

## College of SCIENCE Department of PHYSICS Minor in ASTRONOMY For students graduating in calendar year 2021

The Minor in Astronomy requires the completion of 19 credit hours.

Required courses (16 credit hours)			
PHYS 1055 Introduction to Astronomy	3 🔲	Select 3 credit hours from the list below:	
PHYS 1056 Introduction to Astronomy	3 🔲	PHYS 3355 Intermediate Mechanics	3 🔲
PHYS 1155 Astronomy Laboratory	1 🔲	PHYS 3405 Intermediate Electricity and Magnetism	3 🔲
PHYS 1156 Astronomy Laboratory	1 🔲	PHYS 4504 Introduction to Nuclear and Particle Physics	3 🔲
PHYS 3154 Observational Astrophysics	2 🔲	PHYS 4574 Nanotechnology	3 🔲
PHYS 3655 Introduction to Astrophysics I	3 🔲	PHYS 4614 Optics	3 🔲
PHYS 3656 Introduction to Astrophysics II	3 🔲	PHYS 4654 Modern Cosmology	3 🔲
		PHYS 4674 Introduction to General Relativity	3 🔲
		PHYS 4714 Introduction to Biophysics	3 🔲
		PHYS 4755 Intro to Computational Physics	3 🔲
		PHYS 4774 Intro to Physics of Galaxies	3 🔲
		BIOL 2104 Cell and Molecular Biology	3
		BIOL 2704 Evolutionary Biology	3
		GEOS 3114 Introduction to Meteorology	3 🔲
		GEOS 4154 Earthquake Seismology	3 🔲
		GEOS 4714 Volcanoes and Volcanic Processes	3 🔲
		AOE 4134 Astromechanics	3 🔲
		ECE 4114 Antennas	3 🔲
		ECE 4124 Radio Wave Propagation	3 🔲
		ECE 4144 Introduction to Optical Information Processing	_
		ECE 4604 Applied Spectral Analysis and Filtering	3 🔲
		ESM 3016 Fluid Mechanics II	3 🔲
		ESM 3024 Introduction to Fluid Mechanics	3 🔲
		ESM 4524 Introduction to Wave Motion	3 🔲

Total 19 credit hours.

## II. Prerequisites and/or Corequisites

For the courses listed above, prerequisites and/or corequisites may apply. Be sure to consult the University Course Catalog or check with your advisor.

## III. Minimum GPA

For the courses attempted by the student for this minor, the student's GPA must be 2.0 or higher.

## IV. Accepted Substitutions

PHYS 3355: AOE 4134 (Astromechanics), or ESM 3124 (Dynamics II Analytical and 3-D Motion).

PHYS 3405: ECE 3105 (Electromagnetic Fields).