Mission Statement: The Association for Women in Science, Inc. (AWIS) is a non-profit organization dedicated to the achievement of equity and full participation of women in all areas of science and technology.

NEWS

Letter from AWIS-San Diego President Janet White



Dear AWIS-San Diego members,

Late summer is one of my favorite times of the year. I feel more energetic as the temperature cools, and I look forward to new beginnings – the new school year, the busy fourth quarter at work as colleagues return refreshed from vacation, and the AWIS program of activities.

Now is a great time to re-evaluate and prioritize how we spend our time and what we really want to accomplish by the end of the year – which class we will take, what skill we will learn, which project we will complete. Volunteering to serve on an AWIS committee can be a wonderful experience, and many of our committees are welcoming new members right now. Why not consider joining an AWIS committee this fall?

Many of our committees offer training. For example, the Newsletter Committee will be running a workshop on writing skills in September. We have opportunities for members to get involved in projects, organize events, participate in outreach activities, and become involved in the scholarship program. By far the greatest benefit from volunteering comes from getting to know other AWIS members and developing new friendships.

On Thursday October 13 from 5:30 to 8:00 p.m., we will hold our annual Open House, where you can meet other AWIS members, find out about our many activities, and sign up to become a committee member. Check the website at www.awissd.org for details and directions. I hope to see you there!

Janet

Inside this Issue	Page
NEWS	_
Letter from the President	1
Upcoming Events	1
Call for Volunteers! Open House 2005	1
Science Writing Course	2
American Chemical Society National Meeting	2

FEATURES/OPINIONS	
Member Profile: Cindy Atwell	2-3
Delivering a Spoonful of Health to California	3-4
Pearl Meister Greengard Award for Women in Science	4
A Day in the Life of the Neuter Scooter	4-5
DEPARTMENTS	
Book Review: "The Blank Slate"	5
Your Two Cents: Deceased Scientist	5
Member News	5
General Information	6

Upcoming Events

Compiled by Janice Payne

September 20: Workshop with Ray Lucia, Certified Financial Planner®, Entertainer, Radio Talk Show Host and author of *Buckets of Money®*; Conference Room at the Ray Lucia Studio, 13520 Evening Creek Drive-North, Suite 300, San Diego, CA 92128. This is located at the end of Hwy 56 at Hwy 15. To RSVP: go to the Calendar of Events at http://www.sdawis.org/and click on Financial Methods for Success Event on September 20th. This will prompt you to register on-line for the event.

October 3: Strategy Session. Members-only event. Mentorship: How to Find it. The Salk Institute. 6-8 p.m.

October 13: Annual AWIS Open House. Come and see what AWIS is all about. Location: Avanir Pharmaceuticals. Time: 5:30-8 p.m.

November: Forensics. Location: Burnham Institute, Date and time: TBD

December 5: Strategy Session. Members-only event. Management Skills: Up and Down the Ladder. The Salk Institute. 6-8 p.m.

December Social: Casino Night, Date and time: TBD

Call for Volunteers! Open House 2005

By Julie Kinyoun

Open House 2005 is quickly approaching. The event will take place on October 13, 2005 at Avanir Pharmaceuticals at 5:30 p.m. Prior to that day we will need volunteers to help organize the catering, speakers, communication between committees and communication with the general AWIS-SD membership. On the day of the event, volunteers are needed to set up, clean up, and be available for miscellaneous jobs. Contact Julie Kinyoun at julieawissd@yahoo.com or Lisa Whalen at

Page 1 Sept/Oct 2005

Science Writing Course

Instructor: Lynne Friedmann, AWIS Fellow UCSD Extension/Fall 2005 6:30-9:30 p.m., Wednesdays Sept. 28-Nov. 30 (9 meetings; no meeting Nov. 23)

This course is an introduction to science journalism (print/broadcast/Web media) and other kinds of science writing (magazines, books, news releases, newsletters, museum exhibits), with a focus on writing techniques and strategies to help an audience of general readers understand scientific information. Also covered are opportunities for science writing, constraints that shape coverage, ethical issues that govern the reporting of scientific information, and the cultural place of science in society. Activities include broad reading and analysis of contemporary science writing together with in-class and outside writing assignments. NOTE: Technical writing and the writing of scientific papers are not the focus of this course.

To register go to:

http://www.extension.ucsd.edu/>www.extension.ucsd.edu/ Questions? E-mail Lynne Friedmann: lfriedmann@nasw.org

American Chemical Society National Meeting Held in August

By Sama Tamrakar

The 230th national meeting of the American Chemical Society (ACS) was held in Washington D.C. from Aug 28 to Sept 1, 2005. It was open to everyone interested in chemistry. Over 12,000 attendees convened and presented their own research, heard about important advances in the areas of their interest, and networked with colleagues.

