptance and dispatch of oil products, 2000 m3 tank 308 in tank farm of production facility №2 and 20000 m3 tank 203 in tank farm in production facility №1 were overhauled. In addition, certain necessary works for overhaul of processing lines of different diameters and the systems of power supply and instrumentation and automation in the refinery were carried out.

Oil processing units, tanks, pipelines, heat insulation space, electricity supply and instrumentation and automation and other equipment were overhauled within "Azerneftiyagh" Oil Refinery in 2013.

Overhaul works were conducted in the Gas Processing Plant on pipelines, processing facilities and their cooling systems, electrical facilities and the systems of fire control and automation equipment.

Alongside with the overhaul of fixed assets at the balance of SOCAR (188309.7 thousand Manat) in 2013, the Social Development Department carried out overhaul works in the regions of the country and performed similar works over the social projects of Baku City Executive Power:

- overhaul of SOCAR facilities - 21656.6 thousand Manat
- overhaul of facilities of Baku City Executive Power - 136332.1 thousand Manat
- overhaul of social facilities in regions - 30320.9 thousand Manat

The overhaul of these facilities is being carried out within "State Program for social-economic development of Baku city and its suburbs in 2009-2013" which was approved by the known decrees of the President of the Republic of Azerbaijan.

Considerable works were carried out for overhaul of main oil & gas pipelines, pump houses, compressor stations, measuring junctions and oil collector points by Oil Pipelines Department and Gas Export Department in the reporting year.

As evident from the above table, the overhaul of fixed assets at the balance of SOCAR constitutes totally 62.8% (281878.7 thousand Manat) of the overhaul works

performed (448531.7 thousand Manat) in 2013. Repair works to the extent of 156653.5 thousand Manat were performed by SOCAR enterprises and overhaul works to the extent of 291878.2 thousand Manat were performed by outsourced contractors in 2013.



## XV. LOGISTICAL SUPPORT

Key objectives of the Procurement Department are to analyze and forecast the overall demand for inventories of SOCAR enterprises and supply them as well as provide methodical assistance in procurement operations.

Timely receiving of the reports on monthly procurement operations for the inventory required for stable oil and gas production, construction, drilling, processing and other works was ensured as well as the correctness of such operations conducted and that of the reports drawn up within a year was examined by the Department in 2013.

The work process of the procurement groups, set up during the procurement operations held in the enterprises and organizations of the Company, in order to reinforce the direct control over implementation of procurements for SOCAR in accordance with "Normative documents of SOCAR on formation and management of procurements" was controlled by the specialists of Procurement Department.

The proposals frequently received by the Department from different providers and manufacturers were reviewed and examined and relevant structural bodies were informed about these proposals. The price indices obtained from the same proposals and websites of the manufacturers were analyzed by the specialists of the Department and were used as a "price control" factor during the work process of the procurement groups of structural divisions.

A continuous control was exercised over store houses in related points on the basis of the monthly references submitted on storehouse remainders in order to ensure the purposeful use of the residue stock of inventories available in the storehouses of SOCAR enterprises, the avoidance of purchase of inventories generating remainder, and the purchase of necessary material resources in compliance with allocated funds.

In general, 1031736.6 thousand Manat was spent for procurement of inventories on the basis of inquiries submitted by the structural divisions of SOCAR in 2013.

Including:

*Table XV.1*

Name of structural divisions	Amount spent on inventories within a year (thousand Manat)
"Azneft" PU	260441,1
H. Aliyev Baku Oil Refinery	69195,5
"Azerneftiyagh" Oil Refinery	13269,7
H. Aliyev Baku Deep Water Jackets Plant	3375,7
Social Development Department	32244,0
Geophysics and Geology Department	21771,7
Marketing and Economic Operations Department	977,8
Information Technologies and Communication Department	38596,9
Oil Pipelines Department	7433,4
Ecology Department	4373,1
Security Department	593,2
"Complex Drilling Works" Trust	78649,6
"Oil and Gas Construction" Trust	392473,5
Oil and Gas Research and Design Institute	5126,6
"Azerigaz" PU	95620,0
Gas Processing Plant	5155,9
Gas Export Department	2438,8
<b>Total for SOCAR:</b>	<b>1031736,6</b>

## XVI. SCIENCE AND TECHNOLOGY

Oil and Gas Research and Design Institute works as a structural part of SOCAR.

Actual number of employees of Oil and Gas Research and Design Institute in 2013 was 1198 persons (up to 01.01.2014) that out of them 128 persons hold scientific degrees, including 22 persons hold Doctor of Science degree and 106 persons hold Doctor of Philosophy degree. Such data on the Institute are given in the following diagram:

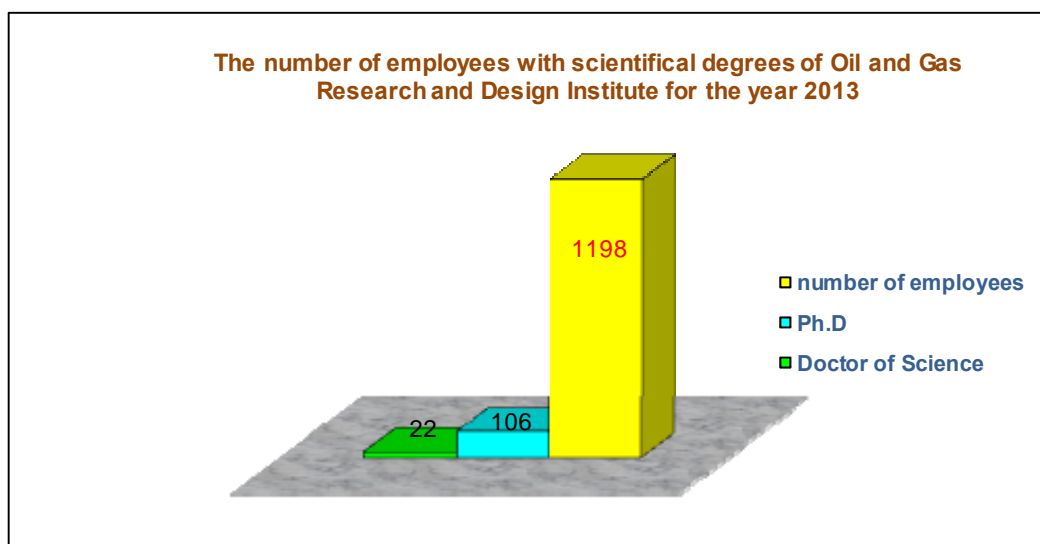


Diagram XVI.1

The doctoral training centers, which train highly qualified staff for the oil sector, are functioning under the Oil and Gas Research and Design Institute. In the duration of 2013, 28 persons studied in part-time and 73 persons studied by dissertation under this doctorate programme that out of them 4 persons working for doctor's degree and 19 dissertators are citizens of Kazakhstan Republic.

The thematic plan on "Scientific research, practice-test, works on use and application of normative documents" approved by the administration of SOCAR is compiled at the beginning of every year for the purpose of regulating and controlling the research works carried out at the institutes to solve any scientific problem arising at SOCAR enterprises. Basically the Oil and Gas Research and Design Institute, which is the leading scientific research and design enterprise of SOCAR, is involved in the settlement of the problems included in the thematic plan.

In 2013 performance of 91 scientific-research works comprised by 69 new themes and 22 transition themes from the previous years by the Oil and Gas Research and Design Institute of SOCAR and outside organizations. The normative documents (standards, rules, instructions, etc.) covering various activity areas of SOCAR were included in the thematic plan. These figures are specified in the following table:

Research works carried out by SOCAR enterprises  
and outside organizations in 2013

Table XIII.1

Number of SOCAR enterprises under plan for 2013  Total number: 91 including: transition works - 22 new works - 69	Performer	Oil and Gas Research and Design Institute		Outside organization		TOTAL:		
		trans	new	trans	new	trans	new	
"Azneft" PU	trans	14		3		17		71
	new		36		18		54	
"Azerigas" PU	trans	0				0		2
	new		2				2	
"Complex Drilling Works" Trust	trans	3				3		10
	new		7				7	
Head office of SOCAR	trans			2		2		8
	new				6		6	
<b>TOTAL:</b>	<b>trans</b>	<b>17</b>		<b>5</b>		<b>22</b>		<b>91</b>
	<b>new</b>		<b>45</b>		<b>24</b>		<b>69</b>	
		<b>62</b>		<b>29</b>		<b>91</b>		

Cost of research works by SOCAR enterprises under plan for 2012 (in ths. manat)

Table XIII.2

Total cost: 13975 including: transition works - 3360 new works - 10615	Performer	Oil and Gas Research and Design Institute		Outside organization		TOTAL:		
		trans	new	trans	new	trans	new	
"Azneft" PU	trans	2835		110		2945		9760
	new		6165		650		6815	
"Azerigas" PU	trans					0		2350
	new		2350				2350	
"Complex Drilling Works" Trust	trans	340				340		1430
	new		1090				1090	
Head office of SOCAR	trans			75		75		435
	new				360		360	
<b>TOTAL:</b>	<b>trans</b>	<b>3175</b>		<b>185</b>		<b>3360</b>		<b>13975</b>
	<b>new</b>		<b>9605</b>		<b>1010</b>		<b>10615</b>	
		<b>12780</b>		<b>1195</b>		<b>13975</b>		

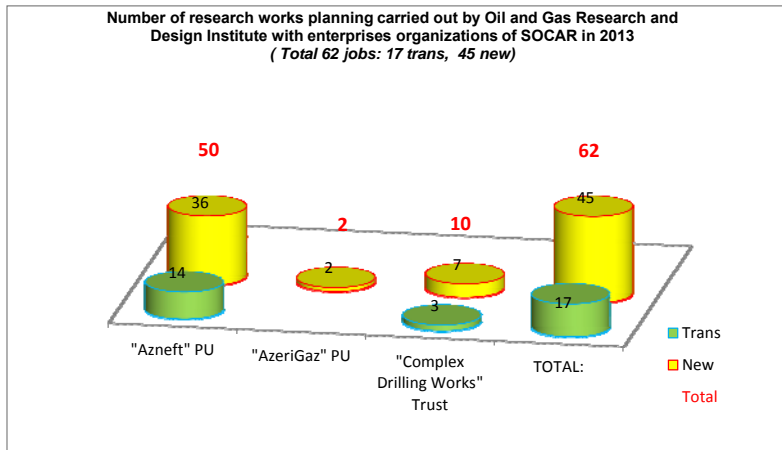


Diagram XVI.2

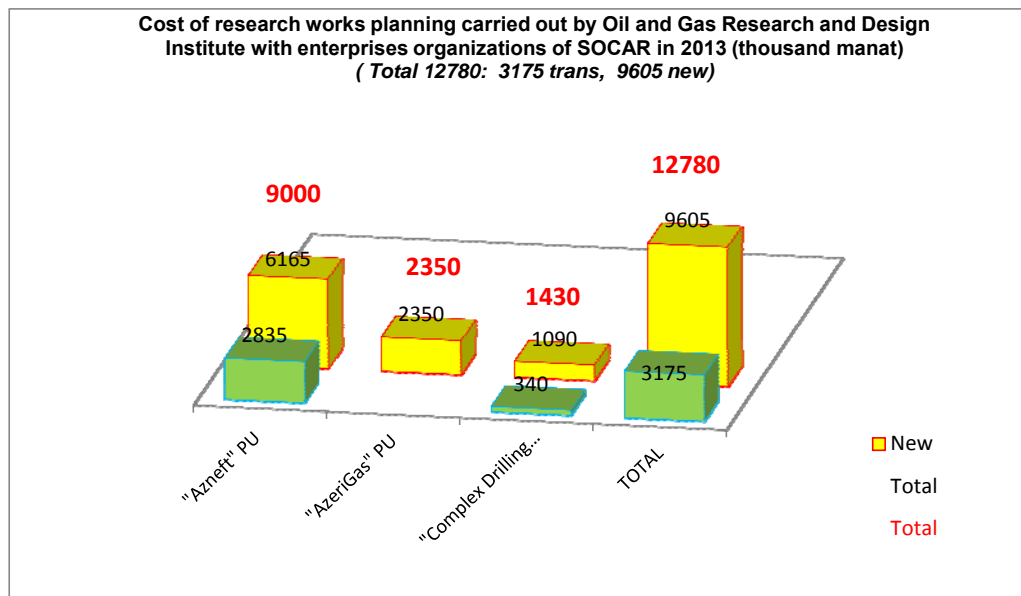


Diagram XVI.3

The Oil and Gas Research and Design Institute followed the Law on State Enterprises of Azerbaijan Republic, Decisions, Resolutions, Regulations and Orders of SOCAR and its applicable By-laws in the performance of activity in 2013.

**Actual works carried out by Oil and Gas Research and Design Institute in 2013:**

According to the income and expenditures budget of the Oil and Gas Research and Design Institute in 2013, scientific research, design-exploration-development works totaled to 33371.9 thousand Manat on account of its resources (including 31417.9 thousand Manat by SOCAR enterprises plus 1954.0 thousand Manat by foreign organizations), 410.9 thousand Manat by outside organizations were carried out against the planned 28600.0 thousand Manat (Under



thematic plan within SOCAR 26835.5 thousand Manat and within foreign organizations 1764.5 thousand Manat).

