

COURSE DESCRIPTIONS

Degree: Bachelor Science

Major: Aviation Science

- AVS 110 The History of Flight. – 3 credit hours
Explore flight from the Mythology of Icarus to the modern marvels of space flight and the people involved in developing the equipment and machines.
- AVS 118 Modern Careers in Aviation. – 3 credit hours
Explore the careers in ground operations, maintenance, manufacturing, inspection, flight, airport service, airport operations, parts, sales, education, and within the regulatory agencies.
- AVS 120 Theory of Flight. – 3 credit hours
Discover how aircraft fly and how control is maintained. Examine the wing plans, empennage design, the purpose of trim tabs and the effects during flight, drag, lift, weight and thrust included.
- AVS 120L Theory of Flight Experimental Learning. – 1 credit hour
Practical application of the theory of flight in the laboratory environment
Co requisite: AVS 120
- AVS 135 Aircraft Construction and Materials. – 3 credit hours
Investigate the variety of construction designs and methods, materials used, strength of the materials, beginning with the wood through composite technology.
- AVS 135L Aircraft Construction and Materials Lab. – 1 credit hour
Materials testing, fabrication, design layout and detail assembly
Co requisite: AVS 135
- AVS 210 Airport Management and FBO Operations. – 3 credit hours
An examination of the issues faced by airports and FBOs'; labor negotiations, security, public safety, FAA, EPA, TSA, customs, background checks and community issues.
- AVS 300 Aviation Law. – 3 credit hours
The purpose of this course is to increase the student's knowledge of aviation law and regulations. Particular attention will focus on the American legal system; important legal concepts, regulators of the industry and international aviation law.
- AVS 305 Loss Control Techniques. – 3 credit hours
Explore proprietary and contract security, asset protection, loss prevention and security measures in aviation; examine the health, injury and wellness program issues.
- AVS 315 Information Management. – 3 credit hours
Concentration on departmental and corporate information systems, networking, electronic mail, analysis of business systems, decision systems, management decision and problem solving processes.
- AVS 320 FAA Regulations. – 3 credit hours
Procedural Rules for airports, commercial carriers, flight schools, training centers, repair stations, air taxi and on demand operators, administrative regulations, and aviation proceedings.
- AVS 494 Senior Seminar. – 1 credit hour

Contemporary issues, professionalism, opportunities and ethical responsibilities in aviation. Prerequisite: completion of 30 hours in Aviation and the declaration of either the minor or major or consent of the instructor.

New Classes from Portales Catalog

- CHEM 3xxx** Aviation Chemistry. – 3 credit hours
An examination of the chemicals that are used in aviation; fuels, paint, composites, pesticides, weed control, sanitation, emissions from equipment, Personal Protections Equipment requirements, MSDS information and EPA regulations.
- PHY 3xx** Aviation Physics. – 3 credit hours
Algebra-based technical physics emphasizing applications to aviation. Includes laws of motion, fluid motion, gas laws, waves, basic electricity and magnetism. Prerequisite: proficiency with algebra