SNRE MASTER’S PROJECT PLANNING
NRE 701/888

January 13 – February 24 | Tuesday, 4-6:30pm | 1040 Dana
1 credit (Satisfactory/Unsatisfactory grading)

701/888 will officially end April 24 with completion of a final project proposal, budget, and work plan.

INSTRUCTORS
Avik Basu  abasu@umich.edu  734-262-5800  3540 Dana
Office Hours:  By appointment

Ben Hamm (GSI)  benhamm@umich.edu  908-421-0042  2544 Dana
Office Hours:  Monday, 2-4pm

OVERVIEW
A Master’s Project is an interdisciplinary group project in which students work closely with a faculty advisor to analyze and propose solutions to a real-world environmental problem. Typically projects involve a 12-to-16 month process of problem definition, research, analysis, writing, and presentation aimed at solving a problem or satisfying a need faced by a client. Each project requires individual and group analysis and reporting. Hence, projects develop abilities around content knowledge and analysis, as well as mechanisms to work effectively in teams through a group problem-solving process. Projects typically produce:

• Content learning (renewable energy, sustainable growth, biodiversity conservation, etc.)
• Analytical skills (statistical and spatial analysis, design, surveys, financial modeling, etc.)
• Professional skills (writing, professional communications, evaluation, etc.)
• Process knowledge (team-building, facilitation, negotiation, etc.)
• Client contacts and networks

OBJECTIVES
Project topics are developed and selected during this planning course required of all master’s project students. 701/888 provides one of the six credits that students will receive for their master’s project. The master’s project planning course:

• Provides a structure by which project ideas and student teams are developed
• Provides foundational-level knowledge of project management, research design, proposal writing, and group process that is further developed throughout the project
• Produces for each project, by “spring” break, an interim research proposal describing:
  o team members; advisor; client
  o client need/problem to be addressed
  o research questions; research methods; analytic approaches; data needs
  o deliverables and rough timeframe

EVALUATION
Students will receive either a satisfactory or unsatisfactory grade depending on meeting course expectations and timely submissions of deliverables as described in the schedule below.
EXPECTATIONS

Full class engagement regardless of project status. To be effective as a mechanism to develop projects and research proposals, it is necessary for all students to be engaged in the process. While some projects will develop faster than others, students in these teams are expected to contribute to full-class discussions and provide cross-project feedback and sharing of lessons about group process. All student teams are required to submit course deliverables according to the schedule below, no matter how fast-tracked a project may be. However, interim or final proposals can be submitted earlier than required.

Flexibility about topic scope. Project topics and scope are negotiable among team members, clients and advisors. We ask that you keep an open mind about project topics and seek to accommodate your personal goals in projects that initially may not seem a logical fit for you. Projects involving a diversity of student backgrounds/skills often provide some of the richest learning experiences.

Naming conventions on work submitted. When submitting prospectuses, proposals and other deliverables, include the project number (2 digits) and assignment in the file name so that we can easily identify which files go with different projects.

Name the prospectus paper file: PXX_Assignment.doc
For example: P23_Prospectus.doc

Communicating with instructors. Beyond office hours and talking to instructors in class, we encourage email exchanges. Please put the course number (701/888) in the subject line to ensure that your message rises above background noise. Recognize that responses may take a day or more.