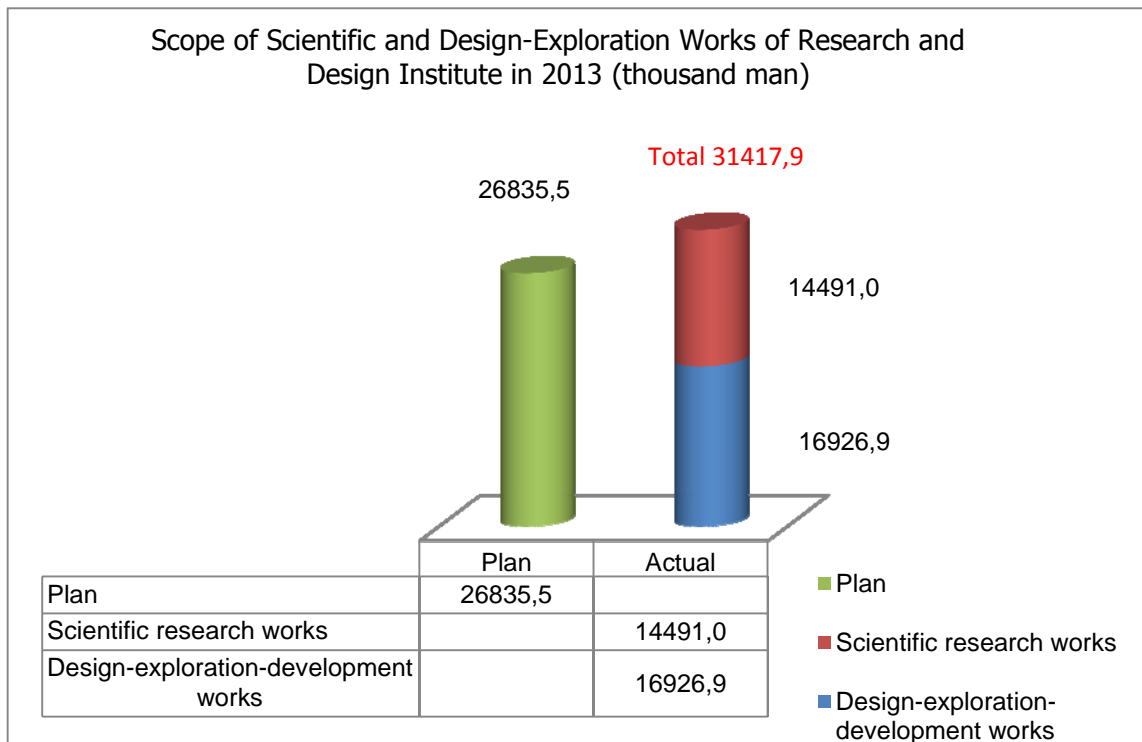


Diagram XVI.4



105 themes were fulfilled under the scientific research works to the extent of 14491.0 thousand Manat for SOCAR enterprises by the Institute in 2013.

326 themes were fulfilled under the design-exploration-development works to the extent of 16926.9 thousand Manat for SOCAR enterprises by the Institute in 2013.

The works by the Institute were fulfilled on 83 themes to the extent of 9353.0 thousand Manat for "Azneft" PU, 22 themes to the extent of 5138.0 thousand Manat for other enterprises of SOCAR and 11 themes to the extent of 706.7 thousand Manat for outside organizations which not incorporated in the structure of SOCAR.

Table XIII.3

Scope of works by the Oil and Gas Research and Design Institute in 2013	thousand Manat
For "Azneft" PU	9353.0
For other enterprises of SOCAR	5138.0
For outside organizations which not incorporated in the structure of SOCAR	706.7
Total	15197.7

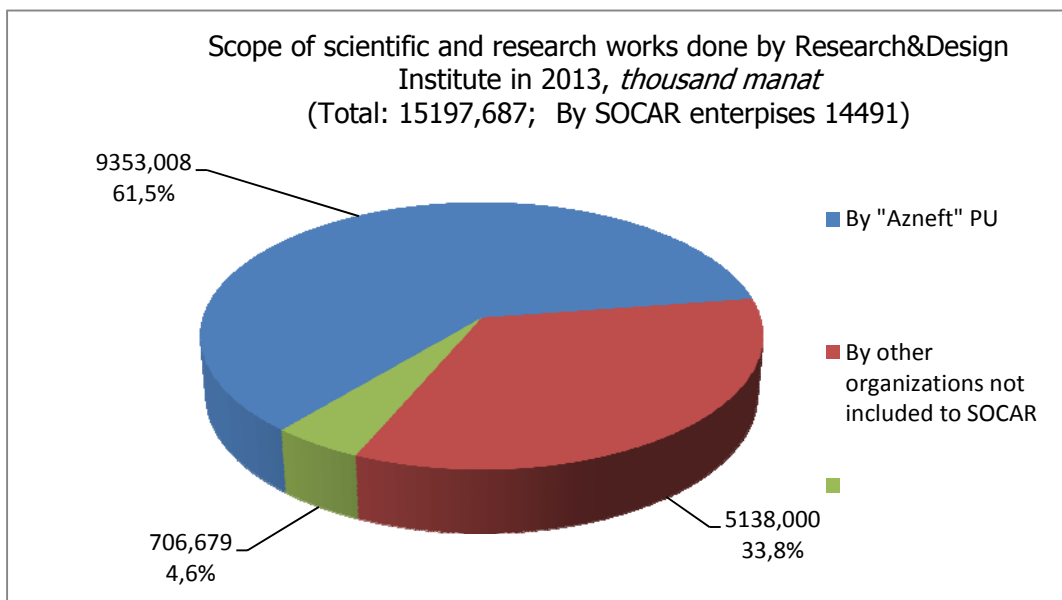


Diagram XVI.5

The plan tasks over design and exploration works were fulfilled to the extent of 126%, as the design-exploration-development works to the amount of 18174.2 thousand Manat were fulfilled against 14424.1 thousand Manat.

Contracts and documentation packages were agreed on the basis of design tasks to the extent of 23785.7 thousand Manat under design-exploration-development works for 462 items in 2013 by the orders of client organizations.

Fifty six research items on the design-exploration-development works to the amount of 4204.0 thousand Manat were fulfilled as transition works from 2012 to 2013.

186 items to the extent of 10751 thousand Manat were fulfilled by enterprises of "Azneft" Production Unit which total to 59.3 % of the performed design-exploration-development works.

On the basis of 140 contracts to the amount of 6175.0 thousand Manat under the order of enterprises of SOCAR and on the basis of 30 contracts to the amount of 1247.4 thousand Manat on outside local and foreign companies (BP Exploration Limited/AIOC), BP Exploration Limited/Shah Deniz), "Bahar Energy" LLC, "SOCAR Umid" LLC, Black Sea Terminal LLC, McDermoot Caspian Contractors, "Petrovietnam Engineering Consultancy) design and exploration works were carried out.

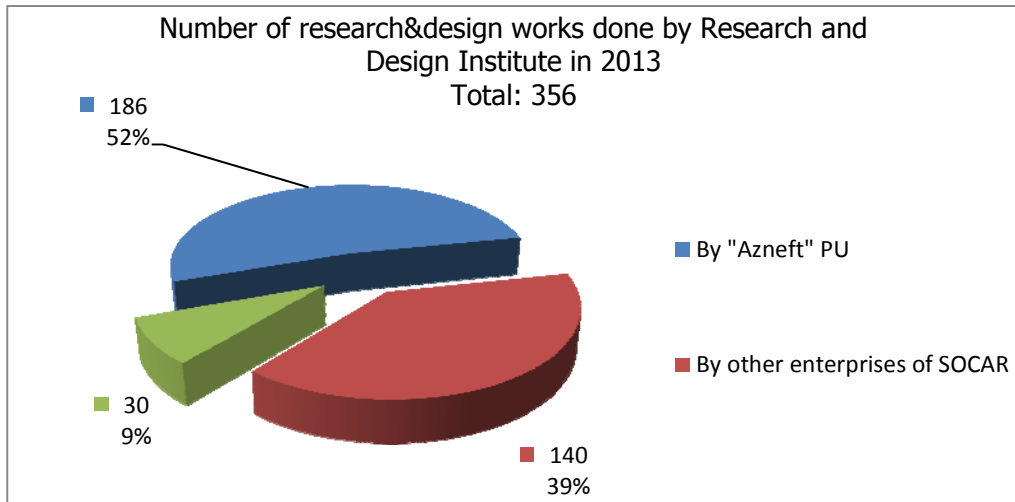


Diagram XVI.6

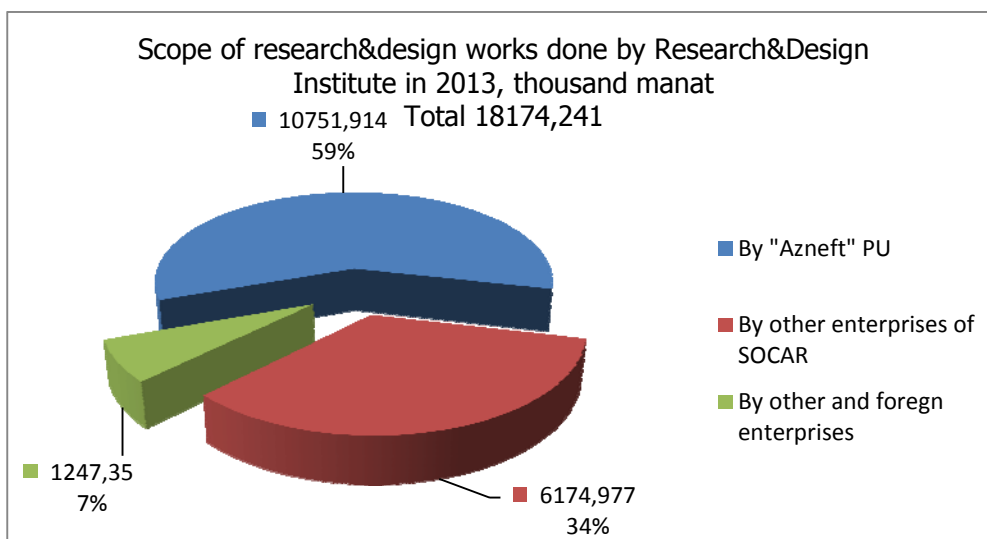


Diagram XVI.7

During the reporting year total income of the Institute made up 33371.9 thousand Manat. Gross cost price of the works totaled to 26548.0 thousand Manat, i.e. 80.0% of overall scope of works.

The major costs on the activity of the Institute totaled to labor remuneration (42.96%), all insurance allocations (9.15%), depreciations (12.80%) and other costs (13.43%).

### **New techniques and technologies**

According to the order № 396 dated 21 December in 2012 of "Azneft" PU the application of new techniques and technologies were planned in oil gas production departments, "Muradkhanly" enlarged oil mine and Gas Storages Operation Unit in order to increase the efficiency of production. Out of thirty six actions, which planned to be applied in 436 facilities within the year, twenty four actions were formed under the proposal of "Oil and Gas Research and Design" Institute, one action under the proposal of "Oil & Gas Geotechnological Problems and Chemistry" Institute, one action under the proposal of "Oil & Gas ProServ" LLC, four developments under the proposal of "Nanotechnologies" department of SOCAR, three actions under the proposal of "Azneft" PU and three actions under the proposal of OGPDs.

Nineteen actions were fully implemented at 324 facilities of OGPDS of "Azneft" PU against application of 24 new techniques and technologies which planned for 231 facilities in the duration of 2013. Five actions were not taken due to lack of procurement of necessary equipment and reagents. Alongside with the plan, 3 applications and 93 well operations were carried out.

Additional oil to the extent of 7695 + 9177 addition + 12455 equivalent = 29333 tons were produced against 4421 + 1050 addition + 8221 equivalent = 13672 tons which intended in the reporting year.

Twenty four actions were fully implemented and four actions were partly implemented at 436 facilities in "Azneft" PU against application of 36 new techniques and technologies which planned for 2013. Eight actions were not taken due to lack of procurement of necessary equipment and reagents. Alongside with the plan, 75 well operations were carried out.

Additional oil to the extent of 7282 tons were produced against 4845 tons which intended in the reporting year.

Participation in international exhibitions and conferences is of exclusive importance for promotion of achievements of SOCAR and learning of scientific and technological innovations and advanced foreign experience.

In this regard, a particular attention should be paid to the 20th International Exhibition and Conference "Caspian Oil-Gas, Oil Refining and Petrochemistry" which was traditionally held in Baku on 5-8 June 2013. SOCAR took a close part in the organization and arrangement of this Exhibition-Conference. The exhibits, models and updated booklets reflecting the Company's activities and achievements were displayed at SOCAR pavilion during the exhibition.

Besides, SOCAR participated in 12 international conferences and organized 10 conferences and seminars in 2013.

The booklets and brochures reflecting the achievements and technical-economic activities of the Company in 2012 and reports of SOCAR such as Annual report for 2012, Sustainable Development Report and Financial Report 2012 were delicately prepared, published and delivered to appropriate organizations and higher authorities.



## **XVII. HUMAN RESOURCES MANAGEMENT**

On January 01, 2014 actual number of the employees of the Head Office of State Oil Company of Azerbaijan Republic totaled to 555 persons. 81 persons were recruited by Head Office of SOCAR in the reporting year that out of them 32 persons were working in the enterprises of SOCAR and 49 persons from outside organizations. 8 persons, who were employed, passed the competition held in Human Resources Department and 13 persons were alumni of Foreign Scholarship Program of SOCAR. Labor book was issued for 6 persons because of first job place. 44 persons were dismissed in the same period.

Up to 01.01.2014, out of employees working for Head Office 189 persons are key employees, 359 persons are specialists and 5 persons are technical staff. Including 162 persons are women, 16 persons are pensioners and 146 persons are the youth under the age of 29. Average age limit of the employees working for the Head office make up 39. 531 persons of the employees are highly educated, out of them 6 persons are doctors of science and 29 persons are doctors of philosophy (candidates of science).

160 employment contracts were signed and labor contracts of 56 employees were duly amended by president of SOCAR and the Personnel Management Committee in view of appointment in 2013. Employment contracts of 98 persons were terminated by the initiative of those employees within the same period.

In total, 57 orders of SOCAR and 387 decisions of the Personnel Management Committee were developed and executed within the Head office and nomenclature staff (appointment, deployment, dismissal, amendment to employment contracts, assignment of official duties) in 2013.

Appointment of 70 persons for relevant positions was allowed subject to agreement with heads of relevant structural units of SOCAR which to be appointed in agreement with the heads of relevant structural units of the Company pursuant to order 72 dated 03 June 2010 of SOCAR. Personal documents of 3 employees were rejected because of unsuitability for the relevant positions.

Labor books of employees of Head office of SOCAR and managerial staff included in SOCAR nomenclature are maintained in the Personnel division, proper notes are made and are recorded duly.

It should be noted that the Personnel division received more than 2000 applications, memos, different letters and other documents which were executed by follow-up of pendency time in 2013.

