

SMC BIOLOGY

NEWSLETTER

Fall, 2005

Edited by Richard Jensen

THE YEAR IN REVIEW

by Thomas Platt

Last year, the addition of Dr. Don Paetkau provided much needed expertise in molecular biology and stimulated us to explore alternatives to the traditional major. The departure of Dr. David Sever, after 30 years of service, resulted in the hiring of **Ryan Dombkowski** (see below) to join the faculty in the 2005-2006 academic year. Ryan's major responsibility will be teaching anatomy to both biology majors and nursing intents. Ryan's extensive experience teaching medical students should mesh well with many of our student's goals to pursue careers in medically related fields.

New concentrations in Ecology/Environmental Biology and Cellular/Molecular Biology were approved by the College. We graduated our first major in the Cellular/Molecular concentration this year (**Danelle Duffy '05**) and we have several rising senior and juniors pursuing degrees in this exciting field. The addition of a molecular biologist and the development of the concentrations in cellular/molecular biology and ecology/environmental biology were done, at least in part, based on information from alumnae surveys and exit interviews with our graduating seniors. Movement in these directions is also directly related to preparing our students "to make a difference in the world" (College Mission Statement), and inviting "students to think critically and creatively about the natural world" (College Statement of Philosophy and Purpose).

The department continues to participate in Hypatia Day which encourages young women in junior high school to continue their science education by providing role models (our students and faculty) and hands-on activities in the biological sciences. Our students also serve as judges for the Northern Indiana Regional Science Fair. One of their most important duties is to identify the best elementary and junior high projects done by female students. These students are presented with the Dineen Award which consists of a certificate and a small monetary stipend.

Julia Adams was the co-valedictorian of the Class of 2005 (our second consecutive valedictorian!) and **Elizabeth Schowe** had the second highest grade point average in the graduating class.



Ryan Dombkowski

Ryan Dombkowski (Ph.D. candidate, ND, '05) brings new expertise to the department. After completing his B.A. in chemistry (Wabash College, 2000), Ryan enrolled in the Indiana University School of Medicine, South Bend campus. After completing the first year of medical school, Ryan realized that his real interests were in teaching and research and enrolled in the Ph.D. program at the University of Notre Dame. During his years at ND, Ryan has taught Gross Anatomy (Fall 2003 and 2004) and Physiology (Spring 2004) at the IU School of Medicine, Human Musculoskeletal Anatomy (Fall 2003 and 2004) at Notre Dame, and an Anatomy and Physiology course (Summer 2004) at Indiana University, South Bend. In addition to these teaching responsibilities, Ryan has completed his dissertation, "Vertebrate Mechanisms of Hydrogen Sulfide Vasoactivity," and has co-authored three research publications. To top it off, Ryan is married to Alicia Lesneskie (SMC '02)!

ADDITIONAL FACULTY AND STAFF ACTIVITIES

Tom Fogle attended the Association for Biology Laboratory Education meetings from June 7 - 11 2004 at Bowling Green State University in Bowling Green, Ohio. He attended the board meetings and served as organizer for the poster session. Tom also led the first Saint Mary's travel program to South America under his new course "Environments of Ecuador." Seven students traveled with him from 26 July 26 - 9 August 2004 to explore the Andes highlands, Andes cloud forest, Amazon basin and Galapagos Islands.

Dick Jensen attend the Botany 2004 conference, 31 July - 5 August 2004, at Snowbird Resort in Utah. He completed his term as a member of the Council of the American Society of Plant Taxonomists by attending the Council meeting and by serving as a judge for the best paper competition.

Don Paetkau and three SMC students, **Michaela Maughan, Maria Khan, Molly Maloy** (all '05) attended the 46th Annual Drosophila Research Conference (Genetics Society of America) in San Diego, CA March 30 - April 3, 2005. They all were co-authors on a poster, "Localization of the *su (rdgB)* 69 gene to the 100Bs region of chromosome 3" presented at the conference.

Tom Platt attended the 79th Annual meeting of the American Society of Parasitologists, held at the Doubletree Hotel, Philadelphia, PA, 24-28 July 2004.

