Los Angeles City College, Fall 2024
PHYS 06 *General Physics I* , 4 Units
Lab Sec 11300 (3 hrs) M 2:20 PM – 5:30 PM, Sci 200
Lect Sec 11279 (3 hrs) W 2:20 PM – 5:30 PM, Via ZOOM

*INSTRUCTOR:* Roy W. Erickson, 1st choice: CANVAS *Inbox* (visited daily or so), 2nd choice: ericksrw@laccd.edu.

*OFFICE HOURS:* (Tentatively) After class for 20 minutes (further time slots to be determined).

*PRE-REQUISITES*: Math 240 or Math 258 (Trigonometry) or Equivalent

*SUBJECT MATTER (SLO)*: Students learn the fundamentals of Newtonian physics, such as mechanics, heat and sound. This course is designed for majors in Health and Life Sciences, Architecture, and all those needing a one year course in college physics requiring trigonometry but NOT calculus, such as Computer Science.

*WEIGHTING*: Comprehensive Final Exam 20%, 4 Tests 50%, HW, Quizzes and Classwork 15% , 6 Labs 15%

*Note: 5 tests are given, but the lowest score is dropped. Thus, NO make-up tests are given so plan accordingly.*
*Note: Up to 7 Labs / Experiments will be given, with the lowest score being dropped.*

*GRADING:* A: 100 – 90.0, B: 89.**9** – 80.0, C: 79.**9** – 70.0, D: 69.**9** – 60.0, F: 59.9 – 0

*TENTATIVE SCHEDULE:* Fall 2024

| Wk | Date | Monday (ON CAMPUS) | Wednesday (ONLINE) |
|---|---|---|---|
| 1 | 25 Aug | Intro, Ch 1: Introduction, Measurement, Estimating | Ch 2: Kinematics in One Dimension |
| 2 | 02 Sep | *Labor Day* | Ch 3: Kinematics 2-Dim and Vectors |
| 3 | 09 Sep | Ch 4a: Laws of Motion I – **Lab 1**: Measurement | Ch 4b: Laws of Motion II – Friction |
| 4 | 16 Sep | ***Test 1 (1-3)*** **– Lab 2**: Forces & Friction | Ch 5a: Circular Motion |
| 5 | 23 Sep | Ch 5b: Gravity – **Lab 3**: Newt's 2nd Law | Ch 6a: Work |
| 6 | 30 Oct | Ch 6b: Energy – **Lab 4**: Circular Motion | *Catch-up day* |
| 7 | 07 Oct | ***Test 2 (4-6)*** **–** Ch 7a: Linear Momentum I | Ch 7b: Linear Momentum II |
| 8 | 14 Oct | Ch 8a: Rotational Motion I – **Lab 5**: Linear Mom'tm | Ch 8b: Rotational Motion II |
| 9 | 21 Oct | Ch 9: Statics & Elasticity *(schedule Final)* | Ch 10a: Fluids I - Statics |
| 10 | 29 Oct | ***Test 3 (7-9)*** **–** Ch 10b: Fluids II - Dynamics | Ch 11a: Oscillations |
| 11 | 04 Nov | Ch 11b: Waves – **Lab 6**: Simple Machines | Ch 12a: Sound I |
| 12 | 11 Nov | Ch 12b: Sound II – **Lab 7**: Speed of Sound | *Catch-up day* |
| 13 | 18 Nov | ***Test 4 (10-12)*** **–** Ch 13a: Temperature | Ch 13b: Kinetic Theory |
| 14 | 25 Nov | Ch 14a: Heat I | Ch 14b: Heat II |
| 15 | 02 Dec | ***Test 5 (13-14)*** **–** Ch 15a: Thermodynamics I | Ch 15b: Thermodynamics II |
| 16 | 09 Dec | *No Class (Office Hour from 2:20 – 4:40)* | ***Comprehensive Final Exam (Dec 13th 1 – 3 pm ON CAMPUS)*** |

Last Day to: Add, Drop w/ Refund and Drop w/o 'W': 08 Sep, Drop w/ "W": 17 Nov v.1

*WORKLOAD:* This class will require a major time and effort commitment. Plan on spending at least an hour or two each night studying, doing problems, and/or writing up lab reports. This class is 4 units, which means you should be spending a lot more time on it than the typical 3 unit class. DO NOT FALL BEHIND! It is very difficult to catch up in this class as each chapter builds on the previous chapters, so stay on top of things. Ask for help if you are confused about anything. DO NOT ASSUME YOU WILL FIGURE IT OUT LATER AND CATCH UP (CRAMMING)!

