### MIST 295: Graduate Research

**INSTRUCTOR**: TBD

**CONTACT INFORMATION: TBD** 

**OFFICE HOURS: TBD** 

## **CATALOG DESCRIPTION**

Supervised research with MIST faculty.

**UNITS:** Varied

# **TEXTBOOKS and other REQUIRED MATERIALS**

No required textbook.

## **COURSE GOALS**

- 1. The goal of MIST 295 is to train students in ongoing supervised graduate-level research.
- 2. Learn the underlying principles related to research in management of complex systems and related areas.
- 3. Be able to identify research topics from the recent research papers.
- 4. Learn a variety of data analysis methods and tools.
- 5. Be able to communicate knowledge gained to varying audiences.

## PROGRAM LEARNING OUTCOMES

- 1. *Foundations*. Students will apply disciplinary concepts and theories for framing and defining research questions and plans from business, management, economics, sociology, psychology, cognitive science, environmental science and engineering.
- 2. *Methods*. Students will be able to apply contemporary social science and scientific methods needed to conduct rigorous research in their area of specialization.
- 3. *Communication*. Students will communicate effectively to experts and non-experts, in professional (scientific and management) and community settings, preparing and delivering oral and written presentations using appropriate technologies.
- 4. Research Practice and Independence. Students will be able to initiate and conduct independent research (e.g. review of literature, development of a research question and methodology, analysis, discussion, and conclusion) that makes an original contribution to knowledge, and which may be published in a peer reviewed outlet.
- 5. Research ethics and societal context. Students will demonstrate familiarity with all aspects of research ethics and the societal context of their work.

# **LEARNING OUTCOMES**

Ongoing progress is expected. The Course Learning Outcomes (CLOs) support student development of the **Program Learning Outcomes** (PLOs). The connections between the CLOs are made explicit through the indication of which PLOs are connected to each CLO below. By the end of the course, students will be able to

- 1. Generate novel data related to dissertation/thesis topic (PLO1, PLO2, PLO4, PLO5).
- 2. Understand techniques and skills necessary for effective interdisciplinary research (PLO1, PLO2, PLO4).

- 3. Communicate and function effectively on a cross-disciplinary team (PLO3).
- 4. Use self-learning methods and organizational skills to enhance problem-solving abilities and efficiency (PLO1, PLO2, PLO4, PLO5).

Learning Outcomes will be assessed through weekly meetings with mentor, data (productivity), oral presentations and reliability.

# **PREREQUISITES**

None.

### **COURSE POLICIES**

#### **FORMAT**

This course requires hands-on laboratory, field, or theoretical research and data analysis with weekly meetings with the course instructor. Assignments can be written or oral and include a significant amount of teamwork maintaining laboratory skills, training, and safety.

## **GRADING**

This course is graded on a *letter basis only*. A grade of "B" or higher is considered a passing grade. Grading is based on:

- 1. <u>Attendance:</u> The success of research depends on regular and consistent daily progress. In general, each 1 unit corresponds to 3-4 research hours. Instructors should be informed of any possible scheduling conflicts BEFORE the absence in order to be excused.
- 2. <u>Active Participation:</u> All students are expected to attend regular one-on-one meetings with the mentor, as well as, weekly group meetings with the entire laboratory.
- 3. <u>Presentation</u>: Powerpoint presentation on research progress. The general format of presentation will be 10-15 minutes of general overview and background and then 30 minutes presenting the paper critically.

## DROPPING THE COURSE

• Please see the UC Merced General Catalog and the Registrar's / Student First website for details.

### CATCOURSES

- The CATCOURSES site will be used for periodic course announcements, and for the distribution of class notes, discussion exercises, homework sets, and (some) solutions.
- You can check the scores that you have received on your homework assignments and exams.
- Warning: pay no attention to any letter grade that is reported on CATCOURSES, except for the final grade.

### **CONDUCT**

- Students are expected to complete their own work and to abide by the UC Merced academic honesty policy, which can be found on the Student Life website <a href="http://studentlife.ucmerced.edu/">http://studentlife.ucmerced.edu/</a> under the "Student Judicial Affairs" link.
- Note that most of the handouts provided in this course are protected by copyright, and are flagged accordingly on UCMCROPS. They are for your personal use only. Re-posting the files or their contents on sites such as (for example) "Course Hero" is an explicit violation of this copyright.
- Students and instructors are expected to honor UC Merced's Founding Principles of community <a href="http://www.ucmerced.edu/about-uc-merced/principles-community">http://www.ucmerced.edu/about-uc-merced/principles-community</a>.

### SPECIAL ACCOMMODATION

- The instructor will make every effort to accommodate all students who, because of religious obligations, have conflicts with scheduled exams, assignments or required attendance.
- Please speak with the lead instructor during the first week of class regarding any potential academic adjustments or accommodations that may arise due to religious beliefs.

## ACADEMIC DISHONESTY STATEMENT

- Each student in this course is expected to abide by the University of California, Merced's Academic Honesty Policy. Any work submitted by a student in this course for academic credit will be the student's own work.
- You are encouraged to study together and to discuss information and concepts covered in lecture and the sections with other students. You can give "consulting" help to or receive "consulting" help from such students. However, this permissible cooperation should never involve one student having possession of a copy of all or part of work done by someone else, in the form of an email, an email attachment file, a diskette, or a hard copy. Should copying occur, both the student who copied work from another student and the student who gave material to be copied will both automatically receive a zero for the assignment. Penalty for violation of this Policy can also be extended to include failure of the course and University disciplinary action.
- During examinations, you must do your own work. Talking or discussion is not permitted during the examinations, nor may you compare papers, copy from others, or collaborate in any way. Any collaborative behavior during the examinations will result in failure of the exam, and may lead to failure of the course and University disciplinary action.

### DISABILITY STATEMENT

Accommodations for Students with Disabilities: The University of California Merced is committed to ensuring equal academic opportunities and inclusion for students with disabilities based on the principles of independent living, accessible universal design and diversity. I am available to discuss appropriate academic accommodations that may be required for student with disabilities. Requests for academic accommodations are to be made during the first three weeks of the semester, except for unusual circumstances. Students are encouraged to register with Disability Services Center to verify their eligibility for appropriate accommodations.