

"Hardware and software of computers and networks".

(name of the course)

OUTLINE

TO THE SYLLABUS OF THE INSTITUTION OF HIGHER EDUCATION

Specialty 1-53 01 02 Automated Systems of Information Processing

	Form of higher education		
	Full-time (full-time)	Correspondence	Correspondence Part-time
Course	3,4	4	3
Semester	6,7	7,8	6
Lectures, hours	96	14	8
Laboratory hours	80	16	8
In-class examination (semester, hours)		4 (7,8sem.)	2 (6 sem.)
Exam, sem.	3,4	7,8	6
Study hours for the discipline	176	34	18
Independent work, hours	238	380	396
Total hours for the academic discipline/credit units	414/11,5		

1. Summary of the content of the study discipline

Training of professionals in the field of hardware and software of electronic computers (ECM) and modern network technologies.

2. Course objectives

As a result of the study of the discipline, the student should

know:

- basic standards in the field of information and communication systems and technologies;
- basic principles of construction, functioning and programming of microprocessors and microcontrollers;
- hardware and software of computer networking technologies;
- Methods of protection against errors, multi-level architecture of open systems, implemented in its protocols and interfaces;
- basics of Internet-technologies.

be able to:

- use standards and protocols in the field of computer networking;
 - develop networking technologies;
 - develop and operate hardware and software systems and computer networks;
 - install, test, test and use the hardware and software of computers and networks;
- have practical skills of working in modern network operating systems.

possess:

- skills in developing computer networks of various topologies;
- basic methods of setting up and configuring different network devices;
- skills of working with different operating systems and their administration;
- skills of configuring local networks, implementation of network protocols using software tools;
- methods of monitoring network nodes and telecommunications equipment;

Methods of ensuring the necessary level of computer network security

3. Competencies to be formed

AK-1, AK-3, AK-4, AK-5, AK-7, AK-11, SK-6, PK-1, PK-4, PK-6, PK-8, PK-9, PK-10.

4. Requirements and forms of current and intermediate attestation.

ZLR, TA, PCU, exam.