*HOMEWORK*: After the lecture of each section consider the HW to be assigned, even if it was not formally announced (ask if in doubt). Work the problems listed in the HW Syllabus. E-mail *a fellow student* should you miss class as I do not always recall the details from class to class (I teach other classes and I work a part-time day job :) **Assigned HW is due at the *start* of Monday's class!** Late HW is *NOT* accepted under any circumstances! Each problem will be given a grade of 0 or 1 based primarily on completeness.

*HOMEWORK GUIDELINES:* In order to receive credit for homework, tests and projects your work must follow a specific set of style rules summarized in the handout "Homework Guidelines." These are like the rules in English classes: (( See mymathmantra.com → homework for examples ))

* HW must be properly labeled and stapled by the section to be accepted.
* Every HW assignment starts on a new page and needs class, title and name along the top.
* *Please DO NOT staple multiple sections together.*
* No two column layout - use full width of the page.
* All work is done on 8.5 x 11.0 white paper or engineering pad paper.
* Readable: Neatly written and organized layout of your work

My grader and I are *not* obligated to grade any type of work, including exam work, failing to follow these guidelines. Messy work reflects on your self-respect as well as your respect towards those who must read it.

*NAMING CONVENTIONS:* All uploaded material to CANVAS, or emailed to me or my grader, follows a naming convention. Example *"Math270-HW2F-Goodman-Amy."* Example, on email use Subject: "*Math270-Extra Credit?*" Failing to follow the convention could result in NO CREDIT to the submission, mostly b/c it is lost. *(( See Working Remotely for examples ))*

*TESTING PROCEDURES:* In the event we need to go 100% online then tests are given like this:

a) Log into CANVAS and start your zoom session through CANVAS. **Every minute of class zoom time gets recorded during the tests.** So PLEASE assure your environment is conducive to being viewed by me (and at times your classmates). Restroom breaks are *not* normally allowed.
b) Point your zoom camera (computer/laptop/tablet camera) at your face, *You must remain connected to zoom the entire time of the test*. *Your face must be clearly seen in your zoom camera the entire time during the test*. During the test you might be approached by me, via private chat on zoom, to turn up the room lights, or to reposition your zoom camera onto yourself.
c) Download the written portion (there may be a Multiple Choice/fill in the blank portion also) of the test from CANVAS when the Start Time allows it.
d) Print your test out and start the written portion on your print out, otherwise, if you do not have a printer open the test on your device and copy enough of the question onto white paper sheet to begin. *Chat with me when leaving to get your printout*.
e) Answer your questions on the white paper from your printer. Use the zoom Private Chat to ask me any questions regarding the readability, or the interpretation of test questions.
f) Please note the test's Due Date and End Time on CANVAS!!!!!
g) At the Due Date time – stop writing and start scanning. Upload your test to CANVAS by clicking on the Submit Assignment button. Ignore the "Late" warning that CANVAS posts between the Due Date and the End Time, there is no penalty in between these times.
h) CANVAS will *not* allow you to upload your test after the End Time
- at that point you will need to email it to ericksrw@laccd.edu to establish the timestamp *but* you will then ask me to extend the upload time and you will receive a penalty on your test score of 4%, per every 4 minutes late after that.

*(Your scanner, email protocols, and zoom time on the recordings mark the time of creation and last modified, sent time, received time in email, and, the file system marks the placement time into the files. So we know when your files are late.)*

*DISABILITIES AND GRIEVANCES:* Students with a verified disability who may need reasonable accommodations for this class are encouraged to notify the instructor and contact the Office for Special Services (SSV 100, 323-953-4000 x 2270) as soon as possible. *All information will remain confidential.* I will do my best to accommodate any disability that any student may have. If you have any complaints or grievances about the class or your treatment in it, talk to me first, so that we can work out any issues.

