

ECEN 615 – Methods of Electric Power Systems Analysis
Fall 2019 TR 12:45 - 2pm ETB 1037

Instructor: Prof. Tom Overbye, 308C WEB, overbye@tamu.edu

Office Hours: Mondays 1-3 pm or by appointment

Instructor Website: overbye.engr.tamu.edu

Course Website: <https://overbye.engr.tamu.edu/course-2/ecen615fa2019/>

Prerequisites: ECEN 460 or consent of instructor

Text: A. J. Wood, B. F. Wollenberg, G. B. Sheble, *Power Generation, Operation and Control*, Third Edition, Wiley, 2013, ISBN-13: 978-0471790556

TA: Yijing Liu, yiji21@tamu.edu

TA Office Hours: Wednesday 10 to noon in 308N WEB

Course Syllabus

Approx. # of hours

Introduction to Power Systems	4
Overview of Power System Modeling and Operation	4
Power Flow	6
Sparse Matrices in Power System Analysis	6
Sensitivity Analysis and Equivalent	6
Power System Data Analytics and Visualization	3
Optimal Power Flow and Power Markets	6
Power System State Estimation	5
High Impact, Low Frequency Events	3
Total	43

Evaluation: Exam 1	30%
Exam 2	30%
Homework, projects	40%

Tentative Date for Exam 1: Tuesday, October 8, In Class

Tentative Date for Exam 2: Thursday, November 21, In Class

Notesheets for Exams: All exams are closed-book, closed-notes. You may bring in one notesheet (8.5" by 11"), and may use calculators.

Grading

All grading in the course is based on a percentage with final grades determined based on this percentage. If your final average falls within the below ranges you are guaranteed to receive at least the letter grad indicated: A: 90-100; B: 80-89; C: 70-79; D: 60-69; F: 59 or lower

Americans with Disabilities Act (ADA)

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, currently located in the Disability Services building at the Student Services at White Creek complex on west campus or call 979-845-1637. For additional information, visit <http://disability.tamu.edu>.

Academic Integrity

For additional information please visit: <http://aggiehonor.tamu.edu>

“An Aggie does not lie, cheat, or steal, or tolerate those who do.”