The meeting program included many special events, symposia and workshops. Over 7400 presentations encompassed 33 technical divisions and the six multi-disciplinary themes - Biotechnology, Nanotechnology, Defense, Green

Chemistry/Pollutants/Sustainability, Energy, and Professional Development.

Examples of topics included:

- Advances in Fuel Cell Research
- Nuclear Forensics
- · Cosmetic Nanotechnology
- Fluid Chromatography

This year, five symposia and special presidential events were devoted to develop scenarios about how the chemical enterprise (education, industry, and government) will change in the next 10 years.

The Women Chemists Committee (WCC) set up a range of programs focusing on the trends and transitions in careers of female chemists. Sample of topics included: "Women in Industry," "Federal Grants: Funding for Young Investigators," and "WCC/Eli Lilly Travel Grant Poster Session."

As a part of a career program designed to assist graduate students and postdoctoral scholars, 170 academic job candidates were given the opportunity to present research posters and posters expanding on their research interests and teaching philosophies at various sessions including SciMix, the popular interdisciplinary poster session. For those interested in learning new skills or learning about

specialty topics, numerous workshops and short courses were also offered. To top it off, several excursions and tours to various sites of interest were arranged for attendees.

To read about future ACS meetings, visit their website at www.chemistry.org.

FEATURES / OPINIONS

Member Profile: Cindy Atwell By Hima Joshi



"I can't imagine not having AWIS-San Diego," says Cindy Atwell, co-chair of the AWIS-SD Events Committee. The first AWIS event she ever attended was the 2003 Women in bioScience Conference (WIB). Atwell has a bachelor's degree in biochemistry and molecular biology from Penn State University, and she had been working at Quorex since she moved to San Diego in 2001. Her plan was to get a Ph.D., but at the Alternative Careers workshop at WIB 2003, she decided to change her path. "It didn't occur to me that I could do something in science but have a different type of degree," she says. Atwell began to consider business school for the very first time. "It was AWIS that put that idea in my head," she says. The Chief Scientific Officer (CSO) at Quorex encouraged her to check out UCSD's Rady School of Management, a new business school with a biotechnology and high technology focus.

This fall, Atwell will be leaving Favrille, where she has been working since February, to be in the first group of full-time MBA students at the Rady School. Rady was established in 2001 and welcomed its first part-time MBA students in 2004. Atwell is looking forward to being a pioneer at Rady. "We're going to start all of the clubs," she says. "We definitely want some kind of cooking club." She also wants to have a venture club that will encourage entrepreneurship and bring in venture capitalists. There is already a group called Rady Ladies, in which former AWIS-SD president and current Rady student Elaine Weidenhammer is actively involved.

Atwell first became interested in science in her junior year of high school. "I started reading Scientific American and whatever was in my high school library," she says. "[Science] sounded so cool." She began working in Professor Susan Abmayr's muscle development lab at Penn State in her first year of college. "At first, I was just doing dishes, but eventually I was mutating flies," she says. She recalls one experiment that involved testing the flight of flies. She put flies in a container that was partly filled with water and had sticky walls. "If they couldn't fly, they'd fall in the water. If they could fly, they'd get stuck to the sticky paper," she says. "I counted so many flies."

Page 2 Sept/Oct 2005

During her time at Penn State, Atwell began studying tang soo do, a Korean martial art, to develop her skills in self-defense. She had never worried about safety before. "I came from a really small town where no one locks their doors," she says. "It took me a month to learn to lock my door at my dorm." Her hometown of Stoneborough is about 90 miles north of Pittsburgh, PA. There is only one store and a hitching post for the Amish horse buggies. "You have to drive 45 minutes to see a movie," she says.

A year and a half after moving to San Diego, Atwell took up kung fu, and she eventually let herself get talked into taking an instructor training course. "It was hell," she says. But, the experience paid off. She now teaches private kung fu lessons four evenings a week to students between the ages of four and 70. "It's such a great feeling," she says. She describes the students who come in not knowing their right from their left. "Those are the ones you really love because they make you better," she says. She finds that "kids can do the moves really easily," but they have trouble focusing. Adults have the opposite problem. "It's hard to get them to relax," she says. Atwell placed second in a weapons division at an instructor tournament on July 30.