Number, category, trend and fluctuation of SOCAR manpower

Number of employees within SOCAR were reduced as 5146 persons in 2013 and totalled to 61088 persons up to 01.01.2014. Reduction of the number of the employees is related to transfer of employees of Caspian Sea Oil Fleet (4198 persons) to "Azerbaijan Caspian Sea Shipping" CJSC and transfer of employees of Baku Deep Water Jackets Plant (511 persons) to "Bosshelf" company. Reduction of the number of the employees (totally 664 persons) was resulted from the arrangements oriented to optimization of number of employees in other enterprises of SOCAR (Security Department - 163 persons, "Azerikimya" PU - 312 persons, Social Development Department - 189 persons). The actual number of the employees in the Company's enterprises and average annual number of SOCAR employees in 2013 are shown in the following table:

Table XVII.1 (person)

Name of enterprises	01.01.2012	01.01.2013	Annual average number of employees
Head office of SOCAR	518	555	537
"Azneft" PU	16188	15995	16060
"Azerigaz" PU	13867	11310	11662
"Azerikimya" PU	3811	3499	3711
Geophysics and Geology Department	1591	1474	1649
Oil Pipelines Department	1078	1023	1035
Marketing and Economic Operations Department	347	345	341
Investments Department	44	59	45
"Azerneftiyagh" Oil Refinery	2308	2331	2323
H. Aliyev Baku Oil Refinery	2508	2525	2492
H. Aliyev Baku Deep Water Jackets Plant	677	148	172
Gas Processing Plant	665	701	669
Social Development Department	1232	1043	1450
Security Department	3832	3669	3908
Ecology Department	382	456	385
Gas Export Department	155	3017	2470
Information Technologies and Communication Department	1068	1085	1053
Caspian Sea Oil Fleet	4373	0	4076
"Oil and Gas Construction" Trust	5269	5454	5318
"Complex Drilling Works" Trust	3929	3869	3889
Oil and Gas Research and Design Institute	1214	1198	1157
"Development of Work Condition Norms" Department	107	107	104
Editorial office of journal "Azerbaijan Oil Industry"	21	22	21
Training, Education and Certification Department	217	303	254
Anti-blowout Mine-Rescue Militarized Unit	170	166	168
Diving and Salvage-Rescue Department	535	567	548
Carbamide plant	22	22	22
Baku High Oil School	42	64	49
Companies on international projects of SOCAR:	64	81	-
TOTAL:	66234	61088	65568

The structure of actual employees of SOCAR on 01 January 2014 is as follows:

Table XVII.2

Actual number of employees	61088 (100%)
Including labourers	41676 (68,2%)
managerial staff	7917 (13,0%)
specialists	10983 (18,0%)
technical staff	512 (0,8%)
women	10928 (17,9%)
pensioners	4523 (7,4%)
highly educated	19011 (31,1%)

9420 persons were employed by enterprises of SOCAR in 2013.

Including:

- 5765 persons due to internal rearrangement;
- 3655 persons from outside. Out of them:  
817 temporary employees (seasonal, construction based etc.)  
20 demobilized persons  
4 persons due to expiry of contracts of employees involved in joint projects  
315 persons alumni of Fellowship Program and Training & Education Center of SOCAR  
2499 persons recruited due to industrial necessity.

14566 employees were dismissed within the year. Including:

- 5154 persons on their own initiative
- 76 persons due to absence from work without valid reason and other labor violations
- 897 persons due to expiry of employment contract
- 37 persons due to military service
- 75 persons due to liquidation of enterprise and job cuts
- 208 persons due to death
- 110 persons due to health condition

8009 persons due to other reasons (Transfer of Caspian Sea Oil Fleet into Azerbaijan Caspian Shipping CJSC, of employees working at H.Aliyev Baku Deep Water Jackets Plant to Bosshelf company and of Main Gas Pipeline Sites into Gas Export Department etc.)

The personnel flow for SOCAR made up 9.0 % in 2013.

According to outcomes of competitions carried out by Human Resources Department, 1104 persons were employed over the past period that out of them 991 persons were recruited from outside and 113 persons working in enterprises and organizations of the Company.

Up to 01.01.2014 number of the youth under the age of 29 was 9661 persons, thus it totaled to 15.8% of overall number of the employees. Out of them 28% managerial staff and specialists, 38.6% highly educated and 10.2% of them are women. The analysis shows that up to 01.01.2014 the average age limit of SOCAR employees was 43.4.

However, it should be noted that up to 01.01.2014 the number of pensioners was 4523 persons, thus constituting 7.4% of the total number of the employees. Out of them, 3460 persons retired on a pension on preferential terms, while 332 persons retired due to age and 731 persons due to disability.

Up to 01.01.2014 the number of SOCAR employees with higher education has reached 19011 persons and made up 31.1% of total number of the employees.

The number of elderly employees (over 70 age) working within the reporting period totaled to 41 persons up to 01.01.2014.

The seniority of SOCAR employees working in the oil industry is as follows:

- up to 20 years - 43.7 thousand persons
- over 20 years - 17.4 thousand persons

Up to 01.01.2014 the number of SOCAR employees holding an academic degree is 305 persons. Out of them, 40 persons are doctors of science and 265 persons are doctors of philosophy (candidates of science).

Table XIII.3

Enterprises	Doctor of science		Doctor of philosophy (candidate of science)	
	Men	Women	Men	Women
Head office of SOCAR	6	-	21	8
"Azneft" PU	-	-	20	3
"Azerigaz" PU	-	-	8	1
"Azerikimya" PU	-	-	7	-
Geophysics and Geology Department	3	-	9	2
Oil Pipelines Department	-	-	3	1
Marketing and Economic Operations Department	-	-	5	1
Investments Department	-	-	5	4
"Azereftayagh" Oil Refinery	-	-	5	-
H. Aliyev Baku Oil Refinery	-	-	8	-
H. Aliyev Baku Deep Water Jackets Plant	-	-	-	-
Gas Processing Plant	-	-	1	-
Social Development Department	-	-	5	1
Security Department	-	-	1	-
Ecology Department	2	-	13	1
Gas Export Department	-	-	3	1
Information Technologies and Communication Department	-	-	3	2
Caspian Sea Oil Fleet	-	-	-	-
"Oil and Gas Construction" Trust	-	-	2	1
"Complex Drilling Works" Trust	1	-	1	-
Oil and Gas Research and Design Institute	21	1	77	29
"Development of Work Condition Norms" Department	-	-	-	-
Editorial office of "Azerbaijan Oil Industry" magazine	1	-	1	-
Training, Education and Certification Department	-	-	2	-
Carbamide plant	-	-	-	1
Baku High Oil School	3	1	2	4
Companies on international projects of SOCAR:	1	-	3	-
Total:	38	2	205	60



Up to 01.01.2014, 10928 women were employed by SOCAR that it made up 17.9 percent of the total number of the employees. 735 persons out of the employed women are key<sup>72</sup>



employees, 4171 persons are specialists, 5563 persons are labourers and 459 persons are technical staff. 984 persons are under the age of 29, 3389 persons or 31% of women are highly educated. 1225 persons of women are pensioners, including 79 persons retired on a pension due to age and 1034 persons on preferential terms and 112 persons due to disability. Majority of women work at the Oil and Gas Research and Design Institute (60%), "Development of Work Condition Norms" Department (50%), "Azerikimya" PU (42.3%), Information Technologies and Communication Department (34.3%), Oil Refineries (33%). 63 persons out of 319 employees of SOCAR holding an academic degree are women. Of them, 2 persons hold a doctor of science degree, while 60 persons hold a candidate of science degree. 388 persons out of the employed women are refugees and internally displaced persons and 7 women are production invalids.

Up to 01.01.2014, out of total number of SOCAR employees 121 persons are the members of martyr's families, 2764 persons are the veterans of Garabagh war veterans, 2289 persons are internally displaced people and refugees. It should be noted that 754 invalids are employed by SOCAR enterprises. Out of them, 157 persons are the invalids of Garabagh war, 1 person is the invalid of 20 January tragedy, 5 persons are the invalids of Afghanistan war, 48 persons are the invalids of Chernobyl accident, 86 persons are invalids from work and 457 persons are disabled.

### **Awards**

In connection with the professional holiday of Azerbaijani oil industry workers, 1 person was awarded the order of Honor and 51 persons the medal of "Progress" for their contribution to the development of oil industry of the country under Decree № 3155 dated 19 September 2013 of the President of the Republic of Azerbaijan. 5 persons were awarded the title of "Honorary engineer" under Decree № 3156 dated 19 September 2012 of the President of the Republic of Azerbaijan. Two old oil workers were granted the individual pension of the President of Republic of Azerbaijan for their immense merits in the oil industry under Decree № 3157 dated 19 September 2012 of the President of Republic of Azerbaijan. Significant documentation works were carried out by personnel division in respect to the awarding, state rewards were presented to the awardees with solemnity and proper minutes, personal records and registration cards of the awardees were submitted to the Presidential Administration of the Republic of Azerbaijan.

188 employees were awarded the Certificate of Honour of State Oil Company of Azerbaijan Republic for their special merits in the development of oil industry in 2013.

Out of them:

- On occasion of "Oil Workers Day" professional holiday - 101 persons
- On occasion of 60 years anniversary of H.Aliyev Baku Oil Refinery - 25 persons
- Staff of State Fire Protection Service of Ministry of Emergency Situations (for fighting a fire in well 90 in Bulla offshore field) - 28 persons
- Staff of State Border Service (for fighting a fire in well 90 in Bulla offshore field) - 17 persons
- Staff members of CSOF/BUE Caspian Alliance / Caspian Supporter ship (for fighting a fire in well 90 in Bulla offshore field) - 10 persons
- Several persons (for special merits) - 7 persons

### **Labor discipline**

Performance of proper works were continued towards increase of exigence in Head office of SOCAR and in all structural units in order to strictly follow labor and execution discipline in

2013. Data on discipline status for outcomes of 2013 year as compared to 2012 are reflected in the following table in view of SOCAR enterprises:

*Table XVII.4*

	<b>Data</b>	<b>2012</b>	<b>2013</b>
1	Number of labor discipline violations (case)	4702	4859
2	Violators of labor discipline, person	6940	6866
3	Unjustified absence	369	219
4	Violators of labor discipline	2717	2719
5	Leave of work place without permission	196	234
6	Number of defaulters	2038	2102
7	Latecomers	317	263
8	Presence in drink	81	45
9	Violators of safety regulations	750	666
10	Number of reprimanded employees	6688	6602
11	Dismissal due to absence from work and other labor violations	153	76

### **Awarding of the title of "Labor veteran"**

Awarding of the title of "Labor veteran" is performed in accordance with Decision № 216 dated 22 September 1995 and Decision № 150 dated 24 September 1999 of the Cabinet of Ministers of Republic of Azerbaijan. All documents concerning the award of the title of "Labor veteran" submitted by the enterprises to the division are checked once more and executed under proper orders of SOCAR. 293 persons were awarded the title of "Labor veteran" under 56 orders issued by SOCAR and certificates of two persons were replaced with new ones in order to award the title of "Labor veteran" and update the certificates in 2013. In total, 295 certificates "Labor veteran" were filled up and submitted to applicants over the past year within SOCAR.

### **Attestation of senior staff and specialists**

In accordance with Resolution № 97 dated 23 May 2001 of the Cabinet of Ministers of Republic of Azerbaijan "On approval of Regulations for attestation in the Republic of Azerbaijan", there held an attestation of personnel in "Azneft" PU, "Azerigaz" PU, "Azerikimya" PU, "Azərneftyağ" Oil Refinery, "Oil and Gas Construction" Trust, "Complex Drilling Works" Trust, Oil and Gas Research and Design Institute and Information Technologies and Communication Department and other organizations in 2013.

Last year 2350 persons out of 2893 senior staff and specialists planned for the departments and enterprises of SOCAR were attested. 2271 persons, who passed the attestation, complied with their positions, while 79 persons failed. As a result of the attestation, 121 persons were promoted in grade, 23 persons were transferred to other positions and 22 persons were dismissed.

### **Use of vacations and temporary loss of capacity to labour**

There issued 80 proper orders of SOCAR and 1232 decisions of Personnel Management Committee in 2013 in view of usage of vacations of employees included in Head office and nomenclature and signed by the top management.

The employees of SOCAR Head office were on leave 782 times in 2013. 15 persons were on study leave and 9 persons (3 persons since week 22 of pregnancy) were on social leave. 22 employees of SOCAR Head office were paid compensation to the extent of 613 calendar days for unused leave. 24 persons were on unpaid leave for several reasons within the reporting period.

Up to 01 January 2014, the number of unused vacation days within SOCAR enterprises and organizations totaled to 37637 and within the Head office of SOCAR to 10249 calendar days.

25062 persons did not attend work within 369444 days due to temporary loss of capacity to labour on SOCAR enterprises in 2013. The figures were 27831 and 419562 respectively in comparison with 2012. 286 persons within the Head office of SOCAR presented medical certificates and did not attend work for this reason within 2343 days in the reporting year. It should be noted that these figures totaled to 184 persons and 1862 men/days respectively in 2012.



## **XVIII. TRAINING AND DEVELOPMENT**

Human Resources Department of SOCAR has carried out selection and employment of highly qualified specialists, planning of career promotion, professional development, organization of high-level trainings, scholarship programs and summer schools as well as other works related to human resources management since its activity.

### **Applications reviewed by Human Resources Department**

In total, 2424 applications as well as 16128 e-applications were reviewed by Human Resources Department within the reporting period. Moreover, 2687 citizens/employees were received, their inquiries were addressed, proper investigations were carried out and the inquiries were replied. All the received applications were reviewed pursuant to requirements of Law №314-IQ dated 10.06.1997 of Azerbaijan Republic on Procedure of Citizen Applications Review.

### **Recruitment process**

2095 vacancies were announced under 1357 categories from 01.01.2013 till 01.01.2014 and there identified a compliance of information submitted by 79830 persons who entered "jobsearch" subsection (<http://careers.socar.az>) of "career" section of [www.socar.az](http://www.socar.az) webpage and filled up electronic application form on the announced vacancies with requirements.

