



# AIRCRAFT DESIGN



**ASEN 4138**

**Fall Semester 2022**

## Class Times

## Section Number

- **Lecture Sections:** M & W 9:35am – 10:25am (010)  
All lectures in room AERO 114.
- **Laboratory Sections:** F 10:30am – 12:20am AERO N100 (011)  
F 12:40am – 2:30am AERO N100 (012)

## Prerequisites

- ASEN 3128, Aircraft Dynamics

## Textbook

- Raymer, Daniel P., *Aircraft Design: A Conceptual Approach*, 6<sup>th</sup> Edition, AIAA Education Series, Reston, Virginia, 2018.

## References

- See Canvas document - these books are available in the Engineering Library.

## Instructor

- Dr. Donna Gerren (Dr. G)
- E-mail address: [donna.gerren@colorado.edu](mailto:donna.gerren@colorado.edu)
- Office: N 203
- Office phone: (303)735-4870
- Office hours: M 3:00pm – 5:00pm  
W 3:00pm – 4:00pm  
Th 8:00am – 9:00am  
Also available during lab sessions or by appointment.

## Grading

- Class is worth 1,000 points total.
- Homework - none
- Exams – none
- Four written design reports - each report worth 225 points (90% of class grade) – peer evaluations by myself and your design partner (combined) can affect up to +/- 5% of each of your report grades.
- Oral presentation at the end of the semester - 100 points (10% of class grade). Again, peer evaluations by myself and your design partner (combined) can affect up to +/- 5% of your presentation grade.
- Attendance for final class presentations is required: 5 points will be docked from your presentation grade for nonattendance unless excused. This has resulted in a reduced semester grade.

**NOTE:** Some presentations will take place during this course's final exam time, Wednesday, December 14<sup>th</sup>, from 7:30pm – 10 pm.

## General Comments

- Keep cell phones silent during class.
- The following are **tentative** due dates for each report:

Design Report 1: Monday, September 26<sup>th</sup> due by 5pm

Design Report 2: Monday, October 24<sup>th</sup> due by 5pm

Design Report 3: Sunday, November 20<sup>th</sup> due by 11:59pm

Design Report 4: Tuesday, December 13<sup>th</sup> due by 5pm

- Unexcused late reports WILL BE penalized 5 points for each late day.
- All reports must be prepared with a word processor and adhere to the design report requirements e-mail handout. All drawings must be done using a software program – no hand sketches. Points will be taken off unprofessional reports, even if the technical content is correct.
- **ADVICE:** Get started on your first report right away - September 26<sup>th</sup> will be here before you know it. Get started on the next report as soon as you've handed in the previous report. Keep a rough draft of the report just handed in as it takes a while to grade and return them to you – you may need some calculations or values from that report to continue work on your design. **Back up your files regularly and have several backup or paper copies of your Advanced Aircraft Analysis (AAA) data.**