GC VOKENERGOMASH



11 Pamirskaya Street, Nizhniy Novgorod, 603032, Russia tel./fax. +7 831 220-29-02, 220-29-03 E-mail: <u>info@vokem.ru</u>

Reference List 2017

Put into operation:

- production to obtain MTBE and TAME at «TAIF-NK", Republic of Tatarstan. Development of design documentation and supply of equipment;
- unit for production of diesel EURO-4, "TAIF-NK, Tatarstan. Design, equipment, supervision, start-up;
- Equipment unit for reception, storage and evaporation of liquid chlorine at LLC «Hrizolit" in Dzerzhinsk.

Projects under construction, with the endorsement of the official expert examination:

- Production of dry fodder yeast based on distillery stillage processing at JSC "Spirtzavod" Chugunovsky." Now working project;
- storage tanks of liquefied hydrocarbon gases by JSC "TANECO", Republic of Tatarstan. Documentation;
- ammonia refrigerator for Nizhny Novgorod brewery "Volga" on the basis of delivery of the equipment by the German company «Huppman». Now working project;
- production of disinfectant substances "ND-1", "ND-2" and disinfectants based on them at JSC NPO "Novodez" Noginsk, Moscow region. The project documentation within the range of RF Government Decree № 87 16.02.2008g.;
- development of design documentation for the electricity supply of rotational molding working room for Company "ANION", Moscow;
- Design work for "the creation of automated systems of fuel accounting" for the OSP Kirov TEC-4 to JSC "TGC-5", Cheboksary;
- working documentation sections in architecture, in reinforced concrete, metal constructions for building 107 on the case for (PET) capacity of 660 tons / day in the October district of Kaliningrad for JSC "Uhde" Dzerzhinsk;
- Working documentation development for object 1726 sections «Processes automatization of ventillation and cooling», "Automating the equipment unit of foam firefighting in pump room" for the FSUE "SoyuzpromNIIproekt", Moscow;

- column technical projects for the JSC "National Gas Company" and LLC "Polymer Plant Kirov-Chepetsk Chemical Plant" for JSC "OGC", Moscow;
- Power and lighting eqipment project documentation for water treatment plants in Smolino for LLC «Agroservice", Dzerzhinsk;
- Design development of equipment unit for reception, storage and evaporation of liquid chlorine at LLC «Hrizolit" in Dzerzhinsk.
- Detailed design of metal outdoor constructions and flyover constructions for OJSC "Uhde" Dzerzhinsk;
- detailed documentation of pumping stations (Title 057/3, 057/4, 062, 063) complex of refineries and petrochemical plants of "TANECO" for JSC "VNIPIneft", Moscow.
- Design documentation:
- Technical projects and work design documentation for manufacturing complex to obtain chloroform and methylene chloride, "Polymer Plant Kirov-Chepetsk Chemical Plant" for JSC "VNIPIneft", Moscow;
- Developing of cutting, construction and study of transport in the assembled form topping column (KA-101) φ6000/3400mm, H 32500mm, weight 105000kg material 08H17N13M3T, vacuum column (KA-110) φ4800/8500/6600mm, H 42500mm, weight 324800kg material 16GS-17 + 08H17N15M3T, atmospheric tower (KA-102) φ6000/4400mm, H 54700mm, weight 266200kg material 16GS-17 + 08H17N15M3T; stripping (KA-104, KA-105, KA-106) f2000mm, H 36300mm, weight 45040kg, material 16GS-17 + 08H17N15M3T for JSC "TANECO" Tatarstan, Nizhnekamsk on the instructions of "VNIPIneft", Moscow;
- Development of design documentation for heat exchangers HELIX for Khabarovsk LLC Oil Refinery "Generatsiya", Ekaterinburg;
- Project development, work design documentation, delivery vehicles for dissolving chlorine in nephras for JSC "Nizhnekamskneftekhim", Nizhnekamsk.
- Design documentation:
- Technical projects and work design documentation for manufacturing complex to obtain chloroform and methylene chloride, "Polymer Plant Kirov-Chepetsk Chemical Plant" for JSC "VNIPIneft", Moscow;
- Developing of cutting, construction and study of transport in the assembled form topping column (KA-101) φ6000/3400mm, H 32500mm, weight 105000kg material 08H17N13M3T, vacuum column (KA-110) φ4800/8500/6600mm, H 42500mm, weight 324800kg material 16GS-17 + 08H17N15M3T, atmospheric tower (KA-102) φ6000/4400mm, H 54700mm, weight 266200kg material 16GS-17 + 08H17N15M3T;

stripping (KA-104, KA-105, KA-106) - f2000mm, H - 36300mm, weight 45040kg, material 16GS-17 + 08H17N15M3T for JSC "TANECO" Tatarstan, Nizhnekamsk on the instructions of "VNIPIneft", Moscow;

