

# THE CROSS PRODUCT

DEPARTMENT OF PHYSICS COLLEGE OF THE HOLY CROSS

## DEPARTMENT NEWS

Professor Randy Ross retired this year after 30 years at Holy Cross. Prof. Ross was a dedicated teacher and colleague, and we will miss him greatly. Prof. Ross began his teaching career at a community college in New York before starting

Introductory Astronomy course remarked, "Dr. Ross could explain the theory of relativity to an eighth grader." And no one who took Prof. Ross's General Physics would ever forget the "Simple Harmonic Motion" rap. In retirement, Prof.



Spring BBQ, from left: Andrew Novicki, Robert Nazarian, Mike DeFeo, Pat Collins, and David Baylozian

graduate school. He went on to earn his Ph.D. in astrophysics from University of Colorado and became a foremost expert on the theory of illuminated accretion disk around black holes, having authored more than 70 papers in his career. He came to Holy Cross in 1981 and was promoted to full professor in 1994. Since his arrival, his students consistently raved about his engaging and clear lectures. One student in his

Ross plans to reside in the Boston area.

Professor Paul Oxley received tenure and was promoted to associate professor. A member of the Holy Cross faculty since 2005, Prof. Oxley has actively involved students in his research and taught a number of introductory and advanced courses. This year he will be on a sabbatical leave pursuing his research on collision of excited atoms.

## CHAIR'S CORNER

-Timothy Roach

One of the more exciting recent times for the Physics Department was the spring of 2010, when we moved into the newly renovated Haberlin Hall. If you've not seen it, we invite you to check the College website for photos, or better yet, come by sometime. Haberlin now features open corridors overlooking the atrium and Science Café, state of the art teaching spaces, custom research labs, many comfortable nooks for people to chat or work, and offices that are functional yet beautiful (ok, ignoring the piles of papers on my desk!). Yet while the facilities are indeed splendid, it is the people who really make the Department a great place to work, to learn, to be. In this, our inaugural newsletter, we hope you'll enjoy reading a bit about some of these wonderful people.



Prof. Ben Kain

The department welcomes two new professors this fall. Professor Ben Kain joins us from

Rowan University as an assistant professor. Prof. Kain received his Ph.D. in high energy theoretical physics from University of California Berkeley. His research is primarily in three areas: building models for the interactions of fundamental particles, understanding the instance after the Big Bang and how the Universe evolves, and studying exotic states of matter at extremely low temperatures. After

graduate school, Prof. Kain traveled through Europe and South America. Prof. Kain will teach General Physics and Quantum Mechanics this fall. Professor Carolann Koleci joins us as a visiting assistant professor. Prof. Koleci was an assistant professor and the director of the physics education program at Worcester Polytechnic Institute. She has written extensively on using visualization to teach electromagnetism introductory students.

We bid farewell to Professor Fatima Amir who accepted a tenure-track position at St. John's University in New York.

The 2011 Nugent Gold Medal, an award for general excellence in physics, was awarded to Steve

Anderson. This fall, Steve will be pursuing his doctorate in physics at the University of New Hampshire. Best wishes to Steve!

At the spring barbecue, David Baylozian, Pat Collins, Mike Defeo, Andrew Novicki, and Robert Nazarian, were inducted into the physics honor society Sigma Pi Sigma. Mike, Andrew and also Gerry D'Arco are all headed to Columbia University in the fall as participants in the 3-2 engineering program.

Robert Nazarian was the recipient of the 2011 Compton Gold Medal, an award for the best scientific writing, for his thesis on the British Petroleum oil spill of 2010. Congratulations Robert

## ALUMNI NEWS

Kelley (Dunbar) Sullivan ('00) defended her doctoral thesis at the University of Rochester in the field of biophysics. For the past year, she worked as a post-doc at University of Rochester. She has just accepted a tenure track job at Ithaca College. Kelley and her husband welcomed their first son, John, this spring.

Carolyn Berger ('02) received her PhD in physics from Duke University and finished her post-doc at the Duke University Medical Center. This fall, she will be a visiting professor of physics at St. Olaf College. Carolyn and her husband welcomed the birth of their son, Cooper, in 2010

Lindsey Lavoie ('04) received her PhD in medical physics from the University of Florida. Since 2009, she is working in the Radiology

Department at Tufts Medical Center in Boston and currently holds the position of diagnostic medical physicist.

Yin P. Hung ('04) is currently a 6th year student in the combined MD-PhD program at Harvard Medical School. His research on epilepsy focuses on how cellular metabolites regulate neuronal firing.

Stephanie Stattel ('06) received her master's degree from UCLA in 2009. Starting this summer she will be a software developer with the financial company Bloomberg.

Dianna Muth ('07) received her law degree from American University, and she recently completed a Masters of Laws from Georgetown University. She is an associate at Steptoe & Johnson, an international law firm in DC.

Michael Galbo ('07) recently finished an MS in materials science and engineering from Boston University with a focus on solid oxide fuel cell research. He is currently trying to spin off some of the lab research into a startup and working for an energy company EnerNOC.

Tom Booth ('10) is currently a graduate assistant for the men's soccer team at Long Island University - Brooklyn while getting his master's degree in Computer Science.

Kevin Sullo ('10) is a territory sales manager at an engineering company called Gray Wolf Sensing. In the fall he will attend University of Bridgeport part time for a masters in mechanical engineering.