Investigating Interdisciplinary Interactions

**Workshop Physics** will be represented by its founder, Professor Priscilla Laws. Workshop Physics’ lectureless approach has been widely adopted across the nation not only in physics, but in biology and chemistry as well. Workshop Physics is particularly known as well for the development and extensive use of probes and interactive software that help students develop a kinesthetic and mathematical sense of physical concepts.

**Workshop Mathematics** will be represented by founder Professor Nancy Baxter Hastings. She seeks to help students think about and do mathematics by enhancing their understanding of fundamental mathematical concepts, increasing their ability to use these concepts in other disciplines and encouraging them to read and write about mathematical ideas.

**ChemLinks** will be represented by its founder, Professor Brock Spencer. As one of the five systemic initiatives in undergraduate chemical education reform funded by NSF, ChemLinks has collaborated with the other four systemic initiatives in offering faculty workshops examine the chemistry involved in real world problems and contemporary technology.
We are seeking interdisciplinary teams from a single institution to join the BioQUEST Curriculum Consortium workshop, June 11-19, 2005.

Collaborate with leaders in STEM education reform to compare issues, technologies, and approaches. We will construct new curricular materials that are:

- interdisciplinary
- collaborative
- data rich
- problem based
- mathematically and computationally intensive

In response to curricular reform calls from:


*Math and Bio 2010 Linking Undergraduate Disciplines*, (Mathematical Association of America, 2005)

*In this workshop we will be considering how to bridge the interdisciplinary divide in STEM disciplines while fostering a more quantitative, computational and mathematical teaching that is reflective of contemporary biological research. We will bring together individuals involved in curricular reform in physics, mathematics, chemistry and biology to discuss teaching reform, explore interdisciplinarity and to develop curricular materials.*

**When:** June 11-19, 2005

**Where:** Beloit College, Beloit, WI (Located 1.5 hours by convenient bus service from Chicago’s O’Hare Airport)

**Cost:** Tuition, course materials, private campus rooms, and all meals will be provided. This workshop is funded through the National Science Foundation and the Partnership for Advanced Computational Infrastructure

For more information and workshop updates: [http://bioquest.org/summer2005](http://bioquest.org/summer2005)

**To Apply:** Please visit our online application page at [http://bioquest.org/summer2005](http://bioquest.org/summer2005) and respond to the following questions:

1. Please share any specific knowledge or resources that you can bring to this workshop which might be useful to other participants.
2. Have you participated in curriculum reform efforts? If so, in what way?
3. Have you participated in interdisciplinary teaching or course development? If so, please describe.

Preference given to interdisciplinary teams from a single institution.

Application deadline is February 20. Applications received after that date will be considered on a space available basis.