

**1. General information****Course:** INNOVATION ECONOMICS**Type:** ELECTIVE**Degree:** 316 - UNDERGRADUATE DEGREE IN ECONOMICS**Center:** 5 - FACULTY OF ECONOMICS AND BUSINESS**Year:** 4**Main language:** Spanish**Use of additional languages:****Web site:****Code:** 53346**ECTS credits:** 6**Academic year:** 2023-24**Group(s):** 10**Duration:** First semester**Second language:** English**English Friendly:** Y**Bilingual:** N**Lecturer:** ANGELA TRIGUERO CANO - Group(s): 10

Building/Office	Department	Phone number	Email	Office hours
Despacho 2.03	ECO .ESP. E INT.,ECONOMET. E Hª E INS.EC		angela.triguero@uclm.es	

**2. Pre-Requisites**

There are no prerequisites to take this subject. Despite this, it is advisable that the student has passed subjects as Foundations of Microeconomics, Applied Economics or Spanish Economy. Moreover, the student must have the basic skills in handling computer software to solve the practical exercises (Word, Excel or similar). Knowledge of a foreign language, preferably English, can also allow read supplementary literature.

**3. Justification in the curriculum, relation to other subjects and to the profession**

The Economics of Innovation refers to the analysis of markets and the behaviour of firms operating in these markets taking into account the role of innovation. Traditionally, this course has been taught under the name of "Industrial Economics" (Industrial Organization). Given the current role of innovation to understand the competition level in the markets, this area is called "Economics of Innovation" in the current curriculum. This subject includes contents of Industrial Organization but is more in line with current economic reality considering the key role of innovation and technological change. The name "Economics of Innovation" is justified because the nature of competition in the markets is broader than simple competition through prices and focuses on innovation (in new products, processes, marketing and organizational ways...). The direct consequence is that markets are experiencing a continuous change since the conduct of companies constantly modifies their conduct taken into account technological change. This dynamic conception of competition deviates from the neoclassical tradition, but integrates many of the problems in the models of imperfect competition of traditional microeconomic analysis. From a microeconomic view, the course addresses key issues for understanding the level of competition in the markets and the strategic behaviour of firms, the conditions under which there is full competition and identification of anti-competitive practices and abuse of dominant position. The course also aims to provide students with tools that will be useful in their future professional activity, especially in developing market research or making strategic decisions in the field of business.

**4. Degree competences achieved in this course****Course competences**

Code	Description
E02	Understand the role of institutions and economic agents in economic and social activities.
E04	Analytical skills to identify and anticipate relevant economic and legal issues and the different alternative solutions.
E10	Ability to design and implement policies and strategies promoting competition and market restructuring.
G01	Possession of the skills needed for continuous, self-led, independent learning, which will allow students to develop the learning abilities needed to undertake further study with a high degree of independence.
G03	Develop oral and written communication skills in order to prepare reports, research projects and business projects and defend them before any commission or group of professionals (specialised or non-specialised) in more than one language, by collecting relevant evidence and interpreting it appropriately so as to reach conclusions.
G04	Ability for the use and development of information and communication technology in the development of professional activity.
G05	Capacity for teamwork, to lead, direct, plan and supervise multidisciplinary and multicultural teams in both national and international environments.

**5. Objectives or Learning Outcomes****Course learning outcomes****Description**

Train the student to work out problems in creative and innovative ways.

Know the performance and regulation of product and factor markets at national and international level and the drivers for the generation of wealth and a suitable distribution of income.

Train the student to listen to and defend arguments orally or in writing

**Additional outcomes**

Diagnosis and assessment skills to conduct reports about the situation of a market.

Identify relevant sources of information and its content, as well as the ability to derive the important information from the data, otherwise completely unknown to non-professionals.

Ability to design and implement policies and strategies promoting competition and market restructuring.

## 6. Units / Contents

Unit 1: Theories of Industrial Organization

Unit 2: Innovation and technological change

Unit 3: Entry barriers and innovation

Unit 4: Market Structure and innovation

Unit 5: Product differentiation, diversification and innovation

Unit 6: Vertical integration and Transaction costs

Unit 7: Regulation, Innovation and Competition Defense Policy

Unit 8: Globalization, Innovation and Competition

## ADDITIONAL COMMENTS, REMARKS

The details of the units and the evaluable activities and their date of completion will be provided on the virtual campus.

