Peculiarities of the ontology formation of the subject field and professional environment in the higher vocational education system

V.U. Artemov National Academy of Security Service of Ukraine

The education system is into the field of ontological conceptualization. The ontological conceptualization in contemporary educational research methodology is designed to reveal the essence of the doctrine of life and human activity in the specific conditions of educational space.

The article aims is to determine the place and role of ontologies in the system of higher vocational education, elaborate conceptual apparatus and method ontology formation of the subject field and professional environment in the higher vocational education system.

In the most general philosophical definition of ontology is doctrine about life, how world is equipped, which is a structure in which the nature of the interaction between the elements of the world. Basic concepts of ontology is being, forms of being (material, ideal), space, time. Ontology in the classical sense is an attempt to describe the most common things.

Ontology is used in pedagogy in its two ways: in the form of classical and post-classical ontology and ontology in the form of computer engineering knowledge. The first provides a general understanding of the semantics of objects of education and their relations in a particular section of knowledge. The second addition allows to formalize the process of thesauruses forming, knowledge maps, dictionaries and learning courses.

The task of forming ontology methodology for research of the subject field and professional environment are:

- define a set of competencies required for occupations characterized by specific requirements for duty and proper professional behavior;

- define ethical and professional standards for these professions;
- create the conditions for determining the main directions and principles of educational work in higher education that prepares specialists for professionals, characterized by specific requirements in relation to duty and proper professional behavior.

Creation of ontology tree is the most effective way of reflection of substance and content of competency training and professional environments, that differ by specific requirements concerning professional duty and proper behavior. It should take a sequence of procedures:

- determination of the ontology tree;
- definition of ontology concepts of upper level;
- class definitions for each ontology;
- formation of glossaries for each ontology;
- distribution of concepts according to classes and levels;
- determination of relationships between concepts;
- editing ontologies in order to achieve consistency between the profession requirements and plans of educational work.

Determining the structure of the ontology tree in this case is based on the submissions of the nature and content of the competency approach to the educational process in high school.