Atwell joined AWIS when she registered for WIB 2003. At the AWIS-SD Open House that fall, she met Fan-Li Chou, a former cochair of the Events Committee, who encouraged her to get involved. Atwell has been on the Events Committee ever since. She and Rosemary Cesario are the current co-chairs of the Committee. Atwell's main goal for the Committee is to maintain the quality of speakers they have been providing while balancing old and new topics. She would love to be able to provide childcare once in a while so it will be easier for members with kids to attend events. Atwell is also involved in planning the upcoming AWIS-SD Gala.

Delivering a Spoonful of Health to CaliforniansBy Siobhan Malany

"It's amazing to me how inexpensive it is to prevent disease. One drop of vaccine stops polio," states Violet Macias, executive director of the California Distance Learning Health Network (CDLHN). Macias pinches her thumb and index finger together to emphasize the minuteness of eradicating something so debilitating. The challenging part is providing education to health care professionals and the public alike and establishing a system so "that drop" gets to the right people at the right time. That is in large part what CDLHN is all about.

An entity of the Graduate School of Public Health at San Diego State University and operated through the University's Research Foundation, CDLHN produces media broadcasts and on-site training covering topics from nutrition and immunizations to bioterrorism and policy development. CDLHN is a central nerve in a California health network with a direct line to the Centers for Disease Control (CDC). As the director of CDLHN, Macias oversees the fiscal budget provided under the CDC federal grant and directs the work of 65 professionals and staff. CDLHN also receives grants from the California Department of Health Services to direct bioterrorism preparedness and from the County of San Diego, Health and Human Services in support of the Flu Awareness Campaign.

"The two paths are constantly crossing," states Macias of bioterrorism and immunization. She explains that, as the seventh largest city, San Diego has concerns about bioterrorism. Having immunization campaigns in place is critical for responding to a major health threat. As far as immunizations for children, Macias remarks, "we [California] are doing a good job. We are leading the nation." As for adult immunization, she says, "we are falling short." CDLHN addresses this health disparity by promoting National Adult Immunization Week in addition to its promotions for child vaccinations. Still, the number one health problems in California and the nation, in Macias' opinion, remain obesity and diabetes.

Public relations are a big part of the job for Macias, who attends several conferences and speaking engagements annually and maintains affiliations with numerous health organizations. "Having the people skills to connect to other members in the community is so important, says Macias, "to build collaborations and a network." Macias has also learned to be flexible with funding. In an environment that is constantly experiencing budget cuts, Macias emphasizes, "one can't be too tied to a source of money." Securing funding and sponsors is a big challenge, but Macias finds, "[at CDLHN] there is always something I am learning. It's fascinating to me." During her six years as the director, she has seen the annual budget grow from one million to five million.

A native of Buenos Aires, Argentina, Macias is accredited with bringing bilingualism and biculturalism to CDLHN. "I have fought hard to spend the money to have everything produced in Spanish," she says making a fist with one hand. Macias received a Master of Science degree from the University of Salvador before immigrating to the U.S. where she received a second master's degree from the University of Massachusetts in counseling psychology. Her many years of counseling and outreach service naturally led her into the realm of public health. Macias moved to San Diego in 1996 and joined UCSD School of Medicine as an educator for cancer prevention and control, an area that hits close to her heart. "I lost my father to lung cancer. I was just 24." Macias provided counseling over the phone for pregnant women who wanted to quit smoking. She helped raise awareness of the risk of low birth weight and birth defects due to smoking or being exposed to second-hand smoke during pregnancy.

Macias extended her counseling to the streets of the Latino community as a volunteer for SDSU. During the six-week project called "Proyecto Sol", she went door to door in southeast San Diego promoting smoking cessation for Latinos. Entering people's homes, Macias became in touch with the face of public health. "I won't forget," she recalls, "I visited one man and realized he had TB. I helped refer him for treatment." The volunteer work at SDSU eventually landed Macias the directorship at CDLHN where she continues to lead initiatives targeting women and minority communities under the Healthy Women/Healthy Families Bicultural Campaign. The Campaign promotes nutrition, healthy lifestyles and the use of folic acid to prevent birth defects.

At CDLHN, Macias has advocated extending our educational resources across international boundaries. "Disease knows no borders," she simply states. In partnership with the US-Mexican Commission and other binational health coalitions, CDLHN helps raise awareness of health issues and the availability of care and treatment along the US-Mexican border. During Border Binational Health Week, every border state launches a different public health event, such as a vaccination week, all at the same time. The initiative is an offshoot of the Week of the Americas sponsored by the Pan American Health Organization (PAHO), which involves each country in North and South America. CDLHN participates in both events.

