



1. General information

Course: PHYSICS II

Type: BASIC

Degree: 403 - UNDERGRADUATE DEGREE PROGRAMME IN AEROSPACE
ENGINEERING

Center: 303 - E.DE INGENIERÍA INDUSTRIAL Y AEROESPACIAL DE TOLEDO

Year: 1

Main language: Spanish

Use of additional
languages:

Web site:

Code: 56707

ECTS credits: 6

Academic year: 2023-24

Group(s): 40

Duration: C2

Second language:

English Friendly: N

Bilingual: N

Lecturer: JOSE MIGUEL COLINO GARCIA - Group(s): 40

Building/Office	Department	Phone number	Email	Office hours
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Lecturer: ISABEL TARRIO ALONSO - Group(s): 40

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Pabellón 19/lab.19.5	FÍSICA APLICADA		Isabel.Tarrio@uclm.es	

2. Pre-Requisites

Not established

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

Not established

4. Degree competences achieved in this course

Course competences

Code	Description
CA01	Ability to carry out bibliographic searches, use databases and other sources of information for its application in tasks related to Technical Aeronautical Engineering.
CA02	Ability to efficiently design experimentation procedures, interpret the data obtained and specify valid conclusions in the field of Aeronautical Technical Engineering.
CA03	Ability to autonomously select and carry out the appropriate experimental procedure, operating the equipment correctly, in the analysis of phenomena within the scope of Engineering.
CA04	Ability to select advanced tools and techniques and their application in the field of Aeronautical Technical Engineering.
CA05	Knowledge of the methods, techniques and tools as well as their limitations in the application for the resolution of problems typical of Aeronautical Technical Engineering.
CB01	Prove that they have acquired and understood knowledge in a subject area that derives from general secondary education and is appropriate to a level based on advanced course books, and includes updated and cutting-edge aspects of their field of knowledge.
CB02	Apply their knowledge to their job or vocation in a professional manner and show that they have the competences to construct and justify arguments and solve problems within their subject area.
CB03	Be able to gather and process relevant information (usually within their subject area) to give opinions, including reflections on relevant social, scientific or ethical issues.
CB05	Have developed the necessary learning abilities to carry on studying autonomously
CE02	Understanding and command of the basic concepts of the general laws of mechanics, thermodynamics, fields and waves and electromagnetism and their application to solve engineering problems.

5. Objectives or Learning Outcomes

Course learning outcomes

Description

6. Units / Contents

Unit 1:

Unit 2:

Unit 3:

Unit 4:

Unit 5:

Unit 6:

Unit 7:

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	CA01 CA04 CA05 CB03 CE02	1.04	26	N	-	
Problem solving and/or case studies [ON-SITE]	Problem solving and exercises	CA01 CA05 CB01 CB02 CB03 CB05 CE02	0.72	18	N	-	
Laboratory practice or sessions [ON-SITE]	Practical or hands-on activities	CA01 CA02 CA03 CA04 CA05 CE02	0.48	12	Y	Y	
Practicum and practical activities report writing or preparation [OFF-SITE]	Cooperative / Collaborative Learning	CA01 CA03 CA04 CA05 CE02	0.48	12	Y	Y	
Study and Exam Preparation [OFF-SITE]	Self-study	CA01 CA02 CA03 CA04 CA05 CE02	3.12	78	N	-	
Formative Assessment [ON-SITE]	Assessment tests		0.16	4	Y	Y	
Total:			6	150			
Total credits of in-class work: 2.4			Total class time hours: 60				
Total credits of out of class work: 3.6			Total hours of out of class work: 90				

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
Laboratory sessions	20.00%	30.00%	
Progress Tests	15.00%	0.00%	
Final test	65.00%	70.00%	
Total:	100.00%	100.00%	

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).

9. Assignments, course calendar and important dates	
Not related to the syllabus/contents	
Hours	hours
Class Attendance (theory) [PRESENCIAL][Lectures]	26
Problem solving and/or case studies [PRESENCIAL][Problem solving and exercises]	18
Laboratory practice or sessions [PRESENCIAL][Practical or hands-on activities]	12
Practicum and practical activities report writing or preparation [AUTÓNOMA][Cooperative / Collaborative Learning]	12
Study and Exam Preparation [AUTÓNOMA][Self-study]	78
Formative Assessment [PRESENCIAL][Assessment tests]	4
Global activity	
Activities	hours
Laboratory practice or sessions [PRESENCIAL][Practical or hands-on activities]	12
Problem solving and/or case studies [PRESENCIAL][Problem solving and exercises]	18
Study and Exam Preparation [AUTÓNOMA][Self-study]	78
Class Attendance (theory) [PRESENCIAL][Lectures]	26
Practicum and practical activities report writing or preparation [AUTÓNOMA][Cooperative / Collaborative Learning]	12
Formative Assessment [PRESENCIAL][Assessment tests]	4
Total horas: 150	

10. Bibliography and Sources						
Author(s)	Title/Link	Publishing house	Citv	ISBN	Year	Description
P. A. Tipler y G. Mosca	Física para la ciencia y la tecnología (Vol.2)	Reverté	Barcelona		2010	
R. A. Serway y J. W. Jewett Jr.	Física (Vol.2)	Thomson	Madrid		2003	
Jose María de Juana	Física General (Vol.2)	Pearson Educación S.A.		978-84-205-3343-8	2007	
A. García-Maroto	Física 200 problemas útiles	García- Maroto Editores S.L.			2006	
Félix A. González	La Física en problemas	TEBAR FLORES			1995	
	https://catalogobiblioteca.uclm.es					