



## PHILADELPHIA ORGANIC CHEMISTS' CLUB

- DATE:** Thursday, May 27th, 2004; 6:00 pm dinner, 8:00 pm seminar
- PLACE:** Room 102, New Chemistry Building, University of Pennsylvania, 34th and Spruce Streets, Philadelphia, PA
- SPEAKER:** **Dr. Patrick Y. Lam**, Department of Discovery Chemistry, Bristol-Myers Squibb Co., Hopewell, NJ
- BIOGRAPHY:** Patrick Y. Lam is currently a director in the Discovery Chemistry Department of Bristol-Myers Squibb Co. He received his Ph.D. with Dr. Louis Friedrich from the University of Rochester in 1980. He did his postdoc with Prof. Mike Jung and the late Prof. Don Cram in UCLA. He joined DuPont in 1984 and moved to BMS in 2001. In recent years, he has been involved with HIV protease inhibitors, Factor Xa inhibitors and anti-platelet agents. Patrick has received numerous awards including the Ondetti Cushman Innovation Award, BMS, 2003. Summit Award, DuPont-Merck, 1993. He serves on the Editorial Board of Letters in Drug Design & Discovery (2003-) Medicinal Research Reviews (1997-present); Member of Long Range Planning Committee of ACS Medicinal Chemistry Division (1997-2000).
- TITLE:** **Structure-based design and discovery of Razaxaban, a novel Factor Xa inhibitor and Copper-promoted C-N/O bond cross-coupling via organometalloids**
- ABSTRACT:** Copper-promoted C-N/C-O bond cross-coupling between arylboronic acids and H-N/H-O containing substrates, a complementary reaction of Suzuki-Miyaura's palladium-catalyzed C-C bond cross-coupling, has recently emerged as an important and powerful synthetic methodology. This C-N/C-O coupling reaction occurs under conditions as mild as the well-known condensation reaction to make the amide C-N bond - room temperature, weak base and in air. Since the initial reports by Chan, Evans and Lam, we have extended the methodology to include other organometalloids such as arylstannanes and hypervalent arylsiloxanes, in place of arylboronic acids, and general catalytic copper systems. The methodology is also applicable to N-vinylation with vinylboronic acids - the mildest method for performing N-vinylation. This copper chemistry will be compared with Buchwald/Hartwig's palladium chemistry.
- DINNER:** The meeting will be preceded by cocktails (cash bar) at 5:30 pm followed by a dinner at 6:00 pm at Penne Restaurant & Bar, 3601 Walnut Street. Reservations should be made by calling Gregory Ott at (609) 252-3189 or by e-mail to [gregory.ott@bms.com](mailto:gregory.ott@bms.com) **before 5:00 pm, Monday, May 24th, 2003. Please pay the \$40.00 for dinner when you attend.** Thank you.