

Dear Potential Sponsors,

Each year, the School of Engineering + Technology at WCU launches a two-semester capstone project course for our undergraduate seniors. Capstone projects allow them to integrate engineering training with project management skills. Interdisciplinary student teams drawn from our programs (electrical engineering, mechanical engineering, electrical and computer engineering technology and engineering technology) tackle open-ended, real-world problems for our industry partners. In addition to the course instructor, each team has a faculty mentor to help guide the project. Ideally, a capstone project should have the following characteristics:

- Open-ended requiring evaluation of multiple solutions
- Complex and challenging requiring innovative problem-solving approaches
- Sufficient scope for team of 3-5 students (we can help with this).

We invite you, as an industry partner, to evaluate your development needs and nominate topics that would provide value to you and a learning experience for our students. To be a capstone project sponsor, we request the following:

- Team sponsorship fee, plus reimbursement for materials and travel needed for your project
- Willingness to provide a project mentor from your company
- Participation in periodic design reviews as the customer (at your site or WCU).

If the idea of sponsoring a capstone project interests you, please contact Andy Ritenour at [aritenour@wcu.edu](mailto:aritenour@wcu.edu) or **828-227-2177**. We will be happy to walk you through the simple process. We normally solidify topics during June and July, and request that final project descriptions be submitted by July 15.

Quick outline for topic proposals:

- Company name and point of contact
- Title of project
- Problem statement (one paragraph describing the problem and what is needed)
- List of known requirements or constraints (size, weight, power, cost, performance specifications, operating conditions, etc.)
- Milestones and deliverables

Sincerely,

Andy Ritenour, Ph.D.

Associate Professor, School of Engineering + Technology

Western Carolina University

# Engineering Capstone Program

*"... a partnership with industry to provide the ultimate learning experience for students and develop the engineering workforce necessary for economic development."*

## Industry-Sponsored Projects:

- Open-ended
- Complex and challenging
- Sufficient scope for team of 3-5 students

## Interdisciplinary Teams: (undergraduate seniors)

- Engineering Technology
- Mechanical Engineering
- Electrical Engineering
- Electrical and Computer Engineering Technology

## Annual Timeline:

- May:** Initial call for projects
- July:** Finalize project catalog
- Sept:** Project kick-off
- Dec:** Mid-project review
- April:** Project completion
- May:** Final Review  
Capstone Symposium



*Prototype/product development  
Manufacturing process improvement  
Industrial automation  
Test, instrumentation, and metrology  
Engineering analysis and research*

For more information, please contact:  
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