## 7. Activities, Units/Modules and Methodology

Training Activity	Methodology	Related Competences (only degrees before RD 822/2021)	ECTS	Hours	As	Com	Description
Class Attendance (theory) [ON-SITE]	Lectures	E02 E04 E10 G01	1.33	33.25	Y	N	Theoretical explanations of main concepts and ideas of the subject by professor
Class Attendance (practical) [ON-SITE]	Practical or hands-on activities	E02 E04 E10 G01	0.35	8.75	Y	N	Resolution of practices and discussion about the role of diverse competitive strategies and innovation in the degree of competition in markets
Other on-site activities [ON-SITE]	Cooperative / Collaborative Learning	E02 E04 E10 G01 G05	0.32	8	Y	N	Execution of practices or debates proposed by the professor and/or students in a cooperative mode
Study and Exam Preparation [OFF-SITE]	Self-study	E02 E04 E10 G01	2	50	Y	N	Self-reading and self-study of materials and complementary bibliography
Other off-site activity [OFF-SITE]	Case Studies	E02 E04 E10 G01 G03 G04 G05	0.5	12.5	Y	N	From industrial economics perspective, analysis of specific markets using different sources (reports, data,...)
Other off-site activity [OFF-SITE]	Problem solving and exercises	E02 E04 E10 G01 G03	0.8	20	Y	N	Problem solving and exercises using data and information published on the websites of the European Commission, Institutes of Statistics, Ministeries, antitrust agencies, business associations,...)
Other off-site activity [OFF-SITE]	Reading and Analysis of Reviews and Articles	E02 E04 E10 G01 G03 G04 G05	0.6	15	Y	N	Synthesis and critical reflection on various issues after the reading of related articles
Final test [ON-SITE]	Assessment tests	E02 E04 E10 G01	0.1	2.5	Y	Y	Taking a written test with different theoretical questions and exercises
<b>Total:</b>			<b>6</b>	<b>150</b>			
<b>Total credits of in-class work: 2.1</b>			<b>Total class time hours: 52.5</b>				
<b>Total credits of out of class work: 3.9</b>			<b>Total hours of out of class work: 97.5</b>				

As: Assessable training activity

Com: Training activity of compulsory overcoming (It will be essential to overcome both continuous and non-continuous assessment).

## 8. Evaluation criteria and Grading System

Evaluation System	Continuous assessment	Non-continuous evaluation*	Description
Final test	40.00%	60.00%	The final exam will consist of different questions concerning theoretical aspects, defining basic concepts and numerical problem solving. Minimum threshold mark: 4 over 10 points
Practical exam	50.00%	35.00%	Both quantity and quality of the submitted exercises and essays will be taken into account in the assessment
Assessment of active participation	10.00%	5.00%	The instructor will assess active participation of students in both theoretical and empirical face-to-face classes. The professor will also open online forums for participation of those who cannot attend the lectures
<b>Total:</b>	<b>100.00%</b>	<b>100.00%</b>	

According to art. 4 of the UCLM Student Evaluation Regulations, it must be provided to students who cannot regularly attend face-to-face training activities the passing of the subject, having the right (art. 12.2) to be globally graded, in 2 annual calls per subject, an ordinary and an extraordinary one (evaluating 100% of the competences).

### Evaluation criteria for the final exam:

#### Continuous assessment:

-The continuous assessment consists of individual and group practical exercises, discussions, participation in class. Attendance at seminars or other activities programmed in the Faculty will also be assessed.

-Those students who, having even carried out evaluation activities, want to be evaluated with the non-continuous evaluation criteria must notify the teacher before the end of the class period.

-Regarding the evaluation in case of illness or other special circumstances (mitigating rules), see article 6 of the Student Evaluation Regulation of the University of Castilla-La Mancha.

#### Non-continuous evaluation:

-Students who do not attend class will be able to submit the exercises and essays on the Moodle platform on-time schedule. Class participation will be replaced by virtual forums proposed by the professor. Likewise, if they do not submit or do not pass these activities, they may be eligible for a final examination which will include additional tasks to assess the skills and competences not developed or acquired through training activities (evaluating 100%).

-Regarding the evaluation in case of illness or other special circumstances (mitigating rules), see article 6 of the Student Evaluation Regulation of the University of Castilla-La Mancha

#### Specifications for the resit/retake exam:

-Marks of continuous assessment would be taken into account in this exam.

-Students who have not passed the different training activities may recover the relevant mark before the written retake exam takes place. For those students, the mark concerning participation in the classroom may be as well recovered through participation in online forums before the written retake exam takes place.

#### Specifications for the second resit / retake exam:

-Given the special features of the second retake exam, the final mark will be only obtained through the final exam, unless the student expresses her intention to take part in continuous evaluation up to the day the second retake exam takes place.

