BRIEF SYLLABUS OF THE MAJOR PROFESSIONAL EDUCATION PROGRAMME
FOR THE SUBJECT AREA

07.04.01 ARCHITECTURE

Course: Architecture of Urban Industrial Infrastructure Objects
Degree awarded: Master
Tuition format: full-time
Standard course duration: 2 years.

1. Education Programme Objectives (Mission)

The major professional education programme aims to develop in students personal qualities and universal, general professional competences in accordance with the requirements of the federal higher education standard for the subject area 07.04.01 Architecture, and professional competences for a successful professional career allowing for the professional standard "Architect", employer needs and labour market requirements.

The education programme is delivered in the official language of the Russian Federation.

2. Характеристика профессиональной деятельности выпускников
2. Characteristics of Graduates' Professional Activities

2.1. General description of graduates' professional activities:

The areas of professional activity and spheres of professional activity within which graduates who have completed the master degree programme can practice professionally:

10 Architecture, design, geodesy, topography and decoration (in the spheres: architectural design; research in the area of architecture; theory and history of architecture; creativity concepts; expert assessment activities; architectural critique; social communication.)

The objects of graduates' professional activity after completing the master degree programme are artificial physical spatial environment for individuals and society with its components (settlements, urban environment, buildings, structures, and complexes with life support and safety systems and landscaping).

The graduates' professional activity may also be oriented towards the areas of knowledge: theory and history of architecture.

– ***creativity*** – development and defence of research-based architectural conceptual designs;
– ***design*** – preparation and defence of the architectural part of the working (and detailed) documentation using innovative ideas based scientific research;
– ***research*** – applied and fundamental research;
– ***social communication*** – preparation of publications on architectural projects and design activity contributing its popularization.

2.1. List of professional standards linked to the federal higher education standard (FGOS VO)

The professional standard 10 008 «Architect» approved by the order of the Ministry of Labour and Social Protection of the Russian Federation of 04 August 2017 № 616н (registered by the Ministry of Justice of the Russian Federation on 29 August 2017 under № 48000).

3. Expected outcomes of the education programme

Completion of the education programme provides the graduate with the following competences established by the federal higher education standard:

1) universal competences (UC):

Category (group) of universal competences	*Code and description of universal competence*
Systemic and critical thinking	UC-1. Ability to perform critical analysis of problem situations on the basis of systems approach and develop action strategies
Development and realisation of projects	UC-2. Ability to manage a project at all stages of its life cycle
Team work and leadership	UC-3. Ability to organise and manage team work developing team strategies to achieve objectives
Communication	UC-4. Ability to apply modern communication technologies, including in foreign language(s), for academic and professional interaction
Intercultural interaction	UC-5. Ability to analyse and allow for cultural diversity in the course of intercultural interaction
Self-discipline and self-development (including health)	UC-6. Ability to determine and implement priorities in one's activity and methods to improve it on the basis of self-assessment

2) general professional competences (GPC):

Category (group) of general professional competences	*Code and description of general professional competences*
Art and graphics	GPC-1. Ability to make an aesthetic assessment of the living environment on the basis of a due level of art culture and well-developed spatial thinking
	GPC-2. Ability to present and defend independently design decisions in regulatory agencies with the use of latest technologies
Research and design	GPC-3. Ability to implement all phases of complex analysis and generalize its results with the use of scientific research methods
	GPC-4. Ability to create conceptual innovative solutions, find alternative options and choose the optimal design solution on the basis of scientific research
General engineering	GPC-5. Ability to organize design and research processes, coordinate the activities of related professions for creating a sustainable living environment
	GPC-6. Ability to apply relevant techniques for determining the technical parameters of projects being design, including with the use of specialized applied software packages

3) Completion of the education programme also ensures the development in graduates of **professional competences** established by the University independently based on the professional standard (PS) "Architect":

PP objective	*Object or field of knowledge*	*Code and description of professional competence*	*Reference (PS, analysis of experiences)*
Type of task in professional activity: ***creativity***			
Development of research-based conceptual architectural designs	The objects of graduates' professional activity after completing the master degree programme are artificial physical spatial environment for individuals and society with its components (settlements, urban environment, buildings, and structures, and complexes with life support and safety	PC-1. Ability to participate in the development and defence of conceptual architectural restoration projects	Professional standard 10.008

	systems and landscaping). The graduates' professional activity may also be oriented towards the areas of knowledge: theory and history of architecture.		
Type of task in professional activity: ***design***			
Preparation and defence of the architectural part of the working (and detailed) documentation using innovative ideas based scientific research;	The objects of graduates' professional activity after completing the master degree programme are artificial physical spatial environment for individuals and society with its components (settlements, urban environment, buildings, and structures, and complexes with life support and safety systems and landscaping). The graduates' professional activity may also be oriented towards the areas of knowledge: theory and history of architecture.	PC-2. Ability to participate in the preparation and defence of the architectural part in the design documentation, including with the use of innovative methods and technologies of architectural design	Professional standard 10.008
Type of task in professional activity: ***research***			
Applied and fundamental scientific research	The graduates' professional activity may be oriented towards the areas of knowledge: theory and history of architecture.	PC-3. Ability to conduct complex applied and fundamental research	Analysis of experiences
Type of task in professional activity: ***social communication***			
Preparation of publications on architectural projects and design activity contributing its popularization	The objects of graduates' professional activity after completing the master degree programme are artificial physical spatial environment for individuals and society with its components (settlements, urban environment, buildings, and structures, and complexes with life support and safety systems and landscaping). The graduates' professional activity may also be oriented towards the areas of knowledge: theory and history of architecture.	PC-4. Ability to participate in the preparation and presentation of designs and research results to academic and professional communities and customers	Analysis of experiences

4. Education programme delivery conditions

Physical resources

The University has:

- essential physical resources including specially equipped classrooms and lecture halls: computer classes, language laboratories, lecture halls equipped with teaching multimedia, etc.,
- a range of licensed software and freeware, including domestic products;
- electronic learning and information environment;
- online eLearning system https://Moodle.usaaa.ru/

The delivery of the education programme using exclusively online and distant learning technologies is not allowed.

Human resources

The educational program is taught by pedagogical staff who have an education background and/or academic degree corresponding to the subject area of the discipline taught and engage systematically in scientific research and (or) teaching methodology research activities. A considerable part of the teaching staff participating in the delivery of the education programme are members of creative associations such as Unions of Designers, Artists, or Architects.

Compliance with quality assurance requirements applicable to the education programme activities and teaching

The University's quality assurance system ensures a sufficient quality of education and training producing graduates equipped with required competences and meeting the requirements of educational authorities, employers, students, faculty, and international standards.

The quality of education and training delivered within the educational programme is verified by internal and external auditing of it. External auditing of education quality is performed within the framework of the state accreditation procedure for the purpose of verifying that the educational programme meets the requirements of the federal higher education standard with the participation of students and trainees in independent quality evaluation. When conducting an internal quality audit of the education programme, the University engages employers and (or) their associations, and other legal entities and (or) private individuals including out of the University's teaching staff.