

Great Undergraduate Research Opportunities!



GAUSS Project Is Looking for Qualified Undergraduate Students!



The Department of Mathematics is pleased to offer a undergraduate research and training project, **GAUSS**, in the Computational Science Training for Undergraduates in Mathematical Sciences (CSUMS) program funded by the National Science Foundation. **GAUSS** will highlight the exciting applications in Computer Vision and Image Sciences as motivations for the study of advanced mathematical theory in computation. **GAUSS** is a yearlong program, each student selected to participate will be paid \$10,000 in stipend for research and will be provided a laptop computer plus room and board in the summer. The participants will be required not to take any other part time employment during the **GAUSS** year.

The Goals:

- Enhance computational aspects of education and training of undergraduates by emphasizing both mathematical theory and computational skills
- Better prepare students to pursue careers and graduate study in fields that require integrated strengths in computation and the mathematical sciences

The Activities:

Each participant will be assigned a faculty mentor, who will serve as a research mentor for the student. All students will take two required courses each semester and will be involved in research projects during the summer and fall semesters, and participate in various group and individual activities through the yearlong training.

- Spring course preparation in Computational Mathematics and Mathematical Modeling
- Summer research experience
- Fall research and more course work in Mathematical Modeling and Computer Vision
- Attend conferences and present research papers
- Publish research papers
- Field trips to industries
- Guidance on applying and preparing for graduate school and prestigious scholarships (Goldwater, NSF, etc.)
- Distinguished Lecturer Series and weekly seminar

Who Can Apply?

- US citizens or permanent residents
- Math majors or minors
- At least three semesters remaining at UCF
- At least 3.0 GPA

Expected Course Work by the End of Fall: Calculus I-III, Logic and Proofs, ODE, Matrix and Linear Algebra

How to Apply: Application form is available online at www.math.ucf.edu/gauss, where more information on current GAUSS project activities can also be found. The deadline for application for 2010 is November 30, 2009. About 10 students will be selected for the program in 2010. The selection will be based on

- Academic achievements
- Personal statement
- Interview
- Letter(s) of recommendation

For more information, please contact Dr. Mubarak Shah (shah@math.ucf.edu) or Dr. Xin Li (xli@math.ucf.edu)