



Syllabus of the educational discipline «Econometrics»

Specialty	051 Economics
Educational program	International economics
Level of education	first(bachelor)
Discipline status	Base
Teaching language	English
Course / semester	2 nd course, 4 th semester
Number of credits ECTS	5
Distribution by types of trainings and hours of study	Lectures – 24.hours. Practical studies (seminars) – 12 hours. Laboratory studies – 12 hours. Independent training – 102 hours.
Form of final assessment	Exam /Pass
Department	Department of higher mathematics, economical and mathematical methods, Simon Kuznets KNUE, room 329 (main building), +38(057)702-04-05 (or 3-33), E-mail: kafmath@hneu.edu.ua , http://www.vm.hneu.edu.ua/
Teacher (-s)	MisiuraIevgeniiaLuriivna, PhD, associate professor
Teacher's contacts	misuraeu@gmail.com
Days of the classes	according to the schedule
Consultations	distance, according to the schedule
The purpose of the discipline is	
forming future specialists' basic mathematical knowledge for solving theoretical and practical problems in professional activity of a competent specialist in any sphere of his activity, skills in analytical thinking and skills in using mathematical knowledge and econometric methods for formation of real processes and developments, and for solving economic problems.	
Prerequisites for learning	
<i>Assimilation of the material of the disciplines "Operation Research and Optimization Methods"</i>	
Content of the educational discipline	
Content module 1. Pair and multiple regression models	
Theme 1. Particular properties of econometric models and principles of their construction. A pair linear model	
Theme 2. General questions in a construction of a multiple regression model	
Theme 3. An estimation of parameters of a linear multiple regression model and its quality in a whole.	
Theme 4. Particular equations of a regression. A forecasting using regression models.	
Theme 5. Problems in the construction of linear multiple regression models: a multicollinearity.	
Theme 6. Problems in the construction of linear multiple regression models: a heteroscedasticity.	
Theme 7. Problems in the construction of linear multiple regression models: an autocorrelation of residuals of a model.	
Content module 2. Types of econometric models	
Theme 8. The generalized schemes of regression analysis.	
Theme 9. Systems of econometric equations.	
Theme 10. Dynamic econometric models	
Theme 11. Modeling one-dimensional time series	
Theme 12. Learning relationships using time series and a forecasting	
Material and technical support (software) of the discipline	
Software MS Excel	
Course page on the Moodle platform (personal training system)	Syllabus (working program), working plan (technological card), recommended literature, journal of students' attendance, materials of lectures (notes and presentations), questions to independent work, guidelines to conducting practical and laboratory studies, tasks for independent work, tests for checking students' knowledge, example of an examination paper and a criteria of an assessment of examination work. https://pns.hneu.edu.ua/course/view.php?id=5623

**Recommended literature**

- 1.Сгоршин А. А. Лабораторний практикум з економетрики в Excel :навчально-практичний посібник / О. О. Сгоршин, Л. М. Малярець. – Харків : Вид. ХНЕУ, 2011. – 140 с.
- 2.Малярець Л. М. Економіко-математичні методи та моделі :навчальний посібник / Л. М. Малярець. – Харків : Вид. ХНЕУ ім. С. Кузнеця, 2014. – 412 с.
- 3.Малярець Л. М. Лабораторний практикум з навчальної дисципліни «Економіко-математичне моделювання» :навчально-практичний посібник / Л. М. Малярець, П. М. Куликов, І. Л. Лебедєва та ін. – Харків : Вид. ХНЕУ, 2009. – 136 с.
- 4.Малярець Л. М. Эконометрика в примерах и задачах / Л. М. Малярець, Э. Ю. Железнякова, Л. А. Норик. – Харьков :Изд. ХНЭУ им. С. Кузнеця, 2014. – 268 с.
- 5.Пономаренко В. С. Багато вимірний аналіз соціально-економічних систем :навчальний посібник / В. С. Пономаренко, Л. М. Малярець. – Харків : Вид. ХНЕУ, 2009. – 384 с.
- 6.Методичні рекомендації і завдання до виконання контрольних робіт з навчальної дисципліни "Економетрика" для студентів галузей знань 0305 "Економіка і підприємництво", 0306 "Менеджмент і адміністрування" денної форми навчання / уклад. Л. М. Малярець, О. В. Мінєнкова. – Харків : ХНЕУ ім. С. Кузнеця, 2016. – 56 с.

Assessment system of learning outcomes

Current control is carried out on a cumulative 100-point system (the maximum is 60 points; the minimum that allows a student to take the exam is 35); final control is conducted in the form of an exam according to the schedule of the educational process (maximum is 40 points, minimum is 25 points). More detailed information on assessment is given in the technological card of the discipline.

Accumulation of rating points in the discipline (example)

Types of training	Max points
Homework	9
Competence oriented tasks	12
Written tests	18
Independent creative task	7
Colloquiums	14
Exam	40
Max points	100

Transference of Simon Kuznets KHNU Characteristics of Students' Progress into the System of the ECTS Scale

Total score on a 100-point scale	ECTS assessment scale	Assessment on the national scale	
		for exam, differentiated test, course project (work), practice, training	for pass
90 – 100	A	excellent	pass
82 – 89	B	good	
74 – 81	C	satisfactory	
64 – 73	D		
60 – 63	E	unsatisfactory	not pass
35 – 59	FX		
1 – 34	F		

Discipline policies

Policy of academic integrity (according to the Law of Ukraine "On Education") - "Teaching discipline is based on the principles of academic integrity - a set of ethical principles and statutory rules that should guide participants in the educational process during training, teaching and conducting scientific (creative) activities to ensure confidence in learning outcomes and / or scientific (creative) achievements. Violations of academic integrity are: academic plagiarism, self-plagiarism, fabrication, falsification, write-off, deception, bribery, biased evaluation. For violation of academic integrity, students may be held subject to the following academic liability: re-assessment (test, exam, test, etc.); re-passing the relevant educational component of the educational program. Write-off during control (modular) works is forbidden (including with use of mobile devices). <https://www.hneu.edu.ua/akademichna-dobrocheshnist/>

More detailed information about competencies, learning outcomes, teaching methods, assessment forms, independent training is given in the Syllabus (working plan) of the educational discipline (<http://repository.hneu.edu.ua/handle/123456789/22070>).