Course Description

ATT2820 | Air Traffic Control | 3.00 credits

The basic elements of air traffic control operations, providing the necessary foundation for successful completion of the Air Traffic Control Basic Certification Examination. Prerequisite: sophomore standing in major program.

Course Competencies:

Competency 1: The student will demonstrate knowledge and understanding of the subject matter relating to air traffic control (ATC) by:

1. Recalling the history of the federal aviation administration
2. Identifying aircraft separation requirements, including the different types of separations used every day by controllers to safely, orderly, and expeditiously separate thousands of aircraft within the National Airspace System (NAS)
3. Explaining notices to airmen (NOTAM), their purpose, pilot, and controller responsibilities regarding them, and the various publications in which notes are found
4. Discussing the various orders, manuals, letters of agreement, standard operating procedures, and federal aviation regulations that govern air traffic control (ATC)
5. Interpreting visual flight rules (VFR) charts, instrument flight rules (IFR) charts, and other publications pilots use in everyday navigation

Competency 2: The student will demonstrate the ability to analyze and interpret the following (ATC) documentation by:

1. Providing insight into the pilot's environment, including training, flight operations, regulations, and standard procedures
2. Breaking down pilot reports (PIREP). H. Demonstrating ATC essential communications, including the need for good communications and proper procedures

Competency 3: The student will demonstrate proficiency in ATC communications by:

1. Issuing clear and concise commands to aircraft in various situations using a simulator or as part of the instructor's oral/written examination
2. Providing a detailed, standard position relief briefing using a simulator or as part of an oral/written examination by the instructor
3. Demonstrating reasoned, decisive procedures to be implemented in case of emergency/abnormal situations
4. Shaping communications to purpose, audience, and occasion

Learning Outcomes:

- Communicate effectively using listening, speaking, reading, and writing skills
- Use quantitative analytical skills to evaluate and process numerical data
- Use computer and emerging technologies effectively