2029 candidates out of 24204 persons, who passed the initial round of analysis, were discharged from test examinations and the remaining 22175 persons were invited to the test examinations. In total, 2441 persons (internal candidates who were qualified for the testing round upon vacancy suitability check-up and outside candidates passed the test examinations) took part in the vocational test examinations, 753 persons were successful at the testing round and were assigned to enterprises and organizations of SOCAR to be employed. In total, 2114 persons (internal candidates who were qualified for the testing round upon vacancy suitability check-up and outside candidates passed the test examinations) participated at the interview round and out of them, 81 persons were successful and were assigned to enterprises and organizations of SOCAR to be employed.

In total, 363 persons were included in the Personnel reserve base (PRB) of SOCAR within the framework of competition process (vocational test examination and interview) in the duration of reporting period. In this period totally 301 persons from the Personnel reserve base were assigned to enterprises and organizations of SOCAR to be employed.

According to requirements of orders of SOCAR and decisions of the Personnel Management Committee, 257 persons were employed by presentation of SOCAR management and 50 persons were employed under the Scholarship program (31 persons under the Study Abroad program, 19 persons under Internal Study program). Total 1442 persons were assigned to departments and enterprises of SOCAR to be employed from 01.01.2013 up to 01.01.2014.

### **Tariff-Qualification Commissions**

In the presence of representatives of Human Resources Department in 88 meetings of the Tariff-Qualification Commissions held in SOCAR enterprises and organizations, the issues of transfer of 1747 employees without payment of compensation were considered and the claims of 1402 persons (80.2%) were satisfied.

### **Transfers to other positions**

Compliance of 15814 transfers to other positions carried out in structural units in direct subordination of SOCAR with the requirements of legislation and internal normative documents of SOCAR was checked up.

## **Career management**

There prepared a draft version of Rules on "Career management in SOCAR" and application of pilot version of the draft in Information Technologies and Communication Department and Ecology Department of SOCAR started in order to provide regulation of career management processes in enterprises and organizations of SOCAR in an integrated form and as per requirements of international standards.

So, as a first step in view of necessity emerged for automatization of career management processes, current education lines required for automatization of process of Ecology Department and Information Technologies and Communication Department were determined and the positions were categorized on disciplines and offshore & onshore working conditions and work records required for the positions were listed on requirements of the system.

Also, education, work record, discipline and age data of 1449 employees overall in both enterprises were analyzed in preparatory stage of the process and as a result, 505 persons complying with preselection criteria were entitled to take part in the process.

As a result of Performance Appraisal Service, 236 persons were identified to be trained, 1 person as a participant in the satisfaction survey and 83 persons who obtained the highest scores were selected as an assigned leader in view of each structural unit (division, workshop, site etc.). Knowledge check-up stage was conducted on 9 February - 7 March 2013 and 217 persons who were accepted for this stage, participated in test examinations for relevant positions. 58 persons out of 63 persons who succeeded in the test examination were selected as an employee that activity of 11 persons out of them as an internal trainer deemed possible.

In the next stage Career management system was integrated into SAP BRP system in view of application of the system in other enterprises and organizations and terms of reference for software to be applied through webserver was prepared and submitted to Information Technologies and Communication Department of SOCAR.

In view of facilitation of usage of software, Career management - memory book was compiled according to the software and submitted to Information Technologies and Communication Department of SOCAR.

Moreover, videoclips were prepared concerning each stage of the software and added into "Portal of Management of Human Resources of State Oil Company of Azerbaijan Republic" through link of corporate website of SOCAR in order to ensure facilitation of usage of the software. After completion of software-related works, application of the system in other 7 bodies (H.Aliyev Baku Oil Refinery, "Azerikimya" Production Unit, "Azerneftiyagh" Oil Refinery, Gas Processing Plant, Development of Work Condition Norms Department, Training, Education and Certification Department, Oil and Gas Research and Design Institute) was launched according to instruction of top management of SOCAR and the followings were fulfilled:

Application of the career management system within 7 bodies covered overall 10771 employees. 5006 persons of out them were entitled to take part in the career management system by complying with requirements of the preselection criteria and 54% of the employees entitled for participation, took part in the system.

In total, out of 2718 persons participated in the career management system, 1965 persons were identified in the knowledge check-up stage, 40 persons within the category of employees subject to satisfaction survey, 707 persons within the category of employees to take part in

skills training and 6 persons in the capacity of employees to take part in individual development training.

### **Satisfaction surveys**

There conducted an opinion survey among the employees of "Azneft" Production Unit in regard to measurement of employee satisfaction and loyalty, and identification of factors impacting upon outflow of human resources and taking relevant actions towards elimination of them.

1672 persons (11.72%) took part in the survey within "Azneft" Production Unit that out of them 1461 persons filled up the survey form on paper-based, 211 persons on webpage. 891 persons (53.26 %) out of 1672 persons participated in the survey, refer to officer (to the exception of managers) and 782 persons (46.74%) refer to labourer category.

Other survey was held by Human Resources Department among the persons who were employed by SOCAR and were dismissed at their own initiatives, alongside with the survey held in "Azneft" Production Unit. The survey was carried out by phone call with 113 persons.

As you know, the career management system is being applied in the enterprises of SOCAR such as "Azerikimya" Production Unit, H.Aliyev Baku Oil Refinery, "Azernefityagh" Oil Refinery, Oil and Gas Research and Design Institute, Gas Processing Plant, Training, Education and Certification Department, Development of Work Condition Norms Department. There conducted an opinion survey among the employees of the enterprises and organizations where the career management system has been applied by us presently in order to take relevant actions towards measurement of employee satisfaction and loyalty, and identification of factors impacting upon outflow of human resources and elimination of them.

In total, 1312 persons took part in the survey within 7 structural units specified hereof that it makes up 12.15% of employees of structures represented by the participant employees. 1140 opinions out of 1140 opinion surveys were paper-based, 172 opinions were electronically surveyed. 831 persons (63.34 %) out of 1312 persons participated in the survey, refer to officer (to the exception of managers) and 481 persons (36.66%) refer to labourer category.

At the same time, there conducted a survey among the persons who were newly employed by SOCAR and worked at least two months. Such survey was arranged to measure satisfaction of the employees recruited by SOCAR. 116 persons participated in the aforesaid survey up to day.

Another survey was conducted among the persons who were employed by SOCAR and were dismissed at their own initiatives. This survey was arranged in order take relevant actions towards identification of factors impacting upon outflow of human resources and elimination of them. The survey was carried out within the aforesaid 7 bodies as well as Ecology Department and Information Technologies and Communication Department of SOCAR where pilot project on Career management system was launched. The survey was conducted by phone call with 115 persons.

One of the surveys was conducted among the employees of relevant commissions working in enterprises and organizations of SOCAR in view of improvement of processes within Tariff-Qualification Commissions. 424 persons participated in this survey up to date.

In reference to responses of participants in the survey, relevant statistic information was prepared through program Statistic Package for Social Sciences (SPSS) and responses were analyzed comparably.

### **Works carried out for SAP BRP system**

Other line of the activity of Human Resources Department aimed to prepare new reporting forms in the direction of HR module of SAP BRP system, to open new infotypes for regulation of redeployment operations, to verify in an intensive manner integrity of data (while upgrading of salary rates of the employees and controlling over redeployment operations) put in by personnel divisions of the enterprises and organizations and hereof, to give operative information to them, to perform due operative enlightenment works and to forward the needed information and statistics to other structural units. So, there created codes for 11 new infotypes, 12 statistic reports and 5 new transactions in SAP ERP system and put into use together with detailed instructions in 2013.

Data on job descriptions, education line, positions (occupations), disciplines for structural units, requirements for the relevant positions such as work record, education and category and subordinated structures were prepared and uploaded into the system in respect to the career management system.

### **Foreign Scholarship and Internal Scholarship Programs**

In the direction of development of young specialists in 2013, there held admission of documents for the Foreign Scholarship program of SOCAR and documents of 64 persons, who applied for the program, were reviewed. Upon acceptance of candidacy of 47 students whose parameters complied with the requirements, documents of them were submitted to Commission for Development of Specialists Abroad. In the course of meetings of the Commission, totally documents of 47 candidates were reviewed that out of them 44 students received a positive opinion, while 3 candidates received a negative opinion. 7 out of the students, who received a positive opinion, refused from participation in the Program for certain reasons and as a result, 37 students acquired the status of "scholarship holder" enrolled in the Foreign Scholarship program of SOCAR and started to study in most renown universities throughout the world.

Out of the alumni, who completed his/her education in 2013, 4 persons were employed by Head office of SOCAR, 2 persons by "Azneft" PU, 1 person by "Azerikimya" PU, 5 persons by Information Technologies and Communication Department, 6 persons by "Development of Work Condition Norms" Department, 2 persons by Marketing and Economic Operations Department, 1 person by Baku High Oil School, 3 persons by Investments Department, 3 persons by Administration of Oil & Gas Processing and Petrochemical Complex under Construction and 3 persons by joint ventures. Other 5 persons withdrew from the Program by payment of costs spent for them while the remaining 3 persons were given one-year time for the reasons of education, practice and military service.

Moreover, admission of documents was conducted for Internal Scholarship program in 2013. 2505 students from 28 universities of Azerbaijan applied to the program, then 2123 students were allowed to take examination carried out by SCSA as they met the requirements and terms of the program and out of them 1904 students participated in the examination. 397 students who got the appropriate pass score determined by the members of the Commission were invited to the next stage, i.e. interview. 141 students were awarded scholarship and out of them 72 persons were selected as a scholar of SOCAR for the first time.

## **“Paid Summer Practice” Program**

Furthermore, “Paid Summer Practice” Program was organized in 2013. 1073 Azeri students, who study on bachelor’s and master’s degrees of the universities in Azerbaijan and abroad, applied for the Program. 254 students from 18 high education institutions were admitted to the summer practice. Out of applicants 251 persons were selected to practice in the departments and enterprises of SOCAR that 101 of them were holders of SOCAR scholarship.

After completion of the “Paid Summer Practice” Program, there held the essay competition on the topic of “My Summer Practice 2013 in SOCAR”. 15 employees of Training and development division of Human Resources Department separately read each essay on criteria of structure, logic, originality and creative approach to the topic and evaluated them under 5-score system. At the end, average score was determined based upon evaluation marks for the essays and according to the evaluation, three essays took I, II and III places.



## **“SOCAR Summer School” Project**

As it is conducted every year, the project “SOCAR Summer School” was held in 2013. 276 persons who study at 36 local and foreign universities, applied to “Summer School 2013” that out of them 31 persons were employees of SOCAR. Out of the applicants 210 candidates who complied with initial terms, were accepted for test examinations held on the project “SOCAR Summer School 2013” dated 15.07.2013 and as a result, 153 persons took part in the test examinations. 85 persons of them passed the test examination successfully and were accepted for the interview. During the interview, 36 candidates were entitled to be selected.

## **Admission to Training Centres of the SOCAR**

In 2013, there conducted 280 trainings in Personnel Development Centre, 493 trainings in Marine Safety Training Centre, 29 trainings in Gala Training Centre and 52 trainings in Sumgayit Training Centre. 4321 participants attended in the Personnel Development Centre, 6899 participants in the Marine Safety Training Centre, 773 participants in Gala Training Centre and 347 participants in Sumgayit Training Centre.





As every year, admission processes were carried out in Training Centres of SOCAR in order to develop qualified labourer for 2013-2014 over the last year. Thus, out of 1169 candidates who applied for participation in the competition on 15 professions in the Personnel Development Centre and Gobustan Regional Training Centre, 350 persons were admitted to the Personnel Development Centre and Gobustan Regional Training Centre, out of 462 candidates who applied for participation in the competition on 7 professions in Sumgayit Training Centre, 85 persons were admitted to Sumgayit Training Centre of Training, Education and Certification Department.

There implemented pupil admission for the vocation of "Gas facilities operation and maintenance fitter" at the Personnel Development Centre in 2013. Out of 192 candidates applied for participation in the competition, 30 persons were admitted to the vocation of "Gas facilities operation and maintenance fitter" at the Personnel Development Centre. The admission process was organized for the discipline of "4th grade diver within I-II work category" at the Marine Safety Training Centre and out of 204 candidates applied for participation, 20 persons were admitted to the Centre. Also, the admission process was arranged in 2013 for the first time in view of different vocations within the disciplines of Chemistry, Mechanics, Electricity and Electronics in H.Aliyev Technical and Industry Vocational Lyceum owned by SOCAR and "PETKIM Petrokimya Holding A.S." which located in Izmir city of Turkey. Out of 82 candidates applied for participation in the competition, 24 persons were entitled to study in the Lyceum.

### **The conducted test examinations**

22175 citizens were invited to the test examinations held on 1319 vacancies for "Employment" and out of them 15019 persons (62.05 %) within the reporting period. Out of the participants 13629 persons (90.74%) were men, 1390 persons (9.26%) were women. In total, 2526 persons (16.81%) out of the participants succeeded in the test examinations and were invited to the next stage. Out of the participants invited to the next stage 2370 persons (93.83%) were men, 156 persons (6.17%) were women.

40 and 20 test exercises were submitted to the citizens for the test examinations held within "Employment" project under servant and labourer categories. 40 test exercises were comprised by 4 test blocks and 20 test exercises were comprised by 2 test blocks. 60 minutes were set to answer 40 test questions and 40 minutes for 20 test questions for the citizens.

233 persons were invited to test examinations within "Career management" project held from 09.02.2013 to 07.03.2013 that out of them 217 persons (93%) took part in the test examinations. 166 persons (76%) were men, 51 persons (24 %) were women among the participants.

100 test exercises comprised by 5 test blocks were submitted to the employees for the test examinations held within "Career management" project. In total, 150 minutes were set to answer such test questions.

210 persons were invited to test examinations within "SOCAR Summer School 2013" project held on 15.07.2013 that out of them 153 persons took part in the test examinations. 115 persons (75%) were men, 38 persons (25 %) were women among the participants. In total, 85 persons were invited to the next stage - interview upon success in the aforesaid test examination that out of them 67 persons (79 %) were men and 18 persons (21%) were women.

50 test exercises comprised by one test block were submitted to the employees for the test examinations held within "SOCAR Summer School 2013" project. In total, 90 minutes were set to answer such test questions.