*CHEATING* results in a zero on the element being tested on. If seating allows for it we sit every other seat during the examination period. I reserve to right to rearrange people during the tests. *No restroom breaks!* Three Strikes: 1- "Eyes on your own paper," 2- I tap your desk, 3- I take your exam and put a Zero on it. Further cheating warrants a visit to the Dean, the results of which could be expulsion from CoC!

*DISTRACTIONS:* Late students create an unnecessary distraction, so it is your responsibility to your classmates to arrive on time. *Once in class* - stow all devices. You may be asked to leave class if you are texting or using your device in class. *At home* - place your device in the freezer while studying, visiting it 10 minutes at the end of each hour. Turn off your TV, youtube, GF or BF. Turn on aggressive classical music - it wires the brain for math. Some people study best in the mornings – know your learning style. Avoid heavy foods before class and study. Drink plenty of water and eat almonds, raisins, yogurt, veggies to combat tiredness. You are what you eat! Walk abit before class.

*INCOMPLETES:* Incompletes (I) are given only for serious and verifiable reasons. You must also have a current grade of C or greater when requesting one.

*TUTORING:* My Office Hours. Khanacademy.org

*DROPPING THE CLASS: I will drop you if you miss four lectures without notifying me.* Dropping *after the posted drop date* will result in a "W" on your transcript. **Effective July 1, 2012** students have only 3 attempts to pass a class. A grade of "D", "F", "I", or "NP" in a class, or a"W", will count as an attempt. ZOOM/CANVAS keeps track.

*OFFICIAL TEXT: ,OpenStax College Physics, 2e https://openstax.org/details/books/college-physics*

*HIGHLY RECOMMENDED TEXT*: *Physics: Principle and Applications* ISBN-13: 978-0-321-86911-1, 7th ed, Giancoli ©2014 Pearson {The course is designed around this text. Many used copies available for low price.}

*WEBSITES:* Instructor's Website, *OpenStax College Physics Text , Our Physics Reserve.*

*CALCULATOR:* On those tests allowing a calculator NO electronic device, graphing calculators nor other big fat programable calculators are allowed. *Instead you may use a basic scientific such as the* TI-30XA *or equivalent*.

*REQUIRED HARDWARE*: A computer, or laptop or larger sized-tablets (8" diagonals or more) are required to participate in this class. LACC offers laptops for students that need them. Smartphones and small tablets are not allowed – their screens are too small to have the necessary resolution to view exams and lectures.

*REQUIRED APP:* If we are forced to go remote and we need to scan I require a scanning app that puts a time stamp on your pdf document (camscanner does not) "Genius Scan" is the one I use to scan and post the lecture notes. This app converts multiple color images (pages) to a single **lightweight** black and white PDF file. You must be able to scan individual HW sections, Labs or Exams 'page-by-page' and then submit them to CANVAS as a **single** PDF document.

*THE NOTEBOOK*: I'm telling you a secret I wish I knew about at the start of my college education – *Take your notes in a composition book!* Other methods have flaws that make them short lived – composition books last. The only notes from my 10 years of college that are still on my shelves are those taken in composition books.

1. Cut out and keep your syllabus taped to the first pages for rapid reference.
2. Keep a HW log of what was assigned and what you have completed (just cut'n paste the HW Syllabus into your notebook.
3. Keep a Table of Contents. Write Sections down and your homemade page numbers you make as you go along.
4. Then you have the Chapter notes: section by section.
5. Cut'n tape 'recipes' in-between your note book pages. (( See Notebooks examples ))

**Course:** PHYSICS 006

**Title:** General Physics I

## Course Description

Students learn the fundamentals of Newtonian physics, such as mechanics, heat, and sound. This course is designed for majors in Health and Life Sciences, Architecture, and all those needing a one-year course in college physics requiring trigonometry but not calculus.

## Units/Transferability

4 units transferable to UC/CSU

## Prerequisites/Co-requisites/Advisories

Prerequisite(s): MATH 240 or MATH 258. No Corequisite . No Advisory .

## Course Student Learning Outcomes

1 . Analyze and solve given problem(s) related to a variety of physical systems and situations including Mechanics, Heat and Sound. 2 . Conduct experiments involving the principles of physics, analyze data, and report results.

