Case Study: Yale University

Department Description

35 ladder faculty members plus 2 full-time, non-ladder faculty members

Over the last 5 years, have graduated an average of 29 majors per year

600 students taught per semester in a variety of courses including both an honors sequence for well-prepared students and a regular and larger calculus-based physics sequence.

Offer a BS in physics and a BS (intensive for graduate-school-bound students) in physics

Changes

Reworking the introductory physics course for life science majors to make it more relevant to those students and to meet new focus of the life science community; labs being reworked to use examples that are important in life sciences

Introduced evening help sessions for homework and lab classes

Use of clickers in some large lectures

More summer research fellowships for summer undergraduate research with faculty

Outreach K-12 students through programs for girls and under-represented minorities; Participating in summer science internships for high school students with local community groups; summer tours of research labs for community and students; increased emphasis on Yale Physics Olympics.

Evidence of Success

Increased student participation in Yale Physics Olympics

Summer science research fellowships from Yale for students more than tripled.

Steps to Sustain Change

Yale University administration supports above changes including increased funding for science students.

For more information contact

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