Doris Watt attended the joint meeting of the Wilson Ornithological Society and the Association of Field Ornithologists at Beltsville, Maryland 21-24 April 2005. She presented a poster, "Comparisons of Stress in House Finches Using Heterophil to Lymphocyte Ratios," co-authored by **Danelle Duffy** ('05), **Leslie Kleczek** ('03), and **Shannon Meyer** ('02).



A Trip to the Andes: Back row - **Dr. Thomas Fogle**, Jon Gargano (ND student), **Erin Kriceri** (SMC '06), and Katie White (SMC '07). Front row - Teresa Stone (SMC '05), Dana Carr (SMC '05), Mary Schell (SMC '06), and Maureen Coughlin.

BIOLOGY CLUB

We had a phenomenal first meeting with a turnout of over 40 students and lots of food. At the first meeting we nominated committees to help organize events for service, social, and fundraising activities. Once the club was organized we planned a senior night at Chili's, we got a few fundraisers going, and we celebrated Hypatia Day. A few of our club members designed a great T-shirt for the club to sell as a fundraiser. Hypatia Day was a big success thanks to all of the volunteers that we had to help with tours and to assist in the labs. The younger girls had a great time! We finished out the year with an amazing Major of the Week. The seniors had a good time with the faculty at Chili's while the underclassmen decorated the department on Monday night. Wednesday the entire department was invited to have dinner in the new student center. The lasagna was a big hit. In April, the club elected new officers who will continue to do a great job making our department the best!

ALUMNAE NOTES

Compiled by Anne Susalla

ROLLIANA BINDER SCHECKLER ('62) is a volunteer nature guide at Newport State Park in Door County, WI where she specializes in wildflower identification and lore.



Anne
Susalla

TERRI MENKE HARGRAVE ('68) is a pediatrician specializing in child and adolescent psychiatry after finishing a recent fellowship in that field. She continues her research on factors associated with wheezing in early life.

REGINA IVORY LUPO ('73) works as a computer help desk specialist in Omaha, Nebraska (*Courier*, Summer 2004).

CATHLEEN CRONIN ('75) is a pediatric ophthalmologist at Loyola University Medical Center in Maywood, IL.

MARY CLARE PORRETTA-PASSERA ('75) is a physical therapist in Arcadia Township in Michigan (*Courier*, Summer 2004).

SUSANNAH NELSON LONGENBAKER ('78) is an assistant professor in the biological and physical sciences at Columbus State Community College in Columbus, OH. After being nominated by her students, she received the 2004 Distinguished Teaching Award from the college (*Courier*, Fall 2004).

PATRICIA DAHL ('79) is the chair of the board for the Eye Bank Association of America in Washington, D.C. as of July, 2004. She is the executive director of the Eye Bank for Sight Restoration in New York City (*Courier*, Fall 2004).

NANETTE TELMOS ('81) is a personal trainer, spinning teacher, and does some physician assistant consulting in Goodrich, MI (*Courier*, Summer, 2005).

BETSY CRONAN MALKUS ('83) is a physical therapist in St. Louis, MO (*Courier*, Summer 2004).

CAROL DAAB KIRSCHNER ('83) is a cardiac sonographer in St. Louis, MO (*Courier*, Summer, 2004).

MELANIE MARGIOTTA EICHORN ('83) is a family physician in Indianapolis, IN teaching in a family practice residency. She also works part time as an addiction specialist (*Courier*, Winter 2004).



Betsy Cronan
Malkus



Mary Jo Morey

MARY JO MOREY ('83) is a family nurse practitioner for the Veterans' Administration in South Bend, IN (*Courier*, Summer 2004).

LOUISE WEBER ('83) is a biology and environmental studies professor at Warren Wilson College in Asheville, NC. She devoted her sabbatical during Fall 2004 to writing about shore bird conservation and ecology (*Courier*, Winter 2004).

ELAINE BRENNER-ATKINS ('84) is an internal medicine physician in private practice in West Bloomfield, MI.

PATRICIA ANN PIELNIK ('84) is a psychiatrist with United Health System in Rochester, NY (*Courier*, Spring 2005).

