

## PHYSICS II

1	Course Title:	PHYSICS II
2	Course Code:	FZK1090
3	Type of Course:	Compulsory
4	Level of Course:	First Cycle
5	Year of Study:	1
6	Semester:	2
7	ECTS Credits Allocated:	4.00
8	Theoretical (hour/week):	3.00
9	Practice (hour/week):	0.00
10	Laboratory (hour/week):	0
11	Prerequisites:	None
12	Language:	Turkish
13	Mode of Delivery:	Face to face
14	Course Coordinator:	Doç.Dr. NİL KÜÇÜK
15	Course Lecturers:	Prof.Dr.İlker KÜÇÜK Doç. Dr. Nil KÜÇÜK
16	Contact information of the Course Coordinator:	e-mail: nilkoc@uludag.edu.tr Tel: 0 224 29 41 705 U.Ü., Fen Edebiyat Fakültesi, Fizik Bölümü 16059 Görükle Kampüsü/Bursa
17	Website:	
18	Objective of the Course:	Teaching the fundamentals of Physics.
19	Contribution of the Course to Professional Development:	
20	Learning Outcomes:	
	1	The fundamental knowledge of physics is obtained.
	2	Many potential solutions can be produced for a given problem.
	3	Problems can be analysed by different point of view.
	4	The mutual relationship between problems and subjects are able to be recognised.
	5	The independent ability of learning is developed.
	6	The subjects and relations between them are understood.
	7	The variables in the process can be interpreted.
	8	The datum can be analysed and explained.
	9	
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21	Course Content:	
	<b>Course Content:</b>	
Week	Theoretical	Practice
1	Electric Charge	
2	Electric Field	
3	Gauss' Law	
4	Electric Potential	
5	Capacitors and Dielectrics	

<b>6</b>	Currents in Materials	
<b>7</b>	Midterm Exam Repetition of lecture	
<b>8</b>	Direct-Current Circuits	
<b>9</b>	The Effects of Magnetic Fields	
<b>10</b>	The Production and Properties of Magnetic Fields	
<b>11</b>	Faraday's Law, Magnetism and Matter	
<b>12</b>	Inductance and Circuit Oscillations	
<b>13</b>	Alternating Currents	
<b>14</b>	Maxwell's Equations and Electromagnetic Fields	

<b>22</b>	Textbooks, References and/or Other Materials:	<p>1. "Physics for Scientists and Engineers", Raymond A. Serway, John W., (1995) Palme.</p> <p>2. "University Physics", Hugh D. Young, Roger A. Freedman, (2007) Pearson Education.</p> <p>3. "Fundamentals of Physics", David Halliday, Robert Resnick, (2008), Wiley.</p>
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<b>23</b>	Assesment
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TERM LEARNING ACTIVITIES		NUMBER	WEIGHT		
Activites			Number	Duration (hour)	Total Work Load (hour)
Theoretical					
Final Exam	1	60.00		3.00	42.00
Practicals/Labs			0	0.00	0.00
Self study and preparation					
Contribution of Term (Year) Learning Activities to		40.00		5.00	70.00
Homeworks			0	0.00	0.00
Projects					
Contribution of Final Exam to Success Grade		60.00		0.00	0.00
Field Studies			0	0.00	0.00
Midterm exams					
Measurement and Evaluation Techniques Used in the			1	2.00	2.00
Others			2	1.00	2.00
Final Exam			1	2.00	2.00
<b>24 ECTS / WORK LOAD TABLE</b>					
Total Work Load					118.00
Total work load/ 30 hr					3.93
ECTS Credit of the Course					4.00

<b>25</b>	CONTRIBUTION OF LEARNING OUTCOMES TO PROGRAMME QUALIFICATIONS															
	PQ1	PQ2	PQ3	PQ4	PQ5	PQ6	PQ7	PQ8	PQ9	PQ10	PQ11	PQ12	PQ13	PQ14	PQ15	PQ16
<b>ÖK1</b>	4	2	2	0	2	4	4	0	4	3	0	3	0	0	0	0
<b>ÖK2</b>	4	2	2	0	2	4	4	0	4	3	0	3	0	0	0	0
<b>ÖK3</b>	4	3	3	0	2	4	4	0	4	3	0	3	0	0	0	0
<b>ÖK4</b>	4	3	3	0	2	4	4	0	4	3	0	3	0	0	0	0

ÖK5	4	3	3	0	2	4	4	0	4	3	0	3	0	0	0	0
ÖK6	4	3	3	0	2	4	4	0	4	3	0	3	0	0	0	0
ÖK7	4	3	3	0	2	4	4	0	4	3	0	3	0	0	0	0
ÖK8	4	3	3	0	2	4	4	0	4	3	0	3	0	0	0	0
LO: Learning Objectives    PQ: Program Qualifications																
Contribution Level:	1 very low			2 low			3 Medium			4 High			5 Very High			