

**Academic discipline:
«Financial mathematics»**

Code and name of specialty	1-25 01 12 Economic informatics
Training course	1
Semester of training	1
Number of class hours:	52
Lectures	26
Seminar classes	-
Practical classes	26
Laboratory classes	-
Form of current assessment (credit/differential credit/exam)	exam
Number of credits	4
Competencies to be formed	Mastering the academic discipline «Financial mathematics» should ensure the formation of specialized competencies: to use financial and mathematical methods to solve problems of professional activity; to use basic mathematical concepts and calculation methods for the analysis and modeling of economic processes.

Brief content of the academic discipline:

In the process of teaching the discipline «Financial mathematics»:

- the basic concepts that are used in financial calculations are considered: simple and compound interest, interest rate system, interest accrual, discounting payments, constant payment flows, variable and continuous rents, financial instruments.
- the problems related to the quantitative analysis of various payment flows, in particular financial rents, are being studied.
- students are mastering quantitative financial analysis, which will allow them to solve a wide range of tasks: from elementary interest accrual to the analysis of complex investment, credit and commercial problems in their various formulations, depending on specific conditions.