- Development of design documentation for heat exchangers HELIX for Khabarovsk LLC Oil Refinery "Generatsiya", Ekaterinburg;
- Project development, work design documentation, delivery vehicles for dissolving chlorine in nephras for JSC "Nizhnekamskneftekhim", Nizhnekamsk.

Design and work documentation:

- Design documentation for production of fluids (coolant) for LLC «Evrooyl Processing", Kazan;
- Reconstruction of the reactor R-101 for LLC "TAIF-NK", Republic of Tatarstan, Nizhnekamsk;
- Performing the text part of design documentation in sections 2,3,4 of FSUE "GosNII" Crystal ", Dzerzhinsk;
- Development of design documentation and delivery of equipment for the unit issuing triethanolamine of 99% production of ethanolamines 1st ethanolamines workshop working under vacuum up to 1mm of mercury column for «Syntez OKA", Dzerzhinsk;
- Development of design documentation on column plates according to OST 26-02-1401-76 for «NHZO", Novosibirsk;
- Development of design documentation for PTFE-lined apparatus for JSC "Nizhnekamskneftekhim" Nizhnekamsk;
- Supply of slam pipes for LLC «Syntez OKA", Dzerzhinsk;
- Supply of Evaporator 600IK-2-1,0-1,6-M8 * / 25G2-U-I for LLC «Syntez OKA", Dzerzhinsk;
- Development of design estimate documentation for the replacement of the pump N-401 / 1.2 with reconnection of heat exchanger T-402 for JSC "TAIF-NK", Nizhnekamsk;
- All set of works for the replacement of the pump N-401 / 1.2 with reconnection of heat exchanger T-402 for JSC "TAIF-NK", Nizhnekamsk;
- Complex repairs of straightflow reactor PR-101 for LLC "TAIF-NK", Nizhnekamsk;
- Working documentation of interplant communication (ICC) in the quarter № 5 (Title 031, 068/3), working documentation (building part) to interplant communication in the quarter № 5 (Title 0.29, 030, 0.30 / 1, 032, 038, 039, 052, 060, 062, 072, 072/1, 124/7, 124/5) for the complex of refineries and petrochemical plants of JSC "Taneko";

- Detailed documentation (building part) Remote Base SUG, storage of liquefied gases (propylene) (Title 049/2A, B, C, DE), flyovers MCK (Title 070) block number 22 for the complex of refineries and petrochemical plants of JSC "Taneko ";
- Work on updating the electrical and construction part by Title. 068/3 and 031 in relation to the replacement of motorized valve for complex of refineries and petrochemical plants of JSC "Taneko";
- Development of design documentation for the equipment for the destruction of chemical weapons in CJSC "TOiS" Dzerzhinsk;
- Inspection acceptance control of manufacturing quality equipment for OJSC "Lukoil-Nizhegorodnefteorgsintez" Kstovo;
- Detailed design for the installation of heating up the feed gas to the gas chemical complex Novourengoysky for JSC "VNIPIgazdobycha", Saratov;
- Development of project design and work documents on the innovative air coolers for OJSC "Gazprom", Moscow;
- Working documentation development, observing the general explanatory note on technical modernization of non-explosive components of industrial production of emulsion explosives at LLC "AWT-Ural" for OJSC "Institute Bang", Moscow;
- Project development petrol and gas stations to "TAIF-NK" Nizhnekamsk;
- Development of design documentation for the destruction of chemical weapons facilities to FSUE "SoyuzpromNIIproekt", Moscow;
- Development of design estimates for construction of the refinery with a capacity 1.00 million tons of oil refining for LLC "Yenisei" Usinsk;
- Preparation of "Terms of Reference" for the design and development of working documents for technical upgrading heating and ventilation systems in the building № 3 of OJSC "Hydroagregat" Pavlovo.
- Development of design documentation to the site of a solution of the dye in the machine M-3 (M-3a), coolants in devices M-5, M-6, installation of additional tanks E-2/2, E-2/3 with pump H 2/2 and installation of the pump H-8 with connecting it to the capacity of the E-8 for OJSC "Petrokam" Nizhnekamsk;
- Detailed design for the electrical part on the administrative and amenity building at Company "NGHK" for JSC "VNIPIneft", Moscow;
- Detailed design of: MCK overpasses in 1, 2, 3 blocks in the construction part, flyover MCK in block 5 in the assembly and construction parts, satellite heating thermal insulation lines on overpasses tit.0903 in blocks № 8,9,12,13, 17,18,19, insulation of

