

Course Overview: AF JROTC 200

Content Area:
Course(s):
Time Period: **Year**
Length: **180**
Status: **Published**

Summary

Aerospace Science 200:

The Science of Flight: A Gateway to New Horizons 2nd Ed.

The *Aerospace Science 200, The Science of Flight: A Gateway to New Horizons, 2nd Edition*, course has been completely rewritten to include the latest information and teaching philosophies, incorporating 21st century learning strategies. This new course provides students with up-to-date information on exploring the fundamentals of the science of flight. It all starts with an introduction to the principles of flight. Students will explore aircraft design, flight control, and aircraft power options. In addition, students explore weather concepts, the effects of flight on the human body, and how to navigate during flight. Finally, students will investigate the safety of flight and possible career options in the aviation industry.

This textbook is intended for high school students and complements material taught in high school history, science, and social studies courses.

The course contents have been correlated using Common Core State Standards for English Language Arts and Literacy (CCSS.ELA-Literacy) in History/Social Studies, Science, and Technical Subjects developed by the Common Core State Standards Initiative, International Society for Technology in Education (ISTE) Standards for Students (listed for technology activities), Next Generation Science Standards (NGSS), Common Core State Standards for Math, National Geography Standards by the National Council for Geographic Education, National Health Education Standards provided by CDC Healthy Schools, and Math Standards and Expectations by National Council of Teachers of Mathematics.

The course outcomes are:

1. Examine the key principles of flight and how aircraft are designed to take advantage of the principles of flight.
2. Examine the current and future methods for powering aircraft.
3. Analyze weather patterns and their effects on flight.
4. Evaluate the impacts of different flight regimes on the human body and methods for protecting humans during flight.
5. Evaluate the fundamental principles of flight navigation.
6. Examine the key aspects of flight safety and potential careers in the aviation industry.

The Science of Flight: A Gateway to New Horizons, 2nd Edition

Chapter	Content	Recommended Hours
Chapter 1	Dynamics of Flight	14
Chapter 2	Powering the Aircraft of Today and the Future	14
Chapter 3	Flight Conditions	12
Chapter 4	Flight and the Human Body	14
Chapter 5	Navigating the Skies	12
Chapter 6	Flight Safety and Careers	6

Leadership Education 200: Communication, Awareness, and Leadership 2nd Ed.

Leadership Education 200: Communication, Awareness, and Leadership, Second Edition, is a customized course designed to improve communication, enhance awareness of self and others, and provide fundamentals of leadership and followership. The course focuses on the AFJROTC mission to “develop citizens of character dedicated to serving their nation and community.” Woven throughout is the underlying theme of developing personal integrity. The course also emphasizes leadership and values such as service and excellence. This update incorporates 21st-century teaching, learning, and skills of critical thinking, communication, collaboration, and creativity.

Each lesson includes a “Quick Write” reading and writing activity related to the lesson; a “Learn About” that tells students what they will learn from the lesson; a list of vocabulary words in the lesson; “Talking Points” that highlight specific and interesting facts. The lessons close with a “Checkpoints Lesson Review” that allows students to review what they’ve learned. At the end of the “Checkpoints” is an “Applying Your Learning” section with a discussion question that gives students a chance to apply what they have learned and reinforce their understanding of the lesson’s content.

Course Outcomes:

1. Analyze the key factors in communication and critical thinking.
2. Apply the elements of effective writing and public speaking.
3. Analyze the importance of attitude in daily life.
4. Evaluate the ways in which personality and behavior affect relationships with others.
5. Analyze the foundation for an effective team.
6. Apply effective problem-solving and consensus-building methods.
7. Analyze the Air Force leadership model.
8. Evaluate effective leadership and followership.

