Quality Experiences at the University of Alabama

Engineering at UA:
In 1837, the University of Alabama became the first university in the state to offer engineering classes and was one of the first five in the nation to do so. Today, the College of Engineering has about 1,900 students and more than 95 faculty. It has been fully accredited since accreditation standards were implemented in the 1930s.

Sciences and Mathematics at UA:
The University of Alabama has a wide range of quality scientific and mathematical programs. Incoming freshmen interested in these areas are welcome to apply for admission to MAP.

For More Information about MAP:
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Or visit our website:
http://emap.ua.edu
The University of Alabama with the National Science Foundation is offering a summer program to build math and physics skills for students entering engineering, science, and math majors.

**When and where is MAP offered?**

The Math Advancement Program, MAP, is a 2 1/2 - week summer residence class to be held at the University of Alabama campus beginning July 18th, 2010. The program addresses prerequisites for degrees that require higher math and physics skills.

**Who should consider MAP?**

Entering freshman need to have a solid background in calculus and physics to succeed in engineering and other science fields. Such curricula require a solid understanding of basic mathematical and physical principles. However, often students find their math skills "rusty" and fall behind or struggle in these courses.

Roughly half of entering freshmen require at least one semester of pre-calculus to be considered ready for engineering and other advanced curricula. This can have serious repercussions on the student’s progress by delaying the start of core classes by up to a year.

**What can MAP do for me?**

MAP will incorporate important learning principles that ensure knowledge is retained and not just memorized. Students will be encouraged to develop their skills through hands-on experiences and by interaction with professors and instructors through an interdisciplinary “Living Laboratory” program. Students participate in community service activities demonstrating the importance of social responsibility in technical fields. Laboratory experiments allow students to use simple calculus in real applications and see what each engineering discipline does in practice.

**MAP wants to help!**

MAP recruiting activities are targeting rural historically low per capita communities and will reserve 33 percent of enrollment space for under-represented groups. The program will be structured so that students can hone their technical abilities before they begin their college career.

MAP will also be open to a limited number of K-12 teachers for continuing education credit. Research collaborations will be promoted between higher education and K-12 faculty and staff.