Chemistry 641
Physical Organic Chemistry
Fall Semester 2013
Lecture: 8:50 am, MWF, 2373 Chemistry

Instructors: Professor Eric Strieter
Professor Trisha L. Andrew
5112A Chemistry 6329A Chemistry
265-8431 262-1502
strieter@chem.wisc.edu tandrew@chem.wisc.edu

Office Hours: Drop by anytime or arrange an appointment by email

Course Website: Learn@UW (links on UW-Madison and UW-Chemistry homepages)

Eric V. Anslyn and Dennis A. Dougherty
University Science Books: Sausalito, CA; 2006

Highly Recommended:
Michael B. Sponsler, Eric V. Anslyn, and Dennis A. Dougherty
University Science Books: Sausalito, CA; 2006

Course: Chemistry 641 is a one-semester course in physical organic chemistry.

Grading:
Exam 1 100 pts Oct 28th, 7:00 pm
Exam 2 100 pts Nov 22nd, 7:00 pm
Literature Analysis (written) 50 pts due December 2, in class
Literature Analysis (oral) 50 pts December 2 – 13

Exams will last approximately 2-3 hours. There will not be a comprehensive final examination for this course. Calculators and molecular models may be used during exams.

Homework:
Homework problems will be assigned, but not collected and graded. Students will present solutions to homework problems and discuss their answers during class.

Notice: Adherence to University policies concerning academic and intellectual honesty is expected:
http://students.wisc.edu/saja/misconduct/UWS14.html
Guidelines for Literature Analysis Assignment (Due Monday 12/02)

- Choose a paper from the literature that encompasses one or more of the following topics:
  - MO Theory
  - Acid-Base Chemistry
  - Kinetics and Extrakinetic probes (e.g., LFERs and KIEs)
  - Photochemistry
- When choosing a paper, focus your attention on those published between 2007-2013
- Write a 3-page report (including figures and references) that covers the main concepts, historical perspective, and your critical analysis of the paper
- Prepare a 10 minute presentation, again focusing on the main concepts, historical perspective, and critical analysis (outline is provided on the following pages)
Ideas/Concepts Advanced in the Article

• Idea/Concept #1 advanced in the article
  - Elaborate on idea #1
• Idea/Concept #2 advanced in the article
  - Elaborate on idea #2
Historical Perspective

(Give the historical perspective of this work by listing few dominant other articles and enumerating the significance of this prior work)

- Relevant paper #1
  - This paper suggested the following which enabled the present authors to do the following
- Relevant paper #2
  - This paper ...
Preliminary List of Issues to be Discussed

- The Article significantly advanced the following
- The Article made a mistake in this analysis/experiment
- The Article would have been stronger if authors did this
- This other article got it right
- The next research steps should be
- The possible impact of the Article is