

forms and their ground in the “good “ and Aristotle’s “being” and its ground “presence.”
Prerequisite(s): PHIL 1000 with a grade of C or better and permission of instructor.

PHIL 4031 *19th Century European Philosophy (3-0-3)*
A critical analysis of the major ideas and theories of significant 19th century European philosophers such as Hegel, Schopenhauer, Marx, Nietzsche and Kierkegaard.
Prerequisite(s): PHIL 1000 with a grade of C or better.

PHIL 4032 *20th Century Philosophy (3-0-3)*
A study of selected philosophers and philosophical issues, problems, questions and schools of thought in the 20th century. *Prerequisite(s): PHIL 1000 with a grade of C or better.*

PHIL 4033 *17th and 18th Century Philosophy (3-0-3)*
A study of some of the significant thinkers from the early modern period of philosophy such as Descartes, Leibniz, Spinoza, Locke, Berkeley and Hume; selected topics include epistemology, philosophy of science, metaphysics and philosophy of mind.
Prerequisite(s): PHIL 1000 with a grade of C or better.

PHIL 4111 / ANTH 3861 / HIST 4111 *History of World Religions (3-0-3)*
This is a survey course introducing the study of religion. The students will define what “religion” is, examine why so many people in the history of the world find religion important, and try to understand some of the major tenets of the religions of the world. This course is designed with the theme of ethics and morals as defined by cultures and religions around which many of the readings and discussions will take place. *Prerequisite(s): Junior or Senior standing or permission of instructor.*

PHIL 4900 *Cullum Lecture Series (3-0-3)*
A variable-content course that offers lectures by nationally and internationally known scholars with expertise in the particular topic. Students will also attend films and participate in class discussions, as well as prepare a relevant student project with approval of the chair. *Prerequisite(s): PHIL 1000 with a grade of C or better.*

PHIL 4950 *Selected Topics (3-0-3)*
An intensive study of a selected philosophical issue, problem or school of thought not addressed in the current curriculum. *Prerequisite(s): PHIL 1000 with a grade of C or better.*

PHIL 4990 *Undergraduate Research (3-0-3)*
Independent research that focuses on a particular philosophical theme or philosopher of the student’s choice under the direction of the philosophy instructor. Emphasis will be on the development of sound philosophical ideas and approaches.
Prerequisite(s): PHIL 1000 and three additional philosophy courses with a grade of C. Chair and instructor’s permission required.

PHSC - Physical Science Courses

PHSC 1011 *Physical Science I (3-2-4)*
A survey of physics including motion and energy. May include heat, sound, light, electricity, magnetism, relativity, atoms and nuclei. Simple applications in problem

solving. Designed for the non-technical student. *Prerequisite(s): Recommended but not required: MATH 1101 or MATH 1111.*

PHSC 1012 *Physical Science II (3-2-4)*
A study of the constituent materials and properties of the earth’s surface, interior and atmosphere; the solar system; galaxies; and the universe. Physical principles from PHSC 1011 are applied. Designed for the non-technical student. *Prerequisite(s): Recommended but not required: PHSC 1011.*

PHYS - Physics Courses

PHYS 1111 *Introductory Physics I (3-2-4)*
A trigonometry-based study of mechanics, heat, waves and sound. Emphasis on problem solving. Credit may not be earned for both PHYS 1111 and PHYS 2211.
Prerequisite(s): MATH 1113 (C or better).

PHYS 1112 *Introductory Physics II (3-2-4)*
A trigonometry-based study of electricity and magnetism, light, and modern physics. Emphasis on problem solving. Credit may not be earned for both PHYS 1112 and PHYS 2212. *Prerequisite(s): PHYS 1111 or 2211.*

PHYS 1950 *Selected Topics (V)*
Concepts/topics in special areas of physics. May be repeated for credit.
Prerequisite(s): Permission of the instructor.

PHYS 2211 *Principles of Physics I (3-3-4)*
A calculus-based study of mechanics, heat, waves and sound. Emphasis on problem solving. Credit may not be earned for both PHYS 2211 and PHYS 1111.
Prerequisite(s): (Co-requisite) MATH 2012 concurrently.

PHYS 2212 *Principles of Physics II (3-3-4)*
A calculus-based study of electricity and magnetism, light, and modern physics. Emphasis on problem solving. Credit may not be earned for both PHYS 2212 and PHYS 1112. *Prerequisite(s): PHYS 2211.*

PHYS 2950 *Selected Topics (V)*
Concepts/topics in special areas of physics. May be repeated for credit.
Prerequisite(s): Permission of the instructor.