SCHEDULE

Key: ★ Special Events
    ⊡ Deadlines

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<thead>
<tr>
<th>Date</th>
<th>Event</th>
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<tbody>
<tr>
<td>Oct 3</td>
<td>★ Master’s Project 101 Event</td>
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<tr>
<td>Dec 12</td>
<td>Topics posted on SNRE Masters Project database</td>
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<td>Dec 15</td>
<td>Initial project interest survey sent out</td>
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<td>This survey is only a statement of potential interest, with no commitment at this time. Your assessment will help us provide a more meaningful Client Fair for both the students and the clients.</td>
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Fall 2014
<table>
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<tr>
<th>Date</th>
<th>Event Description</th>
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<tr>
<td>Jan 13 (Tu)</td>
<td>CLASS: Course introduction</td>
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| Jan 14 (W) | ☑ Initial project interest survey  
  Complete this survey by the end of day (link available on Canvas). |
| Jan 15 (Th) | ★ Client fair  
  Held in the Ford Commons from 4-6:30pm. |
| Jan 16 (F) | ☑ Student information survey  
  Complete this survey by the end of the day (link available on Canvas). |
| Jan 19 (M) | ☑ Review a past masters project  
  Complete this survey by the end of the day (instructions on Canvas). |
| Jan 20 (Tu) | CLASS: Envisioning your Master’s Project; Funding |
| Jan 23 (F) | ☑ Project preference survey  
  Complete this survey by the end of the day (link available on Canvas). |
| Jan 26 (M) | ★ Project teams formed |
| Jan 27 (Tu) | CLASS: Research design; IRB |
| Feb 2 (M)  | ☑ 1-page topic prospectus and presentation PowerPoint slides  
  By the end of Monday, each team submits, via Canvas, a 1-page prospectus and PowerPoint slides with names of authors. |
| Feb 3 (Tu) | CLASS: Presentation and review of topic prospectuses  
  3 minute presentation of prospectus; Develop feedback for two other project prospectuses. |
| Feb 6 (F)  | ☑ Feedback on prospectuses and presentations  
  By the end of the day, submit via Canvas, feedback on two project prospectuses and presentations. |
| Feb 10 (Tu)| CLASS: Writing research proposals; Project scoping; Client communication |
| Feb 17 (Tu)| CLASS: Group process |
| Feb 24 (Tu)| CLASS: Project management |
| Feb 27 (F) | ☑ Interim proposal  
  Due by 5pm. Submit your interim proposal via Canvas using the proposal guidelines and including names of group members and advisors. |
### March-April 2015

**Mar-Apr** Detailed work on proposals with faculty advisors; Consultation with GSI as requested

**Mar-Apr** Some Winter B Courses *(more can be found on Wolverine Access)*

* NRE 501/056 Interview Methods F 9a-12pa Paige Fischer
* NRE 677/059 Survey Methods T 4-6:30p Robyn Meeks

Optional modules *(TBA)*

**Mar 27 (F)** Verbal face-to-face project status updates provided to GSI
*Sign up for a group time with the GSI for a 30-minute update and review. Complete this before the end of the day.*

**Apr 1-15** Meet with Diana Woodworth to review budget and funding

**Apr 9-10** Capstone Presentations *(last cohort’s final project presentations)*

**Apr 24 (F)** Full proposal
*Due to OAP by 5pm. Must include signatures of team members and approval by faculty advisor. Final grade in 701-888 given at this time.*

SNRE Master’s Project funding proposals
*Can be the same as the full proposal as but must use SNRE budget template.*

### And beyond*

**Summer 2015** Initiate research *(Plan around summer internships!)*

**Oct 2015** Assist new students in Master’s Project 101 event *(optional)*

**Nov 2015** Meetings with communications consultant to improve presentations
*Interim presentations *(tentative)*

**Jan-Feb 2016** Assist new students by serving on NRE 701 panel discussions *(optional)*

**Mid Apr 2016** Capstone presentations

**Late Apr 2016** Final reports

**May 2016** Graduate!

*Note that the deadlines listed after April 2015 are for informational purposes and are not requirements for NRE 701/888.*
RESOURCES
Erin Lane    eeallen@umich.edu  1520 Dana   [Client Liaison]
Diana Woodworth  dianaw@umich.edu  1520c Dana  [Funding]
Lisa Yee-Litzenberg  yeeha@umich.edu  1504a Dana  [Career and Networking]

701/888 course information will be available on Canvas (not CTools):
umich.instructure.com

Masters project handbook (contains guidelines, forms, and funding information):
snre.umich.edu/current_students/masters_project_handbook

SNRE archives of past projects:
snre.umich.edu/current_students/masters_projects/masters_archives

UM Deep Blue (contains copies of former masters projects):
deepblue.lib.umich.edu

University of Michigan Institutional Review Board (IRB):
www.irb.umich.edu/policies/studentguide.pdf

UM statistical analysis assistance, 3550 Rackham Building
cscar.research.umich.edu

UM writing assistance, Sweetland Center for Writing, 1310 North Quad
lsa.umich.edu/sweetland/
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