Leadership Education 200: Communication, Awareness, and Leadership, 2nd Edition

Chapter	Content	Recommended Hours
Chapter 1	Learning and Communication	5
Chapter 2	Communicating Effectively	5
Chapter 3	Understanding Your Attitude	5
Chapter 4	Understanding Your Actions	5
Chapter 5	Developing Vision and Teams	5
Chapter 6	Solving Conflicts and Problems	5
Chapter 7	A Leadership Model	5
Chapter 8	Adaptive Leadership	5

Drill and Ceremonies: Drill Curriculum (Cumulative)

The Drill and Ceremonies manual is used to teach the Drill Curriculum (Cumulative) course by providing an in-depth introduction to drill and ceremonies. The course concentrates on the elements of military drill, and describes individual and group precision movements, procedures for saluting, drill, ceremonies, reviews, parades, and development of the command voice. Cadets are provided with detailed instruction on ceremonial performances and protocol for civilian and military events and have the opportunity to learn drill. Though each class will follow an established lesson plan, most of the work is to be hands-on. Instructors are provided DAF Pamphlet 34-1203 to teach the Drill and Ceremonies course and may download the latest version from Air Force e-pubs website (<https://www.e-publishing.af.mil/>). In addition, instructors may order the Army Field Manual 3-21.5 and the Interservice Cross-Index Drill Manual to supplement the teaching of Drill and Ceremonies.

The course objectives:

After successfully completing *DAF Pamphlet 34-1203: Drill and Ceremonies*, the student will:

1. Know the importance of drill and ceremonies.
2. Know basic commands and characteristics of the command voice.
3. Apply and execute the concepts and principles of basic drill positions and movements.
4. Know when and how to salute.
5. Apply the principles and procedures of drill movements used with smaller units to the movement of a squadron.
6. Know the function of the group and the wing.
7. Know how groups and wings are formed.
8. Know the purpose and definition of ceremonies and parades.

WELLNESS PROGRAM

Wellness is an official and integral part of the Air and Space Force Junior ROTC program. Wellness curriculum is instrumental in developing citizens of character dedicated to serving our nation and communities. The program is provided as a tool to help develop individualized fitness programs for your cadets. Cadets will be given the opportunity to put into practice the wellness concepts that are taught in Leadership Education 100. Instructors are encouraged to include team sports to keep the Wellness Program fun and motivating. Team sports also provide cadets with the opportunity to develop leadership skills and build esprit de corps. Instructors are also encouraged to utilize sites, such as the following, to help develop lesson plans and fitness activities:

The Wellness Program provides a list of 19 exercises with examples that may be utilized in a 36-week program modifiable to help provide variety and meet individual and district/state goals. Instructors should utilize fitness programs that best fit the requirements within their district/county/state. HQ AFJROTC offers suggested fitness programs that will assist instructors with developing a comprehensive fitness program. Cadet fitness improvement is rewarded by earning the Health and Wellness Ribbon.

The course objective for the Wellness Program is to:

Motivate JROTC cadets to adopt active, healthy lifestyles beyond program requirements and into their adult lives.

The goals of the Wellness Program are to:

1. Create an individualized fitness program based on national standards by age and gender.
2. Identify areas of improvement for each cadet and provide guidance for improvement.
3. Incorporate a physical fitness and wellness education program to reach fitness goals.

Air Force JROTC Fitness Challenge

Regular physical activity in adolescents promotes health and fitness. Compared to those who are inactive, physically active youth have higher levels of cardiorespiratory fitness and stronger muscles. Their bones are stronger, and they may have reduced symptoms of anxiety and depression. Youth who are regularly active also have a better chance of a healthy adulthood. They also typically have a lower Body Mass Index (BMI). Higher BMIs increase the risk for certain diseases such as heart disease, high blood pressure, type 2 diabetes, gallstones, breathing problems, and certain cancers may develop. Adolescents don't usually develop chronic diseases; however, risk factors for these diseases can begin to develop early in life. Regular physical activity makes it less likely risk factors will develop and more likely that adolescents will remain healthy as adults.