TERESA MCGINNIS WHARTON ('85) is a senior lab technician at Lex Mark International in Lexington, KY. She is part of a technology group involved with testing and characterizing coating materials. Prior to this position, Teresa spent more than fifteen years in the environmental field with government and consulting groups.

ELISA CULLINA ('87) and family live in Aurora, IL where, among other things, she is a K-12 substitute teacher (*Courier*, Summer 2005).

LEIGH ANN HENRICKSEN CHAFIN ('87) is a research assistant professor in neurology at the University of Rochester in Rochester, NY.

COLLEEN WALKER ('87) is practicing internal medicine in Louisville, KY (*Courier*, Summer 2005).

AMANDA BRETZLOFF BALTIERRA ('89) completed her master of nursing degree in August, 2004. She is a family nurse practitioner in Charles Town, WV (*Courier*, Winter 2004).

BARBARA DAVIDS ('90) is a project scientist in the Department of Pathology, Division of Infectious Diseases, at UCSD Medical Center in San Diego, CA.

VERONICA GONZALEZ DIMARIO ('92) earned a DDS degree from Northwestern University Dental School in 1997. She worked at the Infant Welfare Society of Chicago to provide underprivileged and uninsured children with comprehensive dental care and was also an associate clinical professor in the Pediatrics Department at Northwestern University Dental School until its closing in 2001. In March, 2003, Veronica opened her own private dental practice in Chicago, IL.

CAROL GROBNER ('92) is a family practice physician with the United States Air Force and is now stationed at Elmendorf AFB in Anchorage, AK.

GRETCHEN BATH MARTIN ('93) received her Ph. D. in ecology from Old Dominion University in 2003. She is currently a research ecologist for the NOAA National Ocean Service and works at the Center for Coastal Fisheries and Habitat Research in Beaufort, NC (*Courier*, Winter 2004).

TRICIA PENNY PIRONE ('93) is an optometrist in Savannah, GA (*Courier*, Winter 2004).

KIMBERLY BRANSTETTER ORTMEIER ('94) graduated as a cytotechnologist from the University of Nebraska Medical Center and now works in Wichita, KS.

ERIN WACHTER HOLZGEN ('94) is an accountant and is working towards her master's degree in the science of accounting.

ELIZABETH BROGHAMMER TAKACS ('95) completed her urology residency at the State University of New York (SUNY) in Buffalo in June, 2005 (*Courier*, Summer 2004).

JULIE RADCA VIETA ('95) completed her medical studies at the Chicago



Julie Radca
Vieta

College of Osteopathic Medicine in 1999 and is currently chief resident in Obstetrics/Gynecology at Banner Good Samaritan Medical Center in Phoenix, AZ. She plans to open her obstetrics/gynecology practice soon.

SARAH SULLIVAN ('96) finished her MBA at Washington University in St. Louis, MO in 2004. She is currently president of the Saint Mary's College Alumnae Board of Directors.

MICHELLE WENNER CHESTOVICH ('96) has her medical degree from the University of Minnesota Medical School in Minneapolis and is a family medicine physician in St. Paul, MN.

RENAE WOZNIAK FRIGO ('96) works as a Naturalist/Interpreter for the St. Charles Park District in Elburn, Illinois. She received two awards in the past year: "Excellence in Environmental Education" awarded by the Kane-DuPage (Illinois) Soil & Water Conservation District and "Non-formal Educator of the Year" by the Environmental Education Association of Illinois.

MEAGHAN DRISCOLL STROTMAN ('97) graduated from the University of Illinois Dental School in Chigago in May, 2004 and is a resident at Illinois Masonic Hospital (*Courier*, Winter 2004).

JENNIFER GREEN BRACKNEY ('97) finished her residency at Chicago College of Osteopathic Medicine as chief resident of internal medicine in June, 2004. She was board certified in internal medicine and worked as a hospitalist in Muncie, IN before beginning a fellowship in rheumatology at Chicago College of Osteopathic Medicine.

NICOLE HANNON ('97) earned her medical degree from Indiana University School of Medicine, Indianapolis in 2001 and is currently finishing her residency in Obstetrics/Gynecology in St. Petersburg, FL.

JOLIE POKORNY FREEMAN ('97) is a healthcare representative with Pfizer Inc. in the Chicago area.

