**ABSTRACT OF SECONDARY PROFESSIONAL EDUCATIONAL PROGRAM**
**15.02.01** **INSTALLATION AND TECHNICAL MAINTENANCE OF INDUSTRIAL EQUIPMENT (according to professional fields)**

**1. Name of educational program**Training direction – **15.02.01 Installation and technical maintenance of industrial equipment (according to professional fields)**
Qualification: **technician**

**2. Brief description of the program**

**Objective:** to teach students to subjects of Mathematics, Natural Science, subjects of professional cycle as well as of professional modules, to receive secondary professional education that enables graduates to work successfully with lifting equipment while installing and repairing industrial equipment, to make quality inspection of machinery using control and measuring devices, to fulfill start-up works and test the equipment after repairing and installation, to select and apply different adjustment methods depending on the external factors, to prepare documentation for installation and repairing of industrial equipment, to eliminate drawbacks, to choose lubricants when servicing the equipment, to prepare documentation for service of industrial equipment, to plan and organize work in workshop subdivisions, to evaluate the economic efficiency of industrial equipment, to organize and carry out installation and repair of industrial equipment on the basis of modern methods.

 **Duration of training**: 3 years 10 months based on General basic education (full-time).

**3. The scope and object characteristics of graduates’ professional activity**

**Graduates’ professional activity area:**− organization of work concerning installation, testing, operation, maintenance and repairing of industrial equipment; organization of work in workshop subdivisions.

 **Graduates’ professional activity objects:**
− industrial equipment;
− materials, tools, technological equipment;
− processes of repairing, fabrication, restoration and assembling of units;

− design and technological documentation;
− teamwork.

**Graduates’ types of activity:**− the organization and carrying out installation and repairing of industrial equipment;
− the organization of work for maintenance of the industrial equipment;
− participation in work of workshop subdivisions.

**4. Basic organization**

Training is realized for the Federal state unitary enterprise "Instrument-making plant" in the framework of the program "personnel training" as well as for other enterprises in Trekhgorny and highland area of Chelyabinsk region.

**5. Brief description of the curriculum**The curriculum is developed in accordance with the Federal state educational standard 3+ Secondary professional education for the training direction "Installation and technical maintenance of industrial equipment (according to professional fields)" (qualification - technician). Special attention is paid to the study of the following subjects and professional modules: technological equipment, materials, technical mechanics, tooling, Metrology, standardization and certification, industry technology, forming processes and tools, organization and carrying out installation and repairing of industrial equipment, organization and execution of works for maintenance of the industrial equipment.

**6. Practice**
− practical trainings for students are aimed on forming primary skills and are held for 5 weeks during the 2nd semester in the laboratories of the TTI NRNU MEPhI.

− industrial trainings are held for 8 weeks during the 6th semester, for 5 weeks during the 7th semester , for 4 weeks during the 8th semester at the FSUE "Instrument-making plant" as well as in other enterprises in Trekhgorny and are aimed on obtaining and mastering professional skills in real industrial conditions.

− undergraduate training is held for 4 weeks during the 8th semester at the FSUE "Instrument-making plant" and is aimed on studying, gathering and analyzing available documents and information concerning the subject of a graduate’s final qualification work.