

## Recommended First Quarter Schedule

Course	Units
MAT 21A*	4
Entry Level Writing Course (ELWR)^ or Lower Division College English Composition	4-4.5
PHY 9HA or GE Course**	3-5
GE Course or First Year Seminar	1-3
<b>Total Units:</b>	<b>12 - 16</b>

### Alternative Courses

*Alternate MAT course may be required depending on Math Placement Exam results, transfer work, and/or AP/IB score.
^ Students should not take GE or major courses with Writing Experience (WE) until ELWR is satisfied.
** <b>For students with previous experience with Calculus:</b> Honors Physics (PHY 9HA) is highly recommended for your first quarter.

### First Quarter Schedule Notes:

- For those enrolled in MAT 21A, PHY 9HA is recommended if students have previous experience with calculus in High School and are comfortable using calculus on this level in PHY 9HA. Otherwise, students should take the PHY 9 series, starting with PHY 9A in the Spring Term, as MAT 21D is a prerequisite for PHY 9C.
- For students in MAT 21B, 21C, or 21M, PHY 9HA is also recommended.
- A student can change from PHY 9HA to the regular PHY 9 series only after taking PHY 9HA (not any later in the series).

## Placement Exams

### Required

**Math:** All students who register in MAT 12, 16A, 17A, or 21A are required to take the Math Placement Exam and receive a qualifying score.

**Chemistry:** Required only for those pursuing the Chemical Physics concentration. All students who register in CHE 2A or CHE 2AH are required to take the Chemistry Placement Exam and receive a qualifying score.

**Computer Science:** Required only for those pursuing the Computational Physics concentration and plan to take ECS 36A. All students who register in ECS 36A are required to take the Computer Science Placement Exam and receive a qualifying score OR receive a C- or higher in ECS 32A. ECS 32A does not require the Computer Science Placement Exam.

### Not Required

**Foreign Language:** The Applied Physics B.S. major does not require the Foreign Language Placement Exam. If you plan to take Foreign Language courses, be sure to review placement requirements prior to enrollment.

## Recommended First Year Goals

- Meet with an Applied Physics major advisor to create an academic plan.
- Confirm with your advisors how any transfer work or AP/IB credit will affect your major requirements.
- Consider joining the Physics Club!

## AP/IB Exams and Major Requirements

AP/IB Exams	Score	UCD Course	Can repeat for credit at UCD?
AP Calculus AB	4, 5	MAT 16A, 17A, or 21A	Yes; recommended to repeat if student would like to review and get exposure to MAT at UC Davis.
AP Calculus BC	4	MAT 16A, 17A, or 21A	Yes; recommended to repeat if student would like to review and get exposure to MAT at UC Davis.
AP Calculus BC	5	MAT 16A/B, 17A/B, or 21A/B	Yes; recommended to repeat at least the “B” course in the series if student would like to review and get exposure to MAT at UC Davis.
IB HL Mathematics	6, 7	MAT 21A/B	Yes; recommended to repeat at least the “B” course in the series.*
IB HL Mathematics	5, 6, 7	MAT 16A/B or 17A/B	Yes; recommended to repeat at least the “B” course in the series.*
AP Physics 1	4, 5	PHY 1A/1B	<b>No</b> ; PHY 1A/B is not a major requirement, but if students take PHY 9A, they will only receive 2 units of credit. PHY 9HA recommended.
AP Physics 2	4, 5	PHY 1A	<b>No</b> ; PHY 1A is not a major requirement, but if students take PHY 9A, they will only receive 2 units of credit. PHY 9HA recommended.
AP Physics B	4, 5	PHY 1A/1B	<b>No</b> ; PHY 1A/B is not a major requirement, but if students take PHY 9A, they will only receive 2 units of credit. PHY 9HA recommended.
AP Physics C1 – Mechanics	4, 5	PHY 1A	<b>No</b> ; PHY 1A is not a major requirement, but if students take PHY 9A, they will only receive 2 units of credit. PHY 9HA recommended.
IB Physics	5, 6, 7	PHY 1A/B	<b>No</b> ; PHY 1A/B is not a major requirement, but if students take PHY 9A, they will only receive 2 units of credit. PHY 9HA recommended.

**Please note: This chart only covers scores that yield major credit for Applied Physics.**

For the most up-to-date list of all AP and IB scores and their credit at UC Davis, please refer to the charts available on the UC Davis Admissions website. <https://www.ucdavis.edu/admissions/undergraduate/freshman/exam-requirements>

### Additional Information:

The Applied Physics major offers concentration in the following areas:

- Computational Physics
- Chemical Physics
- Materials Science
- Physical Oceanography
- Atmospheric Physics
- Geophysics
- Physical Electronics

For more information, consult with the Applied Physics major advisor.