Course Syllabus
Course from study programme for the cycle: 2022/2023

I. General Information

Course name	Network technologies of data protection
Programme	Informatics
Level of studies (BA, BSc, MA, MSc, long-cycle MA)	BA
Form of studies (full-time, part-time)	Full-time
Discipline	Informatics
Language of instruction	English

Course coordinator	Dr Viktor Melnyk, prof. KUL

Type of class *(use only the types mentioned below)*	Number of teaching hours	Semester	ECTS Points
lecture			2+2
tutorial			
classes			
laboratory classes			
workshops			
seminar	30+30	5,6	
introductory seminar			
foreign language classes			
practical placement			
field work			
diploma laboratory			
translation classes			
study visit			

Course pre-requisites	Knowledge of core and profile oriented subjects form the curriculum Research and analysis skills

II. Course Objectives

Writing BA thesis
Introduction to the principles of writing a bachelor's thesis
Introduction to methods and ways of acquiring and presenting results

III. Course learning outcomes with reference to programme learning outcomes

Symbol	Description of course learning outcome	Reference to programme learning outcome
KNOWLEDGE		
W_01	The student is able to independently identify problems of the topic discussed in the Bachelor's thesis	K_W08
W_02	The student is able to characterize the state of knowledge in the field of a developed topic and use available sources of information	K_W08
W_03	The student is able to determine the objectives and apply research methods, independently formulate conclusions and original solutions regarding advanced problems in computer science	K_W08
W_04	The student can discuss the principles of protecting intellectual property intellectual property and how to cite legally literature and scientific papers in the bachelor's thesis	K_W08
SKILLS		
U_01	The student is able to independently verify the most important information from available scientific data and assess their applicability	K_U02, K_U17, K_U18, K_U23, K_U29, K_U30
U_02	The student is able to plan subsequent stages of the work, choose the methods, use the corresponding research material	K_U29, K_U17, K_U18, K_U23, K_U29, K_U30
U_03	The student can independently acquire necessary knowledge and skills	K_U02, K_U18, K_U23
SOCIAL COMPETENCIES		
K_01	The student is able to communicate within the scope of the learnt material in a professional environment, is aware of problems related to practicing the profession	K_K01, K_K05
K_02	The student has the need for lifelong learning and the ability to motivate others to broaden their qualifications	K_K01, K_K05
K_03	The student is able to determine priorities for the realization of his/her tasks, be independent, self-reliant and properly organize their work	K_K01, K_K05
K_04	The student is able to make a constructive self-assessment, criticism and reflection on the social and ethical aspects of his own work	K_K01, K_K03

IV. Course Content

The topics of the seminar concern issues related to data protection in computer systems, computer and telecommunications networks, cyber-physical systems and IoT and cryptographic algorithms.

1.Discussing the capabilities of available editors and software used to preparing the thesis, discussing the principles of writing and preparing the thesis and using sources, the place of the bachelor's thesis in the educational process and professional development, formulating and clarification of thesis topics.

2.Discussing the principles of intellectual property protection and how to utilize information; analysis of language and terminology correctness in the technical sciences. 3.Analysing scientific works layouts, methods used, abstracts, summaries, abstracts and papers. 4.Revising subsequent parts of the emerging thesis, discussing the correctness of the work and correcting errors through group analysis and individual discussions. 5.Critical analysis and interpretation of the results obtained, preparation of papers as well as visual and oral presentations of available sources of information.

V. Didactic methods used and forms of assessment of learning outcomes

Symbol	Didactic methods *(choose from the list)*	Forms of assessment *(choose from the list)*	Documentation type *(choose from the list)*
KNOWLEDGE			
W_01	Guided research (seminar paper) Tutoring	Paper	Evaluated written paper
W_02	Guided research (seminar paper) Tutoring	Paper	Evaluated written paper
W_03	Guided research (seminar paper) Tutoring	Paper	Evaluated written paper
W_04	Guided research (seminar paper) Tutoring	Paper	Evaluated written paper
SKILLS			
U_01	Guided research (seminar paper) Tutoring	Paper	Evaluated written paper
U_02	Guided research (seminar paper) Tutoring	Paper	Evaluated written paper
U_03	Guided research (seminar paper) Tutoring	Paper	Evaluated written paper
SOCIAL COMPETENCIES			
K_01	Discussion Tutoring	Paper	Evaluated written paper
K_02	Discussion Tutoring	Paper	Evaluated written paper
K_03	Discussion Tutoring	Paper	Evaluated written paper
K_04	Discussion Tutoring	Paper	Evaluated written paper

VI. Grading criteria, weighting factors

For credit in the first semester:

Understanding the subject matter.

Making a selection of the subject literature.

Determining the objectives of the paper and the programming environment.
Writing at least one chapter of the thesis.
Presenting a proposal for an application related to the thesis topic.
Presenting the subject matter of the bachelor's thesis

For credit in the second semester:
Completing the related literature sources.
Presenting the subject matter of the bachelor's thesis
Conducting tests, verification of results.
Writing the thesis with consideration of the principles of intellectual property protection and correct citation.
Preparing a presentation for the defense of the bachelor's thesis.

VII. Student workload

Form of activity	Number of hours
Number of contact hours (with the teacher)	***60 (30 V semester, 30 VI semester)***
Number of hours of individual student work	***60 (30 V semester, 30 VI semester)***

VIII. Literature

Basic literature
Literature selected for students' workshops and the needs of the topic of work
Additional literature
1. Pułło A., Prace magisterski i licencjackie: wskazówki dla studentów. Warszawa: Lexis Nexis, 2003. 2. Weiner J., Technika pisania i prezentowania przyrodniczych prac naukowych. Przewodnik praktyczny. Warszawa: PWN, 2008