pipes on the flyover "North - South"; overpass MCK with bound to tit. 069/1, 3,4,6,7,9 in the construction part of JSC "Taneko" for JSC "VNIPIneft", Moscow;

- Technical projects of non-standard equipment for the project "Installation of diesel hydrotreating" at JSC "Angarsk petrochemical company" for JSC "VNP", Moscow;
- Development of design and working documentation for complex processing of gas condensate and SUG storage at JSC "Yakutgazprom", Yakutsk;
- Detailed design to increase pump room tit.068 / 3 of "TANECO" for JSC "VNIPIneft", Moscow;
- Detailed design for binding tit.061 / 1 to the MCK and cable facilities in 5 quarter of "TANECO" for JSC "VNIPIneft", Moscow;
- Detailed design to replace the shutoff valve on the block boundaries first category on the fast response time of no more than 12 seconds workroom № 02 for the OJSC "TAIF-NK", Nizhnekamsk;
- Power supply system of electrical heating in MCK blocks № 5, 8, 9, 12, 13 at JSC "TANEKO» for LLC «Energospetsproekt" Kazan;
- Development of working documentation of the automatic lock on the oil tanks P-3 and P-4 plant № 08 refineries to OJSC "TAIF-NK", Nizhnekamsk;
- Development of working documentation for providing efficiency compressor system poz.VK-802 Shop number 03 BZ automatically and dew-point instrument air - 70 C to OJSC "TAIF-NK", Nizhnekamsk.
- Development of working documentation for implementation of Distribution Management System safe mechanism locks enabled and switched on all the blocking positions KGSD for safe routine maintenance and start-up equipment at OJSC "TAIF-NK", Nizhnekamsk;
- Construction and installation works to expand the node of commercial gasoline filling in the working room number 07 Factory petrol to OJSC "TAIF-NK", Nizhnekamsk;
- Detailed design for site filtering jet fuel of CR "Tuapse" for JSC "Samaraneftehimproekt", Samara;
- Development of working documentation for site filtering jet fuel at OJSC RN "Tuapse" for JSC "Samaraneftehimproekt", Samara;
- Development of working documentation for the reconstruction of the discharge-loading rack number 2 TEC-1 at OJSC "TAIF-NK", Nizhnekamsk;
- Detailed design of heating natural gas lines at OJSC "TANECO" for JSC "VNIPIneft", Moscow

- Detailed design to change the procedure for calculating the flow and amount of liquids and gases in knots custody refinery, due to the launch of the new Standard for 8.586.5-2005 for OJSC"TAIF-NK", Nizhnekamsk;
- Detailed design for the replacement pump motors H-101 / 1.2 in the workshop number 01 on OJSC "TAIF-NK", Nizhnekamsk
- Detailed design for permanent installation amine purification system at OJSC "TAIF-NK", Nizhnekamsk;
- Technical documentation to bring performance of catalytic cracking up to 1.1 million tons of raw materials per year to "TAIF-NK", Nizhnekamsk;
- Detailed design to replace the supply pumps for regenerated MDEA item.401 / 1.2 at OJSC "TAIF-NK", Nizhnekamsk;
- Detailed design for the expansion of the site filling diesel in road and rail tank cars in the workshop number 07 Factory petrol to OJCS "TAIF-NK", Nizhnekamsk.