

مختصر توصيف المقرر

(Course Information)

معلومات المقرر\*

	الفيزياء العامة 1 عملي	اسم المقرر:
	فيز 1012	رقم المقرر:
	--	اسم ورقم المتطلب السابق:
	--	اسم ورقم المتطلب المرافق:
	الأول	مستوى المقرر:
	1 (0+2+0)	الساعات المعتمدة:
<b>Module Title:</b>	General Physics I Lab.	
<b>Module ID:</b>	PHYS 1012	
<b>Prerequisite:</b>	--	
<b>Co-requisite:</b>	--	
<b>Course Level:</b>	First	
<b>Credit Hours:</b>	1 (0+2+0)	



Module

وصف المقرر :

Description

This course is the experimental part of the introductory course for the fundamental principles of physics in mechanics. The student will do experiments related to the theoretical phenomenon of: One and two dimensions, circular motions, collisions, linear and angular momentum, and elasticity.

Module Aims

أهداف المقرر :

1	Knowing and practicing the ethics of working in the laboratory.	1
2	The ability of using the measuring tools correctly	2
3	The student should be able to do the experiment by himself, and to collect data.	3
4	The ability to analyze data and write conclusions.	4

Learning Outcomes:

مخرجات التعليم:

1	<b>Knowledge</b>	1
2	<b>Cognitive Skills</b> <ul style="list-style-type: none"> <li>To experimentally distinguish between the one and two-dimensional mechanics</li> <li>To analyze the schematics and diagrams related to it.</li> <li>To explain and justify the results obtained from the experiment</li> </ul>	2

<b>3</b>	<b>Interpersonal Skills &amp; Responsibility</b> <ul style="list-style-type: none"> <li>Practice the safety and organizing rules of the laboratories.</li> <li>To act with self-reliance when working independently. Displays teamwork and shows professional commitment to ethical practice.</li> </ul>	<b>3</b>
<b>4</b>	<b>Communication, Information Technology and Numerical Skills</b> <ul style="list-style-type: none"> <li>To write laboratory reports, relate experiments to its related theories.</li> <li>To use software programs in writing, inserting and analyzing data, and plotting graphs.</li> <li>To develop the ability to argue scientifically with the instructor.</li> <li>To know how to use the computer program to analyze the data, and make some simulation</li> <li>To know how to search the web for any updated information concerning the assigned experiment.</li> <li>To analyze the data with good mathematics and theory.</li> </ul>	<b>4</b>
<b>5</b>	<b>Psychomotor</b> Not applicable.	<b>5</b>

**Course Contents:**

محتوى المقرر:

ساعات التدريس (Hours)	عدد الأسابيع (Weeks)	قائمة الموضوعات (Subjects)
2	1.0	Lab. Orientation and instructions.
2	1.0	Measurements experiment
2	1.0	Equation of motion experiment
2	1.0	Vector table experiment
2	1.0	Projectile motion experiment
2	1.0	Free fall experiment
2	1.0	Friction experiment
2	1.0	Simple pendulum experiment
2	1.0	Hook's law experiment
2	1.0	Inclined plane experiment
2	1.0	Rotational motion experiment
2	1.0	Collision and momentum
2	1.0	Oral Exam
2	1.0	Practical Exam

**Textbook and References:**

الكتاب المقرر والمراجع المساندة:

سنة النشر Publishing Year	اسم الناشر Publisher	اسم المؤلف (رئيسي) Author's Name	اسم الكتاب المقرر Textbook title
		<i>Prepared By Samir Al-Zobaidi</i>	Lab. Manuals
سنة النشر Publishing Year	اسم الناشر Publisher	اسم المؤلف (رئيسي) Author's Name	اسم المرجع Reference

9 <sup>th</sup> Ed. (2011)	Cengage Learning	<a href="#"><i>Raymond A. Serway, Chris Vuille</i></a>	<b>College Physics</b> <i>ISBN-10:0840062060</i>
9 <sup>th</sup> Ed. (2012)	John Wiley & Sons	<i>John D. Cutnell, <a href="#">Kenneth W. Johnson</a></i>	<b>Physics</b> <i>ISBN-10: 0470879521</i>
9 <sup>th</sup> Ed. (2013)	<i>Cengage Learning</i>	<i>Raymond A. Serway and <a href="#">John W. Jewett</a></i>	<b>Physics for scientists and engineers</b> <i>ISBN-10: 013805715X</i>