## Grading Scale or Criteria

A - Excellent
B - Good
C - Satisfactory
D - Less than satisfactory
F - Failing
P - Pass; at least equivalent to a “C” grade or better
NP - Not Pass; equal to “D” or “F” grade

## Drop and Repeats

Effective July 1, 2012 students are allowed three (3) attempts to pass a single class within the Los Angeles Community College District. If a student gets a “W”, “D”, “F”, or “NP” as a grade in a class, that counts as an attempt. If you think you will not be able to complete this course with a C or better, please drop by the due date.

*For all important dates make sure to visit https://www.lacitycollege.edu/academics/calendars*

## Attendance Policy

Students who are registered and miss the first time the class meets may lose their right to a place in the class. Whenever students are absent more than 10% of the total meeting days of the class, the instructor may exclude them from class. If the instructor determines that there are no mitigating circumstances that may justify the absences, the instructor may exclude a student from the class. Students are responsible for officially dropping a class that they stop attending.

## Financial Aid

If you need help paying for books and other college expenses, call the Financial Aid Office at (323) 953-4000 ext.2010 or email finaid@lacitycollege.edu.

## Accommodations

Students with a verified disability who may need authorized accommodation(s) for this class are encouraged to notify the instructor and the Office of Special Services (323-953-4000, ext.2270 or email oss@lacitycollege.edu). Visit OSS on Cranium Café https://lacc.craniumcafe.com/ or the OSS website: https://www.lacitycollege.edu/student services/spr/oss

## Library

Library Digital Materials Accessibility
The LACC Library provides online access to databases, eBooks, full-text articles, streaming videos, research skills workshops, and 24/7 reference chat for research support.

If you cannot fully access the materials on any page on our site or in our databases, please contact the library by email at mlklibrary@lacitycollege.edu, by phone at 323-953-4000 extension 2406, or in-person during library hours. Please include the nature of the accessibility issue (including the name of the database), the location of the material with which you are having difficulty, and your contact information. There may be an alternative accessible format of the information available, an alternative solution identified, or improvements that can be made to make the information accessible.

Additional individualized accommodations may be available through the Office of Special Services (OSS). Students do not need to be signed up with OSS to select alternative assignments that do not use the product with identified accessibility barriers when an alternative solution for a product requires that alternative assignments be made available for all students.

Please see the Equally Effective Alternate Access Plan (EEAAP) guide https://libguides.wlac.edu/eeaaps for specific alternative solutions for each of our electronic library databases.

Check the library webpage (http://library.lacitycollege.edu) for hours and updates.

### Student Code of Conduct

Violations of academic integrity include, but are not limited to, the following actions: cheating on an exam, plagiarism, working together on an assignment, paper or project when the instructor has specifically stated students should not do so, submitting the same term paper to more than one instructor, or allowing another individual to assume one's identity for the purpose of enhancing one's grade (see LACCD Board Rule 9803.28). Penalties may include a grade of zero or "F" on an exam or paper, or even suspension from the College.

### Prohibited Discrimination

The policy of the Los Angeles Community College District is to provide an educational, employment and business environment free from Prohibited Discrimination, as defined by Board Rule 15003. Employees, students, or other persons acting on behalf of the District who engage in Prohibited Discrimination as defined in this policy or by State and Federal law shall be subject to discipline, up to and including discharge, expulsion, or termination of contract. The specific rules and procedures for reporting allegations of Prohibited Discrimination and for pursuing available remedies are included in Administrative Regulation C-14. A copy may be obtained from the Deputy Title IX Coordinator or from the District's Office for Diversity, Equity, and Inclusion.

Any member of the Los Angeles City College community, which includes students, faculty, and staff, who believes, perceives, or actually experiences conduct that may constitute prohibited discrimination, has the right to seek the help of the College. Every employee has the responsibility to report such conduct to the Title IX Coordinator or the District's Office of Diversity, Quity, and Inclusion when it is directed toward students. Potential complainants are advised that administrative and civil law remedies, including but not limited to injunctions, restraining orders or other orders, may be made available. For assistance, contact the Deputy Title IX Coordinator at (213) 891-2315, or SpeakUp@lacitycollege.edu, or Diversity-Programs@email.laccd.edu.