9. Assignments, course calendar and important dates	
Not related to the syllabus/contents	
Hours	hours
Class Attendance (theory) [PRESENCIAL][Lectures]	1.25
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	.75
Study and Exam Preparation [AUTÓNOMA][Self-study]	2
Other off-site activity [AUTÓNOMA][Case Studies]	12.5
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	4
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	7
Final test [PRESENCIAL][Assessment tests]	2.5
Unit 1 (de 8): Theories of Industrial Organization	
Activities	Hours
Class Attendance (theory) [PRESENCIAL][Lectures]	4
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	1
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	1
Study and Exam Preparation [AUTÓNOMA][Self-study]	6
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	2
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	1
Unit 2 (de 8): Innovation and technological change	
Activities	Hours
Class Attendance (theory) [PRESENCIAL][Lectures]	4
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	1
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	1
Study and Exam Preparation [AUTÓNOMA][Self-study]	6
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	2
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	1
Unit 3 (de 8): Entry barriers and innovation	
Activities	Hours
Class Attendance (theory) [PRESENCIAL][Lectures]	4
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	1
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	1
Study and Exam Preparation [AUTÓNOMA][Self-study]	6
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	2
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	1
Unit 4 (de 8): Market Structure and innovation	
Activities	Hours
Class Attendance (theory) [PRESENCIAL][Lectures]	4
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	1
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	1
Study and Exam Preparation [AUTÓNOMA][Self-study]	6
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	2
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	1
Unit 5 (de 8): Product differentiation, diversification and innovation	
Activities	Hours
Class Attendance (theory) [PRESENCIAL][Lectures]	4
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	1
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	1
Study and Exam Preparation [AUTÓNOMA][Self-study]	6
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	2
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	1
Unit 6 (de 8): Vertical integration and Transaction costs	
Activities	Hours
Class Attendance (theory) [PRESENCIAL][Lectures]	4

Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	1
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	1
Study and Exam Preparation [AUTÓNOMA][Self-study]	6
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	2
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	1
<b>Unit 7 (de 8): Regulation, Innovation and Competition Defense Policy</b>	
<b>Activities</b>	<b>Hours</b>
Class Attendance (theory) [PRESENCIAL][Lectures]	4
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	1
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	1
Study and Exam Preparation [AUTÓNOMA][Self-study]	6
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	2
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	1
<b>Unit 8 (de 8): Globalization, Innovation and Competition</b>	
<b>Activities</b>	<b>Hours</b>
Class Attendance (theory) [PRESENCIAL][Lectures]	4
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	1
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	1
Study and Exam Preparation [AUTÓNOMA][Self-study]	6
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	2
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	1
<b>Global activity</b>	
<b>Activities</b>	<b>hours</b>
Other off-site activity [AUTÓNOMA][Problem solving and exercises]	20
Study and Exam Preparation [AUTÓNOMA][Self-study]	50
Class Attendance (practical) [PRESENCIAL][Practical or hands-on activities]	8.75
Other off-site activity [AUTÓNOMA][Case Studies]	12.5
Other on-site activities [PRESENCIAL][Cooperative / Collaborative Learning]	8
Other off-site activity [AUTÓNOMA][Reading and Analysis of Reviews and Articles]	15
Final test [PRESENCIAL][Assessment tests]	2.5
Class Attendance (theory) [PRESENCIAL][Lectures]	33.25
<b>Total horas: 150</b>	

10. Bibliography and Sources						
Author(s)	Title/Link	Publishing house	Citv	ISBN	Year	Description
Heijs, J., & Buesa, M.	Manual de economía de innovación. Tomo I: Teoría del cambio tecnológico y sistemas nacionales de innovación	Instituto de Análisis Industrial y Financiero, Universidad Complutense			2016	
Callejón, M.	Economía Industrial	Civitas			2001	
Clarke, R.	Industrial Economics	Wiley-Blackwell			1991	
Dutta, S., Lanvin, B., Rivera	Global Innovation Index 2022					
León. L. & Wunsch-Vincent, S. (Editors)	What is the future of innovation-driven growth?	WIPO			2023	
VVAA	La innovación, un desafío inaplazable	FUNCAS			2021	
OECD/Eurostat	Oslo Manual 2018: Guidelines for Collecting, Reporting and Using Data on Innovation. 4th Edition <a href="https://doi.org/10.1787/9789264304604-en">https://doi.org/10.1787/9789264304604-en</a>	OECD Publishing			2018	
Dodgson, M. & Gann, D.	Innovación. Una breve introducción	Antoni Bosch			2019	
Diamandis, P. H. & Kotler, S.	El futuro va más rápido de lo que crees : cómo la convergencia tecnológica está transformando las empresas, la economía y nuestras vidas	Deusto			2021	