PHYS 3011 *Electronics I (2-4-4)*
Alternating current theory, filters, wave-shaping, power supplies, transistors, amplification, integration, feedback, operational amplifiers and their application. Applicable solid-state theory will also be discussed. *Prerequisite(s): PHYS 2212 (C or better)*

PHYS 3012 *Electronics II (2-4-4)*
Logic gates, multiplexing, flip-flops, counters, open collector and tri-state logic, analog-to-digital converters, data-logging systems. *Prerequisite(s): PHYS 3011 (C or better)*

PHYS 3040 *Advanced Optics (3-3-4)*
Geometric properties of light. Reflection and refraction at boundaries. Thin and thick lenses. Wave optics, diffraction and interference. Spectroscopy and absorption of light. Polarization. Modern optical techniques. *Prerequisite(s): PHYS 2212 (C or better)*

PHYS 3251 *Theoretical Mechanics I (3-0-3)*
Newtonian mechanics. Vector algebra, vector analysis. Particle kinematics and dynamics in one, two and three dimensions. Motion of a system of particles. Simple, damped and forced harmonic motion. Rigid body motion. *Prerequisite(s): PHYS 2211 (C or better), MATH 3020.*

PHYS 3252 *Theoretical Mechanics II (3-0-3)*
Gravitational field and potential. Moving coordinate systems, rotational motion and Coriolis force. Mechanics of continuous media. Lagrange's equations. Hamilton's equations. *Prerequisite(s): PHYS 3251 (C or better), MATH 3020.*

PHYS 4051 *Electromagnetic Theory I (3-0-3)*
Vector analysis. Electrostatics and Gauss' law. Poisson's and Laplace's equations applied to Electrostatics problems. Electric fields, energy and potential. Dielectrics and electrical properties. Currents and magnetic fields. *Prerequisite(s): PHYS 2211 (C or better), MATH 3020.*

PHYS 4052 *Electromagnetic Theory II (3-0-3)*
Magnetization, magnetic fields and properties of matter. Electromagnetic induction. Maxwell's equations and applications. Electromagnetic radiation, propagation of electromagnetic waves in free space and in dielectric materials. *Prerequisite(s): PHYS 4051 (C or better), MATH 3020.*

PHYS 4310 *Thermal Physics (3-0-3)*
Thermodynamics and the relation between microscopic systems. Statistical descriptions of microscopic systems. Equilibrium, reversible processes, heat and temperature. Ideal gas, specific heats, expansion or compression, and entropy. Equipartition of energy. *Prerequisite(s): PHYS 2211 (C or better), MATH 3020.*

PHYS 4530 *Mathematical Methods of Physics (3-0-3)*
Apply mathematical techniques to specific physics problems. Vector theorems. Variational calculus. Special functions. Applications of partial differential equations and integral transforms to problems in physics. Complex variables. Tensors and eigenvalue problems. *Prerequisite(s): PHYS 2212 (C or better), MATH 3020.*

PHYS 4511 *Quantum Physics I (3-2-4)*
Theory of Special Relativity. Quantum Physics: Blackbody radiation, Photoelectric effect, Compton effect, X-rays; Bohr model of the atom; wave properties of matter; the uncertainty principle. *Prerequisite(s): PHYS 2212 (C or better).*

PHYS 4512 *Quantum Physics II (3-2-4)*
Schroedinger equation in three dimensions, angular momentum, atomic and molecular spectroscopy, nuclear structure, radioactivity, transitions, and Interactions of radiation with matter. *Prerequisite(s): PHYS 4511 (C or better).*

PHYS 4900 *Cullum Lecture Series (V, 1 to 5)*
Students will hear lectures by nationally and internationally known scholars with expertise in the topic chosen for each spring term, will attend films and/or panel discussions and will submit written assignments. *Prerequisite(s): Permission of the instructor.*

PHYS 4950 *Selected Topics (V)*
Concepts/topics in special areas of physics. May be repeated for credit. *Prerequisite(s): Permission of the instructor.*

PHYS 4960 *Undergraduate Internship (V, 1 to 15)*
An internship is a service-learning experience based in an institution or agency, emphasizing the completion of a specific task and the acquisition of specific knowledge and skills under the supervision of Augusta State University and the cooperating institution or agency. *Prerequisite(s): Permission of the instructor.*

PHYS 4990 *Undergraduate Research*
Individual modern physics research. A minimum of three hours of laboratory work per week for each semester hour of credit. Report/thesis required. May be repeated for credit. *Prerequisite(s): Permission of the instructor.*

PLCP - Paralegal Courses

PLCP 0081 *Introduction to Law*
3 hour institutional credit course in Paralegal Certificate Program. Recognition of legal issues; structure of the judicial system; fundamentals of legal practice and the role of the paralegal; introduction to methods and resources of legal research with outside research projects. *Prerequisite(s): Permission of the Paralegal Program Director.*

PLCP 0082 *Civil Litigation*
3 hour institutional credit course in Paralegal Certificate Program. Introduction to basic principles of procedural discovery; practical considerations of pleadings; discovery and motions; pretrial preparation and trial procedures. *Prerequisite(s): PLCP 0081. Prerequisite(s): Permission of the Paralegal Program Director.*

PLCP 0083 *Business Organizations/Corporations*
3 hour institutional credit course in Paralegal Certificate Program. This course will include instruction in practice of forming business corporations, partnerships, and sole proprietorships; maintenance of a business corporation's legal books and financial data; drafting employer-employee contracts and pension plans; application of state and federal laws and regulations to the respective business entities. *Prerequisite(s): PLCP 0081 and Permission of the Paralegal Program Director.*

PLCP 0084 *Property & Estates*
3 hour institutional credit course in Paralegal Certificate Program. Introduction to two major areas of law. Part I will cover real estate. Part II will cover the preparation of wills and trusts. *Prerequisite(s): PLCP 0081 and Permission of the Paralegal Program Director.*