JILL RITTER ('97) has been working in clinical research at the University of Chicago for the past four years and is now applying for admission to an accelerated BSN program.

SARAH DAKEL ZUZULOCK ('98) is an associate environmental engineer for Kuipers and Associates in Montana.

MARGARET (MEG) KELLY FUENTES ('98) is a senior supervisor for Genentech, a biotech company, in CA (*Courier*, Spring 2005).



Sarah Dakel
Zuzulock

TERASA MORRIS ('99) earned a master's degree in nursing and is a registered nurse with the United States Air Force.

HEATHER NASH DOUNTAS ('98) has earned a bachelor of science degree with an emphasis in physician assistant studies from the University of New Mexico in Albuquerque, NM in 2004.

ELLEN BOUDETTE FLANIGAN ('99) has been an analytical chemist at Stiefel Research Institute in Oak Hill, NY (*Courier*, Summer 2004).

KELLY BROGDON WHITE ('99) is an occupational therapist at Children's Healthcare in Atlanta, GA.

COLLEEN CAMPBELL ('99) received a master's degree in human genetics and is currently in the Ph. D. program at the University of Iowa. Colleen is also a genetic counselor.



Charise
Desmarteau

CHARISE DESMARTEAU ('99) finished the physician assistant program at Wichita State University with honors in August, 2003. She is now working in family practice at the Kansas Medical Clinic in Topeka, Kansas (*Courier*, Summer 2004).

MARGARET (MEG) FISCHER SPARTZ ('99) graduated from the University of Minnesota Medical School in May, 2004 and is now a physician at the University of Minnesota in St. Paul (*Courier*, Winter 2004).

RITA KLEIN TAYLOR ('99) received her bachelor of nursing degree in May, 2005.

NICOLE KRAIMER ('99) has graduated as a registered nurse from the Massachusetts General Hospital Institute of Health Professions. She is now completing a master of science degree in nursing and will be a nurse practitioner in May, 2006.

JENNIFER LEMLER ('99), a biologist for JFNew, an environmental consulting firm, was recently transferred from Walkerton, IN to Grand Haven, MI.

ANGELA POMPILI ('99) graduated with a DMD (doctor of dental medicine) from Case Western Reserve University, School of Dental Medicine in 2003. Angela continued her education with a general practice residency at Louis Stokes Cleveland Department of Veterans Affairs Medical Center and is currently teaching at Nova Southeastern University College of Dental Medicine in Fort Lauderdale, FL.

STACY CANTER ('00) completed the physician assistant program at Chatham College and now works with a general surgeon in Lansdale, PA.

MARY CULLEY ('00) is a Ph. D. student in the Integrated Graduate Program in the Life Sciences at Northwestern University, Feinberg School of Medicine in Chicago, IL.



Emily Moriarty
Lemmon

EMILY MORIARTY LEMMON ('00) is in the doctoral program in evolutionary biology at the University of Texas in Austin and is still chasing frogs. In the Spring of 2004, Emily and her husband, a biology theoretician, conducted fieldwork for three months across 23 states covering 30,000 miles. Her publications include

E. C. Moriarty and D. C. Cannatella. 2004. Phylogenetic relationships of the North American chorus frogs (*Pseudacris*). *Molecular Phylogenetics and Evolution* 30:409-420.

A. R. Lemmon and **E. C. Moriarty**. 2004. The importance of proper model assumption in Bayesian Phylogenetics. *Systematic Biology* 53:265-277.

MELISSA SAKALEY ('00) graduated with a master of science degree in biology with an emphasis in microbial ecology from Central Washington University in June, 2005. She is now a corporate account manager for Biotrace International in Bothell, WA. Biotrace, a Welsh company, is a worldwide manufacturer and distributor of industrial and environmental microbiology products.

VICTORIA BUTCKO ('01) graduated from the Illinois College of Optometry in May of 2005 after completing an externship rotation in Tempe, AZ. She has accepted a residency position at Jesse Hines VA in Chicago.



Victoria
Butcko

KRISTEN FRAZER ('01) has accepted a position in Knoxville, TN where she will continue to work in prenatal genetic counseling (*Courier*, Summer 2005).

