

CHM 6626 Physical Methods in Inorganic Chemistry
Fall 2013

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Syllabus

Topics:

Introduction to Physical Methods

Nuclear Magnetic Resonance

Electron Magnetic Resonance

Symmetry and Group Theory

Vibrational Spectroscopy

Electronic Spectroscopy

Diffraction Methods

Time permitting, additional topics chosen from the following:

Mossbauer Spectroscopy

Surface Methods

X-ray Absorption Spectroscopy

Objective:

At the conclusion of the course students should have an understanding of: solution- and solid-state multinuclear NMR spectroscopy, electron spin resonance spectroscopy, electronic and vibrational spectroscopies, Mossbauer spectroscopy, and X-ray diffraction methods.

Office Hours: Monday and Friday 3 pm, and by appointment, CLB 412.

Grading: Grades will be based on homework (15%), midterm (35%) and final exams (50%).

Readings:

Readings from primary literature and educational sources will be made available on the UF e-learning site: <https://lss.at.ufl.edu/>

Homework:

Homework will be assigned approximately every two weeks and will be graded as pass/fail. Answers will be provided after the due date. Doing homework with a partner or in groups is encouraged.

Academic Honesty:

UF students are bound by The Honor Pledge which states, "We, the members of the University of Florida community, pledge to hold ourselves and our peers to the highest standards of honor and integrity by abiding by the Honor Code. On all work submitted for credit by students at the University of Florida, the following pledge is either required or implied: "On my honor, I have neither given nor received unauthorized aid in doing this assignment." The Honor Code (<http://www.dso.ufl.edu/sccr/process/student-conduct-honor-code/>) specifies a number of behaviors that are in violation of this code and the possible sanctions. Furthermore, you are obligated to report any condition that facilitates academic misconduct to appropriate personnel.

Accommodations for students with disabilities:

Students requesting classroom accommodation must first register with the Dean of Students Office. The Dean of Students Office will provide documentation to the student who must then provide this documentation to the Instructor when requesting accommodation."

The following information is required by UF policy:

Attendance:

Requirements for class attendance and make-up exams, assignments, and other work in this course are consistent with university policies that can be found in the online catalog at: <https://catalog.ufl.edu/ugrad/current/regulations/info/attendance.aspx>.

UF grading policies for assigning grade points:

<https://catalog.ufl.edu/ugrad/current/regulations/info/grades.aspx>

UF Course Evaluation Process:

Students are expected to provide feedback on the quality of instruction in this course based on 10 criteria. These evaluations are conducted online at <https://evaluations.ufl.edu>. Evaluations are typically open during the last two or three weeks of the semester, but students will be given specific times when they are open. Summary results of these assessments are available to students at <https://evaluations.ufl.edu/results/>.