The Verification of Senior Design Objectives through Enterprise Experience form must be completed by each BSME – Enterprise concentration student prior to registering for ENT4950. The purpose is to ensure that the student’s participation in the Enterprise program represents an equivalent design experience as required by ABET. The basic template to be followed by ME students is provided below.

Students should consult with their Enterprise team advisor when defining the capstone-equivalent project they will be participating in. The completed form must be approved by the Enterprise team advisor and the ME-EM Associate Chair for Undergraduate Studies. After the Enterprise team advisor has signed the form, the student must submit the form to the ME Advising Center for verification of pre-requisites. The advisor will submit the form to the ME-EM Associate Chair for Undergraduate Studies for review.

The following are required prior to enrollment in ENT4950.

1. **Approved Verification of Senior Design Objectives through Enterprise Experience form**

2. **Instructor permission to enroll in ENT4950 (if applicable)**

3. **Satisfy pre-requisite requirements:** MEEM3900, MEEM3000 (concurrent pre-requisite), MEEM3502 (concurrent pre-requisite)

After the above items have been completed, the ME academic advisor will enroll the student in ENT4950. A copy of the approved form will be retained in the ME Advising Center and the original will be submitted to the Enterprise program office. It is recommended that this form be completed during the semester prior to taking ENT4950 in order to facilitate the registration process. The latest the form can be submitted is the end of the first week of classes of the semester in which ENT4950 is to be completed.

Recognizing that it may not be possible to fully identify the intended design project in this timeframe, or that design project scope and/or deliverables may change over the course of the semester, amended Verification of Senior Design Objectives through Enterprise Experience forms must be prepared and submitted to the ME-EM department. The final form on file with the Enterprise program office at the conclusion of the Enterprise project course sequence must represent the project and deliverables as completed by the student.

Questions can be directed to the ME Advising Center in 204/205 ME-EM.
Verification of Senior Design Objectives through Enterprise Experience

Major: ___________________________ Date: ___________________________

Part A: To be completed by student. List completed and planned project work semesters, and if applicable, approved modules for senior design credit:

<table>
<thead>
<tr>
<th>Course</th>
<th>Semester/Year</th>
<th>Student: ___________________________</th>
</tr>
</thead>
<tbody>
<tr>
<td>ENT</td>
<td></td>
<td>ID#: M</td>
</tr>
<tr>
<td>ENT 3950</td>
<td></td>
<td>Primary major: ________ 2nd major/deg: ________</td>
</tr>
<tr>
<td>ENT 3960</td>
<td></td>
<td>e-mail: <a href="mailto:___________________________@mtu.edu">___________________________@mtu.edu</a></td>
</tr>
<tr>
<td>ENT 4950</td>
<td></td>
<td>Enterprise Team: _______________________</td>
</tr>
<tr>
<td>ENT 4960</td>
<td></td>
<td>Enterprise Advisor: ___________________</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Check if applicable:</td>
</tr>
</tbody>
</table>

Part B: To be completed by student and enterprise advisor. Return signed form to the IIS Enterprise Office (722 M&M)

Project Title: ___________________________

Abstract: Outline the project scope and deliverables assigned to this student (attach additional pages as needed).

ABET Criteria Check whether student will:

☐ 3 (a) Apply knowledge of mathematics, science and engineering.
☐ 3 (b) Design and conduct experiments, as well as to analyze and interpret data.
☐ 3 (c) Design a system, component, or process to meet desired needs.
☐ 3 (d) Function on multi-disciplinary team(s) as demonstrated by the execution of a team project that is too large, complex, or diverse for a single person. Partition a project into tasks and lay out a project plan. Execute the project and produce the required deliverables.
☐ 3 (e) Identify, formulate and solve engineering problems.
☐ 3 (f) Demonstrate understanding of professional and ethical responsibility.
☐ 3 (g) Communicate effectively.
☐ 3 (h) Gain understanding of the impact of engineering solutions in a global, economic, environmental and societal context.
☐ 3 (i) Recognize the need for, and an ability to engage in life-long learning.
☐ 3 (j) Gain knowledge of contemporary issues.
☐ 3 (k) Use the techniques, skills and modern engineering tools necessary for the practice of engineering.

Program specific criteria (please describe on back of this form)

Approved by: ___________________________ Date: ___________________________

Approved by: ___________________________ Date: ___________________________

Approved by: ___________________________ Date: ___________________________

☐ Senior Design Ready ________ (Initial)

Return completed form to Enterprise Program Director, IIS, 722 M&M.

Abstract Template for Verification of Senior Design Objectives Form
Project Topic Here

Objective:
One sentence project objective

Background
Concise background of problem domain ...
What is driving the need...?
Include photo

Project Scope
Basic project scope here, maybe bullets of goals, specifics, etc.
Rough definition of design space...
Desired skill set on team — constraints involved, grad student support needed...
Describe focus of team

Project Goals
- bullet 1 with sub-bullets:
  - desired outcome
  - design for X
  - performance goals
  - etc...
- Some analysis deliverables along with design prototype, etc....
- goal 3
- goal 4
- etc....

Sponsor Can Provide:
- Any special information, background, hardware, specialized testing setup, etc.
- Anything in sentences that may support project goals
- Bullet 2
- Bullet 3
- etc...

Timing
Project Start: Thursday of Week 1 (Semester I)
Project Completion: Finals of Week (Semester II)