

CRYPTOLOGY

Type of discipline	Elective
Level of higher education	First (bachelor's)
Language of instruction	English
Number of the established ECTS credits	8,0
Forms of study for which the discipline is taught	Full-time

Learning outcomes. A student who has successfully completed the discipline must: understand and skillfully use the terms and basic concepts of cryptology; analyze the differences between cryptosystems; understand the principles of building different cryptosystems.

The content of the discipline. Basic concepts of cryptology. Cryptography. Classification of cryptosystems. Symmetric and asymmetric cryptosystems, principles of construction. Cryptosystems with a secret key. Public key cryptosystems. Cryptographic protocols.

Planned educational activities: the number of classroom hours - not less than 1/3 of the total number of hours planned for the study of the discipline.

Forms (methods) of teaching: lectures (using methods of problem-based learning and visualization); laboratory and practical classes (using trainings, master classes, workshops), independent work (individual tasks).

Forms of assessment of learning outcomes: oral examination, defense of laboratory and practical work, test control.

Type of semester control: pass\fail test.

Training resources:

1. Modular learning environment MOODLE. Access to the resource: <https://msn.khnu.km.ua>.
2. Electronic library of the university. Access to the resource: http://lib.khnu.km.ua/asp/php_f/p1age_lib.php

Teacher: Candidate of Technical Sciences, Associate Professor Kapustian M. V.