RELATIONAL DATABASES AND SQL
(course title)

COURSE SYLLABUS ABSTRACT
of higher education institution
speciality

6-05-0611-04-1 – Electronic economy
(speciality code and name)

	STUDY MODE	
	full-time	part-time
Year	2	2
Semester	4	4
Lectures, hours	16	4
Laboratory classes, hours	34	8
Pass, semester	4	4
Contact hours	50	12
Independent study, hours	58	96
Total course duration in hours / credit units	108/3	108/3

1. Course outline

The purpose of the discipline "Relational databases and SQL" is to form professional competencies for working with modern technologies for creating and operating relational databases (DB) as part of automated information processing systems implemented in various fields of science, technology and economics.

2. Course learning outcomes

Upon completion of the course, students will be expected to

know:

1) the basic concepts of relational databases, the basics of building and functioning of relational databases, technologies for organizing relational databases;

2) SQL language;

3) data protection methods;

4) techniques for working in distributed and multi-user relational databases;

be able to:

1) to build an information model of the subject area;

2) create a database corresponding to the model in the DBMS used;

3) organize the input of information into the database and the output of reports;

4) formulate database queries in SQL language;

5) organize work in a multi-user relational database;

possess:

own:

1) methods, tools and technologies for the development of information models and their software implementation in the selected DBMS;

2) theory and standards of data description and manipulation languages, theoretical and mathematical foundations for building the selected data model;

3) technologies and techniques for software implementation of relational databases, methods and language tools for data manipulation, maintaining integrity, consistency and information protection;

4) the technology of organizing distributed databases, methods and means of their implementation and use in solving professional problems.

3. Competencies

Apply SQL query language, relational database construction methods.

4. The form of summative assessment: Pass. The form of midcourse evaluation – protection of laboratory work. The form of the Pass is verbal and written.