MEGAN JARDINA ('01) finished an accelerated nursing program at the University of North Carolina and is working at Children's Memorial Hospital in Lincoln Park, IL (*Courier*, Winter 2004).

BREANN KUTZER ('01) studied nursing after obtaining her bachelor degree in Biology from Saint Mary's. She is now a surgical intensive care nurse at Rush University Medical Center in Chicago and is in a master's program in nursing to become a critical care nurse practitioner.

EMILY PATTERSON ('01) graduated with a master degree in occupational therapy from Boston University in 2003 and is an occupational therapist in the Cambridge Public School District near Boston (*Courier*, Summer 2004).

SARAH HOSHAU ('02) has a fellowship position with Trinity Health Systems and is working with the executive team at St. Joseph Regional Medical Center in South Bend, IN (*Courier*, Spring 2005).

TERESA LORENZ ('02) is beginning graduate work in biology at Utah State University. Her research will involve a study of the population biology of Clark's nutcrackers as affected by the decline of whitebark pine trees in the Pacific northwest. For the past year, Teresa has been working for the Olympic National Forest in Washington state.

QUINN SHERN ('02) graduated with a master's degree in physical therapy from the Medical College of Georgia (*Courier*, Spring 2005).

THERESE SVAROVSKY ('02) has a position with the National Primate Research Center affiliated with the University of Wisconsin in Madison (*Courier*, Fall 2004).

JENA MORREALE ('03) graduated with a master's degree in physical therapy from Columbia University in New York in May, 2005. Jena and her partner received the

Neuhaus Award for Excellence in Research for their master's project. She plans to continue her studies with a specialization in pediatrics.

MARY ANN GERLACH ('04) is doing volunteer work in the internal medicine clinic at the M. D. Anderson Medical Center in Houston, TX.



Ecology Lab - Dick Jensen and students in the fall of 2003.

LEAH HOLDEN-CORBETT ('04) earned a B.S. in nursing from the Saint Mary's College Accelerated Nursing Program.

JAMIE KAZMIERZAK TACKASE ('04) is in the degree program at Rosalind Franklin University of Medicine and Science in Chicago, IL.

KATHLEEN KOCHANOWICZ ('04) earned a B.S. in nursing from the Saint Mary's College Accelerated Nursing Program.

SHANA ("from Atlanta") **O'CONNOR** ('04) is in the graduate pharmacy program at the University of Wyoming.

MARY PENDERGAST ('04) is pursuing a Ph.D. at the Utah State University Ecology Center in Logan, Utah.

JACQUELINE SENNOTT ('04) is in the master's program in biomedical science at Arizona College of Osteopathic Medicine (Midwestern University) in Glendale, AZ.

KRISTI TROGMAN ('04) is teaching biology at Lake Park High School, East Campus, in Roselle, IL.

AMBER VACHON ('04) earned a B.S. in nursing from the Saint Mary's College Accelerated Nursing Program.

JULIA ADAMS ('05) is a medical student at Loyola University School of Medicine in Chicago, IL.

SHANNON ARTNAK ('05) is participating in the ACE (Alliance for Catholic Education) program through the University of Notre Dame. Shannon is in Fort Worth, TX, teaching middle school science and coaching the school soccer team.

EMILY BEYLER ('05) is in the Physician Assistant program at Butler University.

LISA CREDO ('05) is in Medical School at Louisiana State University in New Orleans. We received the following from Lisa (via e-mail) in the aftermath of **Hurricane Katrina**: "I am very fortunate - my family made it out of town last week with some photo albums and a few pairs of clothes. In fact, we are lucky that we made it out at all. Of course, my city is still underwater, and very few people I know still have habitable houses. My family found somewhere to stay for now in Lake Charles, Louisiana. Some of y'all asked about LSU Med School- [it] has been moved to Baton Rouge and classes will resume in about two weeks. I have some worries because everything I own, including all the books I just bought, my car, and all of my clothes are back in my apartment, which is located about a block from the Superdome. Also, all available housing seems to be taken in Baton Rouge, so I hope I find somewhere to live."