Regular meetings were held in the presence of scientists, professors and teaching staff of renown science and education institutions, including Azerbaijan National Academy of Sciences alongside with highly qualified specialists of SOCAR in order to improve, update and expertise Electron Base of Test Exercises and prospective plans were determined in view of performance of duties more successfully.



## **XIX. OCCUPATIONAL SAFETY**

Considerable works were carried out in SOCAR enterprises with the aim of creating healthy and safe working conditions, upgrading production areas, facilities and work places in compliance with the requirements of up-to-date standards and preventing industrial injuries, accidents and occupational diseases in 2013. For this reason, an amount to the extent of 22340030 Manat was spent for performance of such works in 2013.

Certain works were carried out for provision of employees with individual and collective recovery aids. Setting up of lifeboats and rafts were realized in all newly constructed deep water jackets and only after these procedures the jackets were accepted for commissioning. Almost all running lifeboats in all deep water jackets of Gunashli field of "28 May" OGPD were replaced with new ones.

Provision of the employees of enterprises of the Company and engineer-technical workers of the Head office of SOCAR dealing with production issues with coveralls, boots and other personal protective equipment and life jackets and buoys and rafts for offshore facilities was improved, and usage of such coveralls and aids in all enterprises by the employees was regularly controlled. An amount of 8000657 Manat was spent for the provision of employees with coveralls, boots and personal protective equipment in 2013.

As a result of the actions taken, status of fire safety was increased in production facilities. Continuing duty of rescue ships in near by fire-hazardous offshore jackets was provided in order to ensure fire safety of the jackets. New automatic fire detector and fire extinguishing system implying state-of-the-art devices, equipment and video screening aids were installed, tested and put into operation at deepwater offshore jacket 4 in "Gunashli" field. Such systems are being installed at deepwater jackets 2 and 14 presently and it is planned to install such systems at other jackets in future.

Periodical medical check-up of the employees was strictly controlled by Health and Safety Department in current year as it was followed in the previous years. According to the plan schedule approved as from beginning of the year, 19205 persons on enterprises of the Company were subject to medical check-ups as a result of which, 1997 persons found on various diagnoses were transferred to easy work, some other part was prescribed in-patient and out-patient treatment and another part was given a medical advice.

Measurement works were carried out in 1475 work places by industry-sanitary laboratories in 2013 and hazardous production factors (mainly, noise, gaseous air and vibration) were found to be excessive more than norm. There assumed actions for compliance of such factors with the adequate norm and alignment of majority of the same factors with the norm limit were identified through remeasurement works.

An attestation was carried out at work places in 45 structural organizations of the Company enterprises in 2013. 1183 work places out of 4089 attested places were deemed hazardous according to outcomes of the measurement works. Alongside with proper actions for mitigation of hazardous production factors to health of the employees in such work places, arrangements were carried out for additional benefits (payments) due to hazardous work condition. Moreover, milk was provided free of charge to the employees handling noxious substances as a preventive action for mitigation of impact of chemical substances to human health.

For the purpose of identification, liquidation or minimization of the risks which might cause hazards, fires, accidents and occupational diseases in production sites, regular inspections were carried out in several production sites, in particular offshore facilities by Health and Safety Department of the Company and the permanent commission on occupational safety in 2013. Current state of working conditions was inspected in 30 organizations of 12 enterprises of the Company and violation of safety rules and other faults more than 846 cases were detected, subsequently there assumed measures for elimination of them and the majority of the detected faults were liquidated and elimination of the remaining faults was under control. Regular control was followed over emergency response plan in view of eventual accidents in the production sites of the enterprises. Also, skills of the employees to use signal aids, personal and collective protective equipment and primary fire-extinguishers in the relevant sites were checked and due enlightenment works were conducted to raise awareness on such issues.

Project documents received by the Department in respect to construction and reconstruction of facilities were reviewed and compliance of them with safety norms and rules and requirements of relevant standards was controlled.

Regular enlightenment and instruction of employees in the enterprises and the improvement of their knowledge were in focus in order to train employees on the rules for safe performance of works and to increase knowledge on occupational health. Knowledge and skills of 12729 engineers-technical workers were tested in the enterprises in 2013. There developed a number of rules and instructions reflecting safety rules in works performed in production sites. "Safety rules in oil refinery and petrochemical industry" and "Maintenance and safety rules for main gas pipelines" were developed by Azerbaijan State Scientific Research Institute for Labour Protection and Safety jointly with Health and Safety Department of the Company and they were distributed among departments and enterprises upon approval. At the present, additional two guidance documents - "Set of instructions on safety of oil & gas well drilling" and "Set of instructions on measurement and assessment of hazardous production factors in attestation of work places" are under development. In view of application of newly developed and approved "Rules", an off-schedule knowledge check-up of engineers and technicians working in relevant spheres was conducted and compliance of the enterprises with the requirements of such "Rules" was controlled.

Contemporary period within of which international economic relations are expanded and the enterprises are integrated into advance world practice, requires application of international management systems in the enterprises of SOCAR. In this respect, a number of enterprises of the Company shaped activity and within international management standards, including "OHSAS 18001 – Occupational Health and Safety Management System" at the level of requirements of the contemporary period and obtained proper certificates. Health and Occupational Safety Department carried out monitorings in such enterprises, compliance of the relevant works with the requirements of the aforesaid standard was verified, the enterprises were rendered due methodical support in the related sphere, enlightenment works were conducted and the recommendations were given in the duration of the year.

Requirements of standards of ISO 9001 "Quality management system" and "OHSAS 18001 - Occupational health and safety management system" and proper certificates were submitted for the courses organized by Training, Education and Certification Department in order to increase professionalism and knowledge level on international standards of the employees of Health and Occupational Safety Department. At the same time, English courses were

conducted for the employees to be taught and the employees were awarded relevant certificates upon completion of the courses within I and II levels.

As a result of the taken integrated measures, nevertheless there achieved a decline in the number of occupational accidents in the duration of 2012-2013 as compared to the previous years, 12 production accidents occurred in the enterprises of SOCAR in 2013, out of which 3 accidents were fatal (one of the fatal accidents was caused by road-traffic accidents and as a result, operator of lifting pipelay tractor belonged to Special Machinery Unit died. No group accidents were occurred.

There issued proper order by the Company and relevant enterprise for any fatal accident and while noting in such order the actions to be taken by heads of the organizations for prevention of fatal accidents and incidents the employees, including managerial staff deemed faulty in such fatal accident were reprimanded in order to bring to notice of the employees working in other structural bodies the situation and reasons of the occurred fatal accident and to take preventive actions for avoidance of such fatal accidents.

In total, 1374 persons were subject to disciplinary punishment for violation of safety rules and negligence of accidents pursuant to orders of the departments and enterprises within the year. Out of them, 5 persons were dismissed, 228 persons were reprimanded severely with a final warning, 962 persons were reprimanded and salaries of 179 persons were reduced.



## XX. ECOLOGY

### **Environmental monitoring works in offshore and onshore oil & gas fields**

Initially, Environmental Monitoring works were conducted towards Environmental Impact Assessment (EIA) and in solution of environmental problems in exploration and development of offshore and onshore oil & gas fields, including activity areas of enterprises and organizations in 2013.

462 environmental monitorings were conducted for overall facilities in the duration of 2013 that out of them 309 were in onshore facilities, but 153 of them were in offshore facilities. Total number of samples received by Complex Researches Laboratory made up 5388 and number of overall analyses made up 41958. 4232 of the samples were taken from offshore facilities and 1156 of them from onshore facilities.

There carried out 185 environmental monitorings by specialists of the Ecology Department assigned to enterprises and organizations of SOCAR in regard to the execution of order 133 dated 22 April 2013 "On assignment of specialists of the Ecology Department to enterprises and organizations of SOCAR".

### **Works carried out in preparation of environmental normative documents**

In total, 158 normative documents were prepared for enterprises and organizations by the Ecology Department including 20 "Environmental Passport" documents, 44 "Allowable Emission Threshold" documents, 4 "Admissible Flow Rate" documents, 90 "Hazardous Waste Passport" documents.



Besides, the Ecology Department took part in bidding requests announced by some outside organizations in 2013 and works for preparation of ESIA documents within the bidding requests which won by the Department in 2012, were continued. So, the works for development of Environmental Impact Assessment Paper on Onshore 2D Seismic Works in the territory of Azerbaijan Republic between SOCAR and "ConocoPhillips Exploration Azerbaijan Ltd" were completed in 2013.

Document "Environmental and Social Impact Assessment for Geophysical and Geotechnical

Works" which announced by "TOTAL E&P ABSHERON B.V" company, was developed and submitted to the client by agreement with the Ministry of Ecology and Natural Resources. Preassessment procedures were carried out in the area where deep water jacket will be located in view of development of Environmental and Social Impact Assessment document for Deep Water Jacket 7 to be installed in "Gunashli" field under the order of "Azneft" PU and due works were performed towards development of other sections of the document in 2013. Document on Environmental and Social Impact Assessment for construction and running period of Baku Olympic Stadium being constructed in the territory of Sabunchu district according to task of SOCAR and the final document was agreed with the Ministry of Ecology and Natural Resources in 2013.

Alongside with the aforesaid, Ecology Department took part in 5 bidding requests announced by outside organizations in 2013:

1. Development of document on Environmental and Social Impact Assessment for 3D/4C Seismic Exploration Works announced by "TOTAL E&P ABSHERON B.V" company on 12 April 2013;
2. Bid on "Laboratory services for environment" announced by BP Exploration company on 29 May 2013;
3. Bid on "Laboratory services for Ecological Health and Industrial Hygiene" announced by BP Exploration company on 6 December 2013;
4. Bid on "Survey of Primary Social Condition" announced by "TOTAL E&P ABSHERON B.V" company on 5 November 2013;
5. Bid on Services for Disposal of Wastes announced by "Bahar Energy Operating Company Limited" company on 2 August 2013;

### **Electronic Database for Environment managed in CIS system**

Data received within the monitoring works carried out in activity zones of oil and gas production departments in Absheron peninsula were put in electronic operative database, the data base was updated and archiving of current data was fulfilled in 2013.

### **Actions taken for Reduction of Gases Generating Heat Effect**

There carried out inventory-taking of gases generating heat effects and noxious emissions regulated under "UN Framework Convention on Climate Changes" within structural units, Operating Companies and Joint Ventures together with relevant structures of Ecology Department for 2012 in respect to execution of order 68 dated 24.04.2008 of SOCAR and reports were prepared and submitted to SOCAR management.

Moreover, monitoring works were carried out within the organizations in order to review progress of "Plan for reduction of associated gas emitted into air in the projects of SOCAR and involved by SOCAR" and proper reports were prepared in the duration of current year.

Instrumental measurement works were carried out for setting up of quantity of gases generated from sources of Gases Generating Heat Effects and project idea was elaborated for gas collection according to outcomes of the measurement works in "Siyazanneft" OGPD.

Inventory of substances regulated by the Stockholm Convention about "Constantly Organic Pollutants" of the UN in SOCAR enterprises and organizations, as well as OCs and JVs were carried out, and the report was prepared and submitted to SOCAR management.

As a result of the inventory-taking, equipment with overall weight of polychlorbiphenyl to the extent of 3824 kg were established subject to production marks under the Convention.

### **Reduction of air emissions from transport means**

5887 units of motor transport were subject to environmental surveys initially and repeatedly in 2013 in order to ensure control over measurement of noxious gas emissions from

transport means used by departments and institutions of SOCAR and compliance of air emissions with normative documents.

During environmental surveys 4170 vehicles conformed to existing standards, but 1717 vehicles were not compliant with the aforesaid. 5118 vehicles from such transport means were examined within initial environmental survey that out of them 3915 vehicles conformed to existing standards, but 1203 vehicles were not.

### **Works carried out for disposal of wastes**

Capital construction-repair and assembly works were carried out in the Waste Disposal Centre on the basis of the project "Reconstruction of Waste Disposal Centre" prepared by Oil and Gas Research and Design Institute under the order of Ecology Department in 2013.

There developed a document "Specification of equipment to be installed within the project of expansion of Waste Disposal Centre" in order to carry out design works towards utilization of wastes generated in production sites of the departments and institutions of SOCAR, selection of rational disposal methods and reconstruction of the Waste Disposal Centre in line with high requirements. According to the specification approved by SOCAR Terms of Reference on expansion of the Waste Disposal Centre was developed and submitted to SOCAR.

19758.03 tons drill cuttings and 585.626 tons industrial wastes comprised by twenty nine types were handed over to the Waste Disposal Centre in 2013.

### **Landscaping works carried out**

73389 different species of trees and bushes were handed over to enterprises and organizations of SOCAR by Ecology Department and relevant agrotechnical consulting services were rendered to 574434 tree-bushes and flower crops at 400 ha area planted in green zone of 48 enterprises in 2013.

Moreover, 77485 saplings and 476.4 kg seeds were procured in 2013.

### **"Ecology Park" project**

Landscaping works were continued in Open Seed-plot comprised by 15562 m<sup>2</sup> total area and 60 beds and agrotechnical maintenance works were performed for more than 165000 tree and bush plants in a due manner in the duration of the year. 8000 different tree plants - Pinus eldarica, Pinus eldarica, Olea europaea, Elaeagnus angustifolia, Eucalyptus and other plants were cultivated in beds each with 200-350 m<sup>2</sup> area in Open Seed-plot.

Seeds of 697963 trees, bushes and flowers were planted in Closed Seed-plot of Eco park and 1155 pot flowers were bred by vegetative method in greenhouse section of the Closed Seed-plot and due agrotechnical maintenance works were followed for 45000 m<sup>2</sup> grassplot in the duration of year.





### **Works carried out for performance of sanitary-hygienic actions**

A number of actions were taken in order to carry out prophylactic-epidemiological control in enterprises and organizations of SOCAR in 2013.

Sanitary-hygienic control works were conducted at 224 facilities by Hygienic and Epidemiological Centre in current year. 3652 samples in bacteriological laboratory and 639 samples in chemical laboratory were analyzed in the duration of the year.

