DATABASES
(course title)

COURSE SYLLABUS ABSTRACT
of higher education institution
speciality

1-40 05 01 Information systems and technologies (by directions)
(speciality code and name)

	STUDY MODE	
	full-time	part-time
Year	2	3
Semester	4	5
Lectures, hours	16	4
Laboratory classes, hours	34	6
In-class test (semester, hours)		5 sem. (2 hours)
Exam, semester	4	5
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 "Databases" is the formation of professional competencies necessary for the creation and maintenance of modern databases, as well as database management with a focus on solving various applied tasks.

2. Course learning outcomes

Upon completion of the course, students will be expected to

know:

– basic concepts of databases, fundamentals of the organization and functioning of databases; modern database management systems;

– stages of designing information systems based on a relational data model; methods and tools of a specific DBMS designed to implement databases;

– basic constructions of the standard SQL query language; organization of access to the database, ways to ensure data security, fundamentals of the functioning of distributed and multi-user databases;

be able to:

– design relational databases; implement a relational database model in the DBMS used, using the basic structures of a structured query language; organize the input of information into the database, search for information and output reports; work with a multi-user database;

possess:

– methods of relational database design; fundamentals of software implementation of databases, ways to access and manage databases, ways to ensure data security; technology of organization of distributed databases, methods and means of their implementation and use in solutions of applied tasks.

3. Competencies

БПК-13 Design, create and administer information databases for information support of software complexes and systems.

4. Requirements and forms of midcourse evaluation and summative assessment: exam.