Danelle Duffy

DANELLE DUFFY ('05; pictured left at work in Doris Watt's lab) is beginning her studies in the Ph.D. program in animal physiology at Clemson University in Clemson, SC.

JENNIFER FOERTSCH ('05) is in the Osteopathic Medical Program at Ohio University.

DENAE FRIEDHEIM ('05) is living in Chicago, has a job at a flower shop that specializes in exotics, and is conducting research at the Institute for Health Research and Policy and the University of Illinois.

MARIA KHAN ('05) is in medical school at the University of West Virginia.

BARBARA KIERL ('05) is in the physician assistant program at Midwestern University in Downers Grove, IL.

MOLLY MALOY ('05) is participating in the Jesuit Volunteer Program in the Northwest.

HEATHER MUSE ('05) is in the Ph. D. program in animal science physiology at Purdue University in West Lafayette, IN.

ELIZABETH SCHOWE ('05) is in medical school at Indiana University.

ANDREA SZOSTEK ('05) is pursuing a doctor of pharmacy degree at Purdue University.

ANNOUNCEMENT AND REQUEST

As part of the BIO 150 Lecture Series class the students are asked to contact biology major alumnae via email. We are trying to generate a list of alums who the students can connect with if they have questions about various careers. We have a limited number of alumnae participating that we have located through the alumnae office and Dr. Susalla's list. Alumnae are identified by the students according to their perceived career interests. However, last year most of the students found that the listed email information was no longer valid. I would greatly appreciate it if readers of the newsletter who are our graduates could take a moment and send me or Dr. Susalla an updated email address (via email to asusalla@saintmarys.edu) with your past and/or current name, date of graduation, and current occupation. Then in November expect some students to contact you with a few questions about your occupation. Thank you! (*_*) DW (Doris Watt email: [dwatt@saintmarys.edu](mailto:d watt@saintmarys.edu))

PUBLICATIONS

Dombkowski, R.A., M.J. Russell, A.A Schulman, M.M. Doellman and K.R. Olson. 2005. The vertebrate phylogeny of hydrogen sulfide vasoactivity. *Am. J. Physiol. Regul. Integr. Comp. Physiol.* 288: R243-R252.

Dombkowski, R.A., M.J. Russell, and K.R. Olson. 2004. Hydrogen sulfide as an endogenous regulator of vascular smooth muscle tone in trout. *Am. J. Physiol. Regul. Integr. Comp. Physiol.* 288: R678-R685.

Fogle, T. 2004. Using dermatoglyphics from Down syndrome and class populations to study the genetics of a complex trait. Pp. 99-124 in *Tested Studies for Laboratory Teaching*, Volume 25. (M. A. O'Donnell, Editor). Proceedings of the 25th Workshop/Conference of the Association for Biology Laboratory Education (ABLE).

AWARDS & HONORS

Each year the Department of Biology recognizes students who have made outstanding contributions to the Department or who have performed exceptionally well in certain areas. Awardees for 2005 are



MOTHER ROSE ELIZABETH AWARD

Heather Muse

GEORGE & JUANDA BICK NATURE AWARD

Shannon Artnak

SISTER M. ROSALEEN DUNLEAVY ALLIED HEALTH AWARD

Andrea Szostek

In addition, two graduating seniors were selected as recipients of a **Sigma Xi Prize for Undergraduate Research**:

Danelle Duffy

Heather Muse

The Sigma Xi prize consists of a certificate of Associate Membership in Sigma Xi and a one-year subscription to *The American Scientist*.

ALUMNAE UPDATES

One of the things that is most enjoyable about preparing this Newsletter is learning what our alumnae have been doing. Please keep us updated on educational and professional achievements and career changes in your life. Use the form below to provide material for a future Newsletter.

Name _____
 (first) (maiden) (married)

Saint Mary's College Class of _____

News for a future SMC Biology Newsletter: _____

Include a recent photo, if you wish.

Please return to: Dr. Anne A. Susalla
Biology Department
Saint Mary's College
Notre Dame, IN 46556

e-mail: asusalla@saintmarys.edu

Visit the Department of Biology Website at
<http://www.saintmarys.edu/~biology>



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Biology Department
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