Water carriers were subject to sanitary-hygienic inspection, medical check-up status of the drivers was reviewed and sanitary passport was issued through sanitary-hygienic minimum in 2013.

The employees handling hazardous production factors were short-listed in a manner according to requirements of order 13 dated 1998 of Ministry of Health of Azerbaijan Republic and such short-list was submitted to healthcare institutions where medical check-up would be conducted in 2013.

### **Environmentally enlightenment actions**

Different environmental actions were conducted together with school children within the framework of the ecological enlightenment and propaganda according to "Action Plan for Ecological Propaganda and Enlightenment" of SOCAR in view of performance of the ecological enlightenment and propaganda.

Ecology Department arranged and carried out a number of environmentally enlightenment actions according to the approved annual work plan. Such actions comprised by different directions were taken in the presence of secondary schools, extracurricular institutions and other organizations.

## XXI. TRANSPORTATION

**a) Vehicles.** 5864 automobiles and special machineries existed at the balance of SOCAR departments and enterprises up to 01.01.2014. Out of them 2711 vehicles function with auto-petrol, 2931 vehicles function with diesel, 5 vehicles function with electric power and 217 vehicles are trailers.

List of motor-vehicle transport and special machineries of the departments and enterprises at the balance of SOCAR is shown in Table XXI.1.

*Table XXI.1*

Nº	Name of enterprise	Car	Bus	M/ bus	Truck	Special machineries	Tractors	Trailers	Total
1	"Azneft" PU	594	211	37	477	435	276	62	2092
2	"Azerikimya" PU	45	8	4	17	24	24	4	126
3	"Azerigaz" PU	302	14	6	276	28	124	25	775
4	Oil Pipelines Department	76	13	8	29	32	12	6	176
5	Security Department	161	13	4	1	2	1	0	182
6	Ecology Department	41	6	0	7	1	4	0	59
7	Complex Drilling Works Trust	96	39	3	147	110	59	38	492
8	Oil and Gas Construction Trust	117	55	9	228	82	226	53	770
9	"Azneftyağ" Oil Refinery	66	11	9	33	23	22	7	171
10	H. Aliyev Baku Deep Water Jackets Plant	30	31	2	21	19	44	9	156
11	H. Aliyev Baku Oil Refinery	82	23	3	31	39	9	4	191
12	Geophysics and Geology Department	68	17	12	59	81	8	4	249
13	Marketing and Economic Operations Department	2	1	0	4	1	6	0	14
14	Information Technologies and Communication Department	56	8	1	19	1	3	0	88
15	Social Development Department	0	0	0	0	3	0	0	3
16	Caspian Sea Oil Fleet	29	13	1	16	17	7	1	84
17	Anti-blowout Mine-Rescue Militarized Unit	8	3	1	2	1	0	0	15
18	Gas Processing Plant	109	22	2	35	30	19	4	121
	Total on SOCAR	1882	488	102	1402	929	844	217	5864

There carried out considerable works on effective usage of vehicles, special machineries and fuel-lubricants in the reporting year.

Spare parts were timely delivered in order to ensure technical availability of vehicles and special machineries and as a result, maintenance and repair works for them were fulfilled with high quality. Therefore, usage coefficient of park for vehicles and specific machineries totaled to 0.75 during 12 months of 2013.

567 automobiles and special machineries standard operation of which expired, became wear and tear and are not economically favorable to be operated and repaired, were inspected on place by relevant divisions, then proper opinions were prepared and submitted to the management to write off them in 2013. Subsequently, the aforesaid 567 automobiles and special machineries were written off from the balance of enterprises under proper orders of SOCAR. 120 automobiles were handed over to the balance of joint ventures and 9 ones were sold.

453 new machineries were purchased and put into service instead of the written-off machineries.

List of vehicles and special machineries for departments and enterprises of SOCAR which written-off, newly purchased, sold and handed over to balance of joint ventures in 2013, is shown in Table XXI.2.

Table XXI.2

Nº	Name of enterprise	Purchased in 2013	Written off in 2013	Sold	Extracted from balance
1	"Azneft" PU	161	234	9	0
2	"Azerikimya" PU	4	25	0	0
3	"Azerigaz" PU	14	66	0	0
4	Oil Pipelines Department	22	20	0	0
5	Security Department	30	0	0	0
6	Ecology Department	1	0	0	0
7	Complex Drilling Works Trust	24	1	0	0
8	Oil and Gas Construction Trust	57	89	0	0
9	"Azorneft" Oil Refinery	1	10	0	0
10	Geophysics and Geology Department	27	47	0	0
11	Information Technologies and Communication Department	17	0	0	0
12	Social Development Department				
13	H. Aliyev Baku Deep Water Jackets Plant	2	19	0	0
14	H. Aliyev Baku Oil Refinery	20	20	0	0
15	Caspian Sea Oil Fleet	9	15	0	120
17	Gas Processing Plant	13	11	0	0
18	Gas Export Department	51	10	0	0
	Total on SOCAR	453	567	9	120

According to instruction of the SOCAR administration the renewal of old vehicles and specific machineries is implemented gradually step by step taking into consideration the presence of old vehicles and specific machineries at balance of the enterprises of SOCAR.



There carried out certain works on usage of fuel-lubricants within the reporting year. The reports for 2013 on fuel consumption submitted by the enterprises and departments of SOCAR were studied.

2673.3 tons of auto petrol and 13952.0 tons of diesel fuel were saved during 12 months of 2013 as a result of the taken measures.

Proper instructions were given to heads of enterprises for elimination of defects and deficiencies found during usage of vehicles and fuels-lubricants at enterprises of "Azerikimya" Production Unit, Gas Processing Plant and "Azerneftiyagh" Oil Refinery in the reporting year. In principle, this arrangement was followed up in all transport enterprises.

Demand of the enterprises for procurement of spare parts was reviewed and proposals were submitted for procurement of them.

Moreover as distinct from last years, requests from enterprises about purchasing of transport means and special machineries were reviewed reasonably and upon review, the management was proposed to procure them. This arrangement is ongoing now.

In view of increase of efficiency of transport means, the following works were carried out in 2013.

GPS navigation system was put into service in order to operate transport means in relevant places according to norms and to use effectively fuels-lubricants. Thus, it is possible to obtain detailed information on location of transport means in any point of the republic, on its driving speed in safety standpoint and in one word, to get information on any vehicle everyday through this system.

Use of centralized computer network is continued within the Company for accurate record of spare parts.

There established regional centres by zones in order to control over use of transport means at "Azerigaz" PU. Monthly repair works for vehicles and machineries were carried out through computer program at transport enterprises. Transport means, which completed its daily work, was arranged to serve to several relevant customers in need for prevention of standby. Control over prevention of surplus drives was instensified and for this reason, there compiled a route map for transport means of newly opened facilities. Parking of vehicles in garages on Saturdays, Sundays and holidays was provided and this work is ongoing now.



**Quyularda t dqiqrat iřlerinin aparılması  c n  
ARTEX 2420 x susi laboratoriyası**

Transport workshops of "Neft Dashlary" OGPD and "28 May" OGPD were transferred into structure of Transport Department of "Azneft" Production Unit in order to use efficiently automobiles and fuel-lubricants in 2013.

Receipt of all reports, proposals and opinions delivered to the Company was carried out via email.

Recently, there emerged a necessity for redevelopment of fuel consumption norms approved by SOCAR in 2004 in regard to commissioning of new various vehicles and machineries produced abroad. Therefore, "Temporary norms for consumption of diesel, liquid gas, pressurized gas and lubricants for general and special purpose vehicles, tractors, other machineries and equipment" redeveloped by the Oil and Gas Research and Design Institute under order of SOCAR in 2013 were reviewed by the relevant division and specialists of transport units and they were approved by SOCAR management.

Adequate actions plan was drawn up and implemented at the related points in order to prevent road traffic accidents. Current works and proper tasks of SOCAR management were followed up by the relevant division alongside with the aforesaid.

**b) Sea transport.** Key activity of sea transport division is to provide organization of sea transport services needed for oil and gas production, drilling, construction, geological and technological processes and diving and subsea technical works, and to solve timely and in an expeditious manner sea transport services as well as to prepare and implement proposals for increase of effectiveness of sea transport means and diving works in order to perform annual production tasks envisaged in compliance with objective and strategy of the Company.

Information on floating crafts (ships, floating drilling rigs and barges) at balance of the departments and enterprises of SOCAR up to 01.01.2014 are shown as follows:

Caspian Sea Oil Fleet	- 190 ships (taking into account of 4 floating repair yards and 3 floating docks)
H.Aliyev Baku Deep Water Jackets Plant	- 1 service boat RK-"862"
Complex Drilling Works Trust	- 3 floating drilling rigs ("Khazar-6", "Istiglal" and "Dede Gorgud" type)
"Azneft" PU	- 8 barges
Oil and Gas Construction Trust	- 3 barges
<b>Total:</b>	<b>205</b>

Out of 205 ships, 179 ships are on run, 26 ships under repair and in dock for repair.

The suggestions about writing off the ships which physically and morally obsolescent, not economically favorable and the operation of which requires the great risk and were looked through by SOCAR and commented adequately. 27 floating crafts for different purposes were written off the balance of the SOCAR enterprises in 2013, including 26 vessels were written off from the balance of Caspian Sea Oil Fleet and 1 barge ("Barge", N5/8) from the balance of Oil and Gas Construction Trust. In current year 2 ships were accepted to the balance of Caspian Sea Oil Fleet ("Barra" supply towing vessel and "SOCAR-1" towing vessel).

There existed 190 ships of various types with the book value of 842279.03 thousand Manat on 65 projects at the balance of Caspian Sea Oil Fleet at overall lifting capacity of 76367.8 tons and 349269.5 horsepower up to 01 January, 2014. They consist of 21 derrick barges at load-lifting capacity of 20-2500 tons, 18 supply and towing vessels, 7 fire extinguishers of "Vikhr" type and 1 fire extinguisher of small type, 3 large-scale passenger ships, 26 small-

scale passenger ships of "PS", "PSK" və "MPK" types, 2 subsea pipelayers, 5 exploration vessels, 9 diving ships, 7 liquid carriers, 9 tugboats and harbour tugs, 5 oil vessels and sewage boats, 70 all-purpose launches, barges, 3 floating docks and 4 repair yards. Average limit of age of ships and vessels operated in Caspian Sea Oil Fleet is 29.6 years.

In the course of operation of derrick barges, special-purpose ships, supply and towing vessels, passenger ships, exploration vessels and diving ships, there appear technical disorders and malfunctioning due to expiry of operation period and life cycles. Subsequently, it leads to occurrence of difficulties in operation of ships and vessels in compliance with requirements of International Maritime Register. In view of launching of Baku Shipyard Plant in regard to necessity of replacement of operating ships and vessels at the Fleet with new ships and vessels complying with international standards and up-to-date requirements, there developed a program on building of new special-purpose ships which deemed substantial within 2013-2025 years, in the presence of the specialists of sea transport division and Caspian Sea Oil Fleet.

The Plant completed the construction of one towing vessel at the capacity 50 tons and handed over to Caspian Sea Oil Fleet in 2013. Moreover, the Plant signed a contract with Caspian Sea Oil Fleet for construction and purchase of 5 passenger ships. The works are ongoing over the design of derrick barges 60 tons and 100 tons and diving ships capable to run in 60 m depth.

Performance of all-purpose services in oil and gas production along the shelf is carried out just in partnership with the Fleet. It can be referred to seismic and geological exploration, carriage of deep water jackets, construction and fabrication of piers and trestles, drilling of oil & gas wells, accomplishment of offshore facilities, provision of on-the-run repair, fire protection of offshore facilities, laying of offshore oil & gas pipelines, delivery of offshore oil engineers to work places, transportation of fuels-lubricants and chemical reagents, subsea technical and emergency-rescue diving works and so on. There conducted consultations with relevant divisions of the Company and due actions were taken in order to maintain harmony of production in performance of the aforesaid works on a daily basis. For this reason, control over operation of ships serving to departments and enterprises in the structure of SOCAR was intensified and proper instructions were given for prevention of standbys. Efficient operation of ships and reduction of diesel consumption were achieved as a result of measures such as minimization of number of ships carrying loads on the same direction, adequate usage of ships in offshore oil & gas production jackets and limitation of sails of ships in stormy weather. So, 29019.5 tons of diesel fuel was consumed actually against diesel fuel fund to the extent of 33000 tons allocated for Caspian Sea Oil Fleet in 2013 (3980.5 tons of diesel fuel was consumed less than the planned).

Control over handling and movement of ships are fully carried out by application of "Remote recognition and tracking" system at the Fleet. Presently, data on loads and cargo, diesel fuel and potable water, which were received at ashore and distributed offshore for customers, are transmitted by ships and vessels to central dispatcher service of the Fleet through this system and transferred to Transport Department of SOCAR. Performance of such works aims to increase efficiency of ships in carriage of loads. Currently, exchange of operative data with central dispatcher service is pursued through this system, which is used in 148 ships and vessels of the Fleet. Also, application of this system in other ships and vessels has been planned for the future.

More complicated and aggravating responsibility within the framework of the above scope of services of the Fleet arises from carriage of overweight blocks to deep water jackets, laying of subsea pipelines and accomplishment works. Thus piling and reinforcement at platforms 418, 1645, 683 of "Neft Dashlary" field, jacket 20 in "Western Absheron" field and erection of derrick and subderrick scaffold at jacket 740 of "Darvin bank" field and erection of docks (each at the weight of 600 tons) comprised by 4 parts of gaslift compressor station in "Gunashli" field, placement of blocks and construction works at jacket 112 in "Chilov" field and firefighting works for fire emerged at jacket 82 of Bulla field in September and October through support of derrick barges "General A.Shykhliniski" və "G.Abasov" with 600 tons load-lifting capacity. Other towing vessels and "Vikhr" type fire-extinguishers of the Fleet took part in extinguishing of fire. Laying of 16-inch subsea pipeline at length of 18 km between "Umid" field and Bulla 82 jacket was completed through "S.Vazirov" pipelaying barge. Derrick barge "Shirvan" type at load-lifting capacity of 100 tons, supply and towing vessels, diving ships and exploration vessels of the Fleet were actively involved to the performance of such works. At the present, erection of support piles and accomplishment works are carried out.

252475 passengers were carried to facilities such as offshore oil & gas production, construction and fabrication and other facilities by passenger ships of the Fleet in the reporting year.

Load carriage plan of the Fleet was overfulfilled as 92.3 % (plan 600000 thousand tons, actual 553851 thousand tons, i.e. 46149 tons underload), ship hour plan 114% (plan 511344 hours, actual 582744 hours). Information on other economic indicators of the Fleet is enclosed (Table XXI.3).

**REPORT**  
**on economic parameters of Caspian Sea Oil Fleet**

*Table XXI.3 (manat)*

s/s	Data	Unit of measurement	On relevant period of 2012	2013								As compared to the last year	
				December				As from beginning of the year					
				actual	plan	actual	difference	interest	plan	actual	difference	interest	difference
1	Revenue from handing over the goods, carrying out works and services	manat	149702556	13140366	28637208	15496842	2,2 d.	155028295	195216153	40187858	125,9	45513597	130,4
2	Costs	manat	144712175	12221854	54501696	42279842	4,5 d.	145677253	183244505	37567252	125,8	38532330	126,6
3	Other revenue	manat	16054428	7861378	-9925210			17292486	17836103	543617	103,1	1781675	111,1
4	Balance profit	manat	21044809	8779890	-35789698			26643528	29807751	3164223	111,9	8762942	141,6
5	Freight transportation	ton	605169	47295	39862	-7433	84,3	600000	553851	-46149	92,3	-51318	91,5
6	Vessel time	hour	572447	42195	49737	7542	117,9	511344	582744	71400	114,0	10297	101,8
7	Consumption fund	manat	57931055	4951302	4167532	-783770	84,2	59005566	57533126	-1472440	97,5	-397929	99,3



It should be noted that Diving and Salvage-Rescue Department being under the subordination of the Caspian Sea Oil Fleet was transferred into subordination of SOCAR directly as from November 2013 in regard to structural changes.

Timely performance of diving services, purchase, test and application of new subsea facilities were controlled by the specialists of the Company and also, the introduction of the normative documents regulating the diving services was provided. The following works were carried out on diving and subsea technical operations in 2013: Diving service for hydraulic structure water development works related to uninterrupted supply of oil production; repair of subsea trunk line, mining pipes and pipelines among deep water jackets diving survey for fixed offshore platforms of hydraulic structure; troubleshooting of marine pollution sources; scouringout and study of hulls, other underbody bottoms and rudder-propellers screws; organization of salvage and rescue service in offshore facilities; pile reinforcement and study of subsea pipelines, vertical supports and down pipes, electric cables, trunks, communications supports and open wells; underwater study of metal structures, subsea pipelines, vertical supports and down pipes, electric cables, trunks with submersibles (HAS).

Two Mobile Diving Complexes were procured in 2012. One of them was put into service in 2012 and design documents were prepared for commissioning of the other one in 2013 and preparatory works are ongoing for installation of the Complex in derrick barge "General A.Shykhlinski". At the same time, diamond pit rope cordage procured in 2012 was continuously operated in 2013 for performance of cutting operations in compliance with new technology while repairing subsea pipelines.

Expedient actions were taken by Caspian Sea Oil Fleet in order to ensure safe operation of ships and vessels, especially life-saving, urgent elimination of causes of the occurred wrecks, as well as prevention of marine environmental pollution on the basis of requirements arising from Conventions adopted by International Maritime Organization and national standards and norms in view of safe sailing services of the Fleet. "Ship alarm" (including fire fighting and water control), "Man overboard" and "Board" alarm (while leaving the ship) trainings were carried out, the studies were conducted after making appropriate recommendations provided for the purpose of the readiness of the staff of vessels by involving executive employees of the Fleet on fighting in view of the resilience of the ship and extreme situations.

Elimination of deficiencies in test examinations conducted for steersmen and mechanics was closely supported by Caspian Sea Oil Fleet in the presence of specialists of the Head Office actively.

For the purpose of harmonized and stable operation of ships and vessels of the Fleet, provision of minimum crew members prior to sailing of ships and issuance of certificates for steersmen in compliance with requirements of International Convention "STCW -78/95" according to Minimum safe manning Certificate, which issued to the ships and vessels by State Maritime Administration of the Republic of Azerbaijan, are controlled while monitoring follow-up of International Conventions, National Laws and orders adopted and currently applicable in the sphere of shipping. 3 accidents and near misses occurred at the Fleet in 2013 (7 accidents occurred in 2012).

Participation of specialists of the Head Office was provided in the competition held by Human Resources Department of SOCAR in regard to recruitment of floating crew members (steersmen and mechanics) and divers required for the Fleet and essential recommendations were given.

One of the important works carried out towards International Management Standards is the application of ISO series international management standards which operates in the advanced countries of the world in Caspian Sea Oil Fleet. So, ISO 9001:2008 Quality Management System (QMS), ISO 14001:2004 Environmental Management System (EMS), the Integrated Management System (IMS) meeting the requirements of International Management Standards were applied from 2007, OHSAS 18001:2007 Occupational Health and Safety Management System (OHSMS) was applied from 2008 in the Fleet. The works were continued in respect to recertification of International ISO 9001\ISO14001\OHSAS 18001 standards in Caspian Sea Oil Fleet and renewal of structural units in 2013. The regular internal audits were conducted, measures were taken on the faults detected in divisions and structural departments with the participation of the specialists of the Head Office and IMS group of Caspian Sea Oil Fleet.

Sea transport division of SOCAR rendered support to development of repair program, performance of repair mainly in Shipyard of the Fleet and conclusion of necessary contracts for performance of repair by other bidder organizations in the event when it was not possible to be implemented by the Shipyard in view of maintenance and overhaul works required for floating crafts. In the course of repair works regular inspections were conducted by the specialists of the Company and for this reason, proposals were made in the meetings held towards acceleration of repair works.

Proposals and opinions were made in respect to repair and upgrading of running ships. Subsequently, repair works to the extent of 38497247.9 Manat in 2013, including repair works to the extent of 20094713.6 Manat were carried out in the enterprises of SOCAR (repair works to the extent of 18369119.0 Manat at the Shipyard and repair works to the extent of 1725594.6 Manat at repair workshops) and repair works to the extent of 18402534.3 Manat were carried out by outside organizations.

68 ships were repaired in 2013. 39 ships were handed over to the Register in annual capacity on-the-run repair. 9 ships were handed over to the Register under dockyard repair. In 2012 repair works to the extent of 39987971.8 Manat, including repair works to the extent of 20658478.1 Manat were carried out in the enterprises of SOCAR (repair works to the extent of 19013073.0 Manat at the Shipyard and repair works to the extent of 1725594.6 Manat at repair workshops) and repair works to the extent of 19329493.7 Manat were carried out by outside organizations.

There conducted inspections in the facilities and due recommendations were issued hereof, and the specialists of SOCAR participated in investigation of wrecks in order to follow up labor protection and safety rules and to prevent wrecks might occur in the course of diving works, operation of ships and transportation of passengers.

No accident occurred due to production in 2013. One accident occurred in 2012. Execution of ecological actions was continuously controlled in the prevention of environmental pollution in ships and seashore facilities, and specialists of SOCAR rendered assistance to elimination of deficiencies which found as a result of inspections by the specialists.

Caspian Complex Ecological Monitoring Department of Ministry of Ecology and Natural Resources, also Environmental Protection Department (in the presence of officers of the Fleet) conducted raids and inspections on ships and seashore facilities within the framework of state ecological monitoring and control, nevertheless, no any shortages were found and no any fine sanctions were imposed.

It should be noted that as a result of joint activity of SOCAR with alliances and foreign companies, some ships of Caspian Sea Oil Fleet were leased and a range of substantial works were continued in Azerbaijan and other sectors of the Caspian Sea through those ships.

It should be taken into account that Caspian Sea Oil Fleet of SOCAR was transferred into structure of "Azerbaijan Caspian Shipping" Closed Joint Stock Company (Company) newly established according to proper Decree of the President of the Republic of Azerbaijan. In this respect, the implementation of the following measures in 2014 is deemed to be necessary for the purpose of increase of control over timely performance of sea transport services based upon orders of enterprises and divisions of the Company:

- signing of due contracts timely with the Company in regard to demands of enterprises and departments of SOCAR for sea transport services in 2014;
- execution of the production program of enterprises and departments of SOCAR for sea transport services;
- analysis of service costs paid by client organizations in regard to sea transport services;
- preawarding of orders by client organizations in respect to maximum loading of serving ships at quaysides and then shipment of them to offshore facilities, tightening of control over the exploitation of ships, avoidance of stagnations and forwarding of shipment to be sailed on the same direction;
- provision of due labourers for continuous shipment operations based on orders and follow-up of safety regulations;
- agreement with the Company of the prevention of exploitation of ships with expired Register navigation documents and timely replacement of them with other ships;
- follow-up of permanent duty schedule of "Vikhr" type fire extinguishers in offshore facilities and preawarding of orders for usage of fire extinguishers and other ships in the course of submersible works in wells;
- application of new equipment and manufacturing processes in order to upgrade marine services and improve the efficiency;
- performance of due preparatory actions by client organizations in advance in order to suspend running of ships in quaysides and offshore facilities subject to hurricane awareness and weather broadcast;
- assistance by specialists in regard to timely running of diving operations and, procurement, testing and application of new underwater facility;
- performance of actions for installation of Mobile Diving Complex newly purchased which capable to run in 200 m depth in board of derrick barge "General A.Shykhliniski" of "Azerbaijan Caspian Shipping" CJSC R-2098.

***The following works were carried out in commercial transportation of SOCAR in 2013:***

Execution of contracts concluded by SOCAR, also structural units of SOCAR was controlled, draft projects were compiled on cooperation with foreign companies and joint activity, negotiations and correspondences on construction and operation of new ships were conducted in 2013.

The helicopter services on passenger and freight transportation were continued for offshore platforms, Chilov Island and Neft Dashlary based upon the contracts on aviation services

signed between structural units of SOCAR ("Azneft" PU and "Complex Drilling Works" Trust) and SW Helicopter Services LLC in 2008. Mainly helicopters of MI-8, MI-171, EC-155, AW139 and AS332L1 type served to them. The orders were prepared by "Azneft" PU and "Complex Drilling Works" Trust subject to review of daily demand for helicopters and dependant on air condition and availability of adequate helicopters the services were rendered according to such orders.

Totally 3375 flights were carried out, 44821 passengers and 353.0 tons cargo were transported by helicopter carrier in 2013 as follows:

Table XXI.4

Date	Number of booked flights					Number of actual flights					Number of passengers	Weight (ton)
	ES-155	Super Puma	AW-139	MI-171	MI-8	ES-155	Super Puma	AW-139	MI-171	MI-8		
January	36	4	-	206	89	130	52	-	124	59	4368	69.6
February	36	4	-	198	58	96	25	-	147	33	3949	44.9
March	26	15	-	183	49	90	28	-	147	27	3910	34.6
April	25	15	-	162	32	110	19	-	143	13	3521	21.9
May	15	22	-	147	36	49	34	-	146	51	3622	19.6
June	37	7	-	142	31	71	13	-	176	20	3621	28.2
July	37	4	-	161	40	96	21	-	177	40	3903	56.5
August	25	18	-	149	34	59	15	-	145	35	3072	22.1
September	3	7	-	161	40	15	27	-	163	43	3676	26.8
October	2	5	-	159	52	5	35	-	125	92	3971	11.2
November	3	-	-	152	54	10	4	-	132	77	3442	6.6
December	2	-	21	172	42	7	-	26	133	90	3766	11.0
TOTAL	247	101	21	1992	557	738	273	26	1758	580	44821	353.0

- A contract for joint activities between SOCAR and "SEACOR Marine Az" LLC renewed on 06.04.2012 was continued. The contract specifies the basic principles of joint activities of SOCAR and "SEACOR Marine Az" LLC in handling and using 3 fast passenger ships ("Aaron S. McCall", "Seacor Cougar", "Joyce McCall"), which were delivered to the Republic of Azerbaijan for transportation of the personnel of BP Company to offshore facilities and back.
- Building of new ships:
  - As per needs of Caspian Sea Oil Fleet, works within the framework of contract for building a tow boat with 50-ton towing force (with azimuth direction) was signed between SOCAR and "Baku Shipyard" LLC on 31.05.2012 and the ship was handed over to Caspian Sea Oil Fleet on 27.12.2013.
  - The negotiations on building of one subsea construction vessel, one subsea/seabed operations supply vessel, 4 tow boats/supply ships with 170-ton towing force, 3 fast passenger ships and 3 platform supply vessels required for implementation of the Azeri-Chirag-Gunashli and Shah Deniz projects, especially Shah Deniz-2 project, were continued in the reporting period. A number of meetings with joint participation of the specialists of SOCAR, BP, "Baku Shipyard" LLC, Caspian Marine Services Ltd. and Keppel Singmarine companies were held to specify the technical specifications of the mentioned vessels.
- Construction of shipyard which found in 2010 was continued in current year and handed over on 20.09.2013. It was established on 10 May 2011 based upon legislation of Azerbaijan Republic in partnership with SOCAR (65% interests), Azerbaijan Investment Company (25%) and Singapore "Keppel Singmarine Pte Ltd" (Keppel) company (10 %). Production capacity of the state-of-the-art shipyard and

shiprepair facility in the Caspian basin will total to 25000 tons metal structure per annum. The plant will be able to produce 4 tankers at the load-lifting capacity of 15000 tons and 4 towing vessels as well as to repair 80-100 ships of different-purposes every year.

- On the basis of the contract, flights of Falcon 900 EX and Challenger 300 aircrafts of SOCAR managed by Palmali Hava Tashimachiligi Ash were continued and costs related to the flights were controlled in 2013. Timely realization of payments under credit agreement was provided for Falcon 900 EX aircraft, which purchased from Dassault Aviation company in 2010.

It was found out that the Falcon 900 EX aircraft, which is in service for about three years, was often out of order for technical reasons and underwent repairs and the manufacturer (Dassault Aviation) was informed of this. During the negotiations held with the manufacturer on this issue, there reached an agreement on sale of Falcon 900 EX aircraft at a reasonable price and purchase of a new Falcon 7X aircraft meeting up-to-date requirements against suitable payment.

So, a contract for purchase of a new Falcon 7X aircraft was concluded between SOCAR and Dassault Aviation Company on 09.02.2012. Pursuant to the contract, the aircraft was handed over to SOCAR on 18.04.2013.

Moreover, the aircraft was handed over to the Purchaser on 24.04.2013 according to contract concluded on sale of Falcon 900 EX plane.

- The cooperation with Joint Ventures and Alliances established by SOCAR and foreign companies especially on the marine transportation service was continued, the relevant reports on activities of joint ventures and alliances were controlled.

## XXII. SOCIAL ISSUES

SOCAR implements different infrastructure projects not only in Baku, but also in all regions countrywide and continues successfully the construction of education, social and other facilities within the framework of execution of actions specified in the State Programs approved by Mr. Ilham Aliyev President of the Republic of Azerbaijan in order to promote social-economic development of the country and welfare of the citizens more.

Treatment and Diagnostics Centres complying with up-to-date standards were constructed in the different regions of our Republic within the framework of the State Program for social-economic development of regions of Republic of Azerbaijan. Construction-assembly works were fully completed for Haemodialysis and Diagnostics Centre in Tovuz region and the Centre was handed over in 2013.

Overhaul and rehabilitation of YAP building, construction-assembly works for Recreation Centre in Balaken region, accomplishment of State Flag Ground and surrounding areas of Youth House in Siyazan region, construction of new school building in Tapgaragoyunlu village of Goranboy region, capital repair of H. Aliyev Centre in Naftalan city, restoration-rehabilitation of facades and house roofs of multi-storeyed residential buildings, restoration of asphalt-concrete surfaces of streets and blocks, upgrading of lighting system of the city, reconstruction of infrastructure, accomplishment of Martyr's Avenue complex and the surrounding area were completed.



Construction-assembly works for administrative building, laboratory and kern preservation complex belonged to "Azlab" LLC located at Bakikhanov settlement of Sabunchu district were completed and reconstruction of hydrotechnical facilities belonged at military detachment 72 located at Zyxh highway was finalised. Reconstruction works for administrative building in the area of stadium named after I. Gayibov in Bakikhanov settlement are ongoing.

Construction-assembly works for 21-apartment 3-floor residential buildings due to out of order of two residential buildings located at alley 5, City highway in Sabunchu district.

Construction of Baku Talents Education Complex, French lyceum in Nobel avenue of Khatai district, 220-pupil special boarding-school #2 in Shuvelan settlement of Khazar district and Guest House of SOCAR in Buzovna settlement in Baku city are ongoing.

Construction of 3050-person stadium in Sumgayit city consists of one artificial cover and one

natural cover. At the present, construction-assembly works are ongoing at the administrative building.

Construction works on the new administrative building of SOCAR meeting higher standards and on Baku Olympic Stadium, which is one of the large-scale projects, are being continued. Also, rehabilitation-accomplishment works of parks, facades of residential buildings and house roofs were performed in Baku city.

Moreover, new gas pipelines to the extent of 8342.3 km (including 7749.2 km in regions) were installed and gas pipelines to the extent of 1358.8 km (including 664.2 km in regions) were overhauled from the beginning of the year.

At the present, 4504 persons are registered on housing of SOCAR that out of them 448 persons live several regions of the country (Siyazan, Shabran, Imishli, Kurdamir, Salyan, Neftchala and Shirvan city), but 4056 persons live in Baku city.

779 oil-worker families were provided with housing by SOCAR in 2013. Out of them 93 persons were provided with apartments newly constructed by SOCAR as well as flats modified from due alterations and repair works in non-residential premises being at balance of SOCAR. 686 persons, including 641 persons being at registration on housing of SOCAR and 45 persons who completed their education within the framework of Scholarship Program of SOCAR and were employed by SOCAR, were provided with apartments through "Neftchi" housing-construction cooperative. At the same time, 30 flats modified from due alterations and repair works in non-residential premises being at balance of SOCAR in Shirvan city were distributed among the persons being in housing registration within SOCAR in Shirvan city.

Construction of 3-block 232-apartment residential building in Yeni Yasamal housing estate in the intersection of External Round street with Talibli street was completed and handed over by "Neftchi" housing-construction cooperative. Presently, accomplishment works are carried out in 303-apartment building in 35 Arif Ismayilov street in Khatai district and is planned to be handed over in the near future. At the present, construction of 312-apartment building in Lokbatan settlement and 187-apartment building in Sahil settlement of Garadagh district is carried out by "Neftchi" housing-construction cooperative. Besides, preparatory works are ongoing for the purpose of construction of new 144-apartment residential building in Pirallahi settlement and new housing estate for provision of more than 1200 families in Bibiheybat area. At the same time, land plot to the extent of 12.51 ha was allotted in western part of Hovsan settlement of Surakhany district in view of construction of individual houses for the persons being in housing registration within SOCAR that proper documentations are conducted in this respect.

Proper documentation works were carried out on reclassification of the category of the industrial lands to the extent of 31.05 ha into category of residential lands, being in use of SOCAR which are located in the regions in order to provide the persons with housing where they are registered on housing of SOCAR.

Besides, relevant works are ongoing towards provision of the employees with garden plots in centralized manner on SOCAR.

The State Oil Company carries out large-scale actions in solution of social problems of oil workers by focusing on this direction regularly. It is worth to emphasize the works carried out in alignment of activity of social facilities to modern requirements for promotion of social welfare of the oil workers over the past period. According to "Social Development

Program on 2011-2015 for improvement of social welfare of the employees working in the structural units of State Oil Company of Azerbaijan Republic” approved by joint statutory order of SOCAR and Azerbaijan Oil & Gas Industry Workers Trade Union Republican Committee, arrangements on 122 clauses were fulfilled completely and on 74 clauses were fulfilled partially from the overall actions comprised by 494 clauses to be executed and preparatory procedures are ongoing for commencement of other necessary works.

New administrative buildings were constructed for Transportation Special Machinery Unit and Gas Maintenance Areas in Nizami, Zagatala, Siyazan, Shabran, Gusar, Salyan, Terter, Shamakhy and Lenkaran regions, and accomplishment works are ongoing at new administrative building of Yevlakh Gas Maintenance Area in order to create work condition at the level of up-to-date standards for the employees of “Azerigaz” Production Unit. New administrative buildings handed over were supplied with modern equipment and office furnitures. Overhaul and current repair works were carried out at the administrative buildings needed for repair in 13 sites and garden plots were landscaped and accomplishment works were fulfilled. Heating systems were installed at the buildings newly constructed and overhauled and normal working conditions were created for the employees. 9 shower-rooms, 9 cloakrooms, 11 recreation nooks and 7 kiosks were constructed and handed over within the Production Unit in 2013. New modern canteen building for 120 persons was constructed in the yard of “Azerigaz” Production Unit and the canteens handed over at Gas Maintenance Areas in Absheron, Khazar and Garadagh districts were supplied with necessary inventories and equipment. There created recreation nooks in 20 areas in respect to rest of the employees during lunch time, and open type mini-sports grounds in some areas were constructed and outfit.



Administrative building of Gas input and output workshop of “Ethylene-polyethylene” plant of “Azerikimya” Production Unit was overhauled, cloakrooms for men and women at the building, one storage room, shower-rooms and lavatories were fully repaired and put into use of the employees. The gas input and output workshop was supplied with modern equipment and office furnitures. Cafeteria room was constructed inside of the workshop and was supplied with kitchen furnitures, tables and other appliances and put into use of the employees. Capital repair works were completed in cloakrooms for men and women, 36



shower-rooms and lavatories at building T-2 of "Repair-construction" unit. The cloakrooms were supplied with 150 wardrobes.

The dwelling blocks at NIH and NS of deep water jackets 2, 9, 15, 19 of "28 May" OGPD were overhauled and put into use of the employees upon provision with all necessary furnitures and materials (in total, DWJ 8) presently, such works are ongoing at deep water jackets 6, 10 and 11. New dwelling block was reconstructed for the employees (60 persons) who will work at gaslift compressor station constructed in DWJ 4 and supplied with necessary furnitures and equipment and 12 split type air-conditioners were installed accomplishment works are carried out in sanitary units. Cooling-heating system was put into use in DWJ 3, 5 and 8. Household area and new administrative building were put into use for ETIIS and ESS in DWJ 10. Modern split-type conditioners were installed in chief cabins/messing spaces, red corners and canteens of all deep water jackets, and furnitures were set up in chief cabins/messing spaces and red corners of deep water jackets 3, 4, 5, 8, 10, 11 and 14. Living quarters and dwelling rooms were supplied with essential beddings.

Changing and locker areas for the employees working in the deep water jacket were supplied with 600 metal wardrobes. House roofs of the administrative buildings for IXB, QAYTS and IATS located in Chilov island, capital repair works were carried out at IXB and house roof of dormitory building 4 is being replaced. Two water reservoirs at each 1000 m<sup>3</sup> were constructed and put into use for water usage in order to meet the demand of the island residents for water. Gas turbine station was constructed and handed over in the island in order to ensure sustainable electric energy of the residents. Full accomplishment works were carried out in the island and more than 5000 trees were planted. Besides, construction of Sports and recreation complex, tea house, 250-seat meeting hall and new waiting space in quayside is ongoing. Considering the needs of the employees for dormitory areas, administrative building of the former kindergarten was reconstructed and modified into residential area.

Current repair works were carried out in corridors, rooms and facade of dormitory buildings being at the balance of "Neft Dashlary" OGPD. New administrative buildings were constructed in view of workshops for Repair of operation equipment, Auto transport and special machinery, Integrated oil output and delivery and Maintenance of strata pressure and survey and the buildings were supplied with necessary household appliances and put into use. New modern Heating Power Station was constructed and current canteen was repaired and equipped in Neft Dashlary. 22 different camp cars were purchased and equipped duly and put into use of the employees working at the jackets within the year. Overhaul and current repair works were performed at administrative buildings, lavatories and kitchens of OGPDs 1, 2, 4 and 5. Stationary Deep Water Jackets 1841, 1517, 1201, 741, 1887 and 2585 were repaired and supplied with necessary household appliances. As a result of actions taken, the administrative building of the OGPD and dormitory complex 1 were supplied with uninterrupted hot water all day long. Reserve furnace 2 for bakery was installed in bakery workshop. Accomplishment works were carried out in the area and asphalt surface were recovered.

Proper actions were taken in respect to improvement of social-household condition of the employees working at N.Narimanov OGPD, "Absheronneft" OGPD, A.C.Amirov OGPD, H.Z.Tagiyev OGPD and Bibiheybat OGPD and structural units in the subordination of "Azneft" Production Unit.

3000 employees, who work at shifts (rotation) in deep water jackets located in "Gunashli" field, in deep water jacket 1 of "Umid" field as well as in compressor stations of QYHK and CTS located in "Neft Dashlary" field of "28 May" OGPD were supplied with high quality hot meal free of charge in a day.

87 camp cars were purchased and erected and equipped duly for improvement of the living and household conditions of the employees, who work at special deep water jackets, trestles and other ashore production sites. Some sites were overhauled and supplied with the new household appliances. New modern style administrative buildings were constructed in 18 sites and the administrative buildings in 36 sites were overhauled, maintained and working rooms thereof were supplied with state-of-the-art equipment and such works are ongoing in 5 sites for the purpose of improvement of social and household conditions of the employees, who work in production sites. Besides, shower rooms were constructed in 31 sites, the shower rooms in 97 sites were overhauled, cloakrooms in 32 sites were repaired and supplied with new 1216 wardrobes and there created hygienic rooms for women in 2 production sites. Considering the demand of some departments and enterprises, approximately 819 water dispensers were outfit and 5 water carriers at the capacity of 8-10 tons were procured in view of provision with potable water of the employees working in production sites. For the purpose of nutrition of the employees, new canteen buildings were constructed in 7 sites, and existing canteens in 30 sites were overhauled and supplied with state-of-the-art facilities and equipment. 70 buses, including 1 large-capacity, 53 medium-capacity and 16 small-capacity buses were bought for the comfortable transportation to and from workplace of the employees;



"Neftchi" Sport and Health Centre functioning in the structure of Social Development Department of SOCAR gives its contribution to development of our countrywide sports. There are 13 sport facilities at the balance of the Centre that approximate five thousand teenagers and youth as well as more than 1500 oil and gas specialists go in for sports under guidance of 183 professional trainers and instructors on 36 sport types in such sport facilities. Over the past period hundreds of sportsmen participated in more than 300 tournaments, gained high achievements and totally were awarded 1730 medals, including 687 gold,

447 silver and 596 bronze medals by taking part in world and European competitions, well-known international tournaments and competitions in republic, Baku and other levels.

Arrangement of recreation and leisure time of the employees is a part of social activity pursued by SOCAR. So, 2-3 day and several-day recreations of approximate 12000 oil workers and their family members were organised at "Gubec Hotel" recreational centre located at Balaken region, in recreational zones "Geophysic" and "Nabran" located at Nabran settlement and other recreation places located in other regions of the republic over the past period. 945 oil-engineers, who needed medical treatment, were sent to sanatorium-resort treatment centres and treatment of approximate 1200 persons was provided in sanatorium located at Naftalan town.

The provision of material aid to the employees were continued, martyrs' families and disabled war veterans were in focus according to the Regulation on providing the employees of the State Oil Company of Azerbaijan Republic with the material aid by the Company over the past period.

The provision of the material aid were continued for 27522 refugees settled in "Dordyol 1, 2", "Tazakand" villages and Dordyol-Mamyrlly area in Aghdam region, in Tartar region and at Ahmadalylyar, Mirzanaghyly and Gazakhlyar villages in Fuzuli region and to 1700 refugees and martyrs' families settled in Sumgayit city which were put into custody of SOCAR with the appropriate Decree of the President of Republic of Azerbaijan.

Families of internally displaced persons temporarily settled in buildings and social facilities at the balance of enterprises and organizations of SOCAR are under regular care and out of them 2500 persons were employed by departments and enterprises of the Company.

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