Page 3 Sept/Oct 2005

Macias' advice to female professionals is "have perseverance when you have a goal in mind. I was raised to think that I could do anything." Macias applied this motto when she immigrated to the U.S. in her early twenties, traveled across the country to begin her career and went door to door during her grass-roots efforts. "I never gave up." Now, her goals at CDLHN to translate all productions into Spanish and extend educational programs into Mexico are being realized. In a major collaboration with EDUSAT, Mexico's largest satellite network, all of CDLHN's productions will be up linked for distribution through the 14 television stations serviced by the network. The project is due to be completed near the end of the year, which will mark CDLHN's 10th anniversary.

Pearl Meister Greengard Award for Women in Science

By Janice Payne

Pearl Meister Greengard never met her son. Unfortunately, she died giving birth to him in New York City on December 11, 1925. She didn't know of his interest in biophysics or his work on nerve cell function. She missed his Nobel Prize ceremony in 2000 for his work at Rockefeller University.

She would, however, have been truly honored to know that her son, Nobel Laureate Paul Greengard, generously created the Pearl Meister Greengard award with a portion of his Nobel Prize winnings.

The Greengard award was established because "women have made enormous strides in science, but they are not yet receiving awards and honors at a level commensurate with their achievements," comments Greengard.

The annual award in the amount of \$50,000 is administered by Rockefeller University, and the recipients are chosen by a committee of nine scientists, six of whom are Nobel Laureates. The first recipient in 2004 was Nicole Le Douarin, secretary of the French Academy of Sciences and professor at the College de France. Le Douarin developed techniques that allowed her to follow the fate of individual cells in a developing embryo.

One unique aspect of the Greengard prize is that "a woman who has distinguished herself in law, politics, the arts or the sciences" presents it to the recipient. Supreme Court Justice Sandra Day O'Connor presented Le Douarin's award.

The 2005 Pearl Meister Greengard award recipient is Philippa Marrack, investigator at the National Jewish Medical and Research Center in Denver, Colorado. Marrack is renowned for her many years of work in T cell activation. Presentation of the Greengard award to Marrack will take place later this year.

Paul Greengard, who is still an active researcher and head of the Laboratory of Molecular and Cellular Neuroscience at Rockefeller University, should be commended for his generous support of women in science.

A Day in the Life of the Neuter Scooter By Kelli Barnett

It may look chaotic at first, but the drop-off hour is an important first step in starting a successful day on the Spay Neuter Action Project's mobile surgery bus, affectionately known as the "Neuter Scooter." Between 20 and 40 pets, including cats, dogs, and rabbits, are brought by anxious owners, who fill out medical histories, pay a discounted spay/neuter fee, and are given strict post-operative care instructions. Inside the bus, the staff is busy calculating dosages and looking over the day's patients. At 9:00 a.m., the surgeries begin, and the staff works like a well-oiled machine. A skilled, registered veterinary technician and her assistant systematically give anesthesia to one animal at a time and move them in and out of the surgery suite. Depending on the sex and size of the animal, surgery lasts from five to 15 minutes. The animals quietly recover in the air-conditioned bus and, later that afternoon, are happily reunited with their owners. Outside. volunteers are busy educating the public about proper grooming. handling, training, and health care, and referring people to clinics in their neighborhoods that can meet their pets' needs.

The Spay Neuter Action Project (SNAP) is a non-profit organization started in 1991 by La Jolla resident Candy Schumann and Encinitas councilwoman Maggie Houlihan. The board of directors is comprised of a group of volunteers with a long history of volunteer and foster work. The SNAP mission is to achieve zero euthanasia of adoptable and treatable pets in San Diego County through prevention – by creating public awareness, and providing educational materials and reduced-fee spay/neuter procedures. SNAP is supported by private donors and foundations such as Price Charities, The Animal Trust Foundation, and PETCO Foundation.

The mobile spay/neuter bus was used for several years as an educational tool to spread the message about pet over-population and the importance of neutering pets. In 2002, the SNAP board of directors placed an ad for a veterinarian with experience in highvolume and early-age spay/neuter work. I was a full-time graduate student at UCSD, looking for weekend work doing surgery. It was a perfect match. Schumann set to work writing grants and fundraising. The emphasis was to target areas where out-dated ideas about neutering prevailed and where surgery was not financially feasible. The staff was hired, the instruments were ordered, and surgery started that August. Working only two weekends a month at first, our operations manager, Jennifer Klotch, was booking appointments several months in advance. We eventually had to fill every weekend. Our funding allowed us to focus on the neighborhood of City Heights, and we have been in their area for the past two years and have spayed over 3500 animals. In the past year, we have added rabies vaccinations and helped the county's animal control department issue licenses for pets. With all of these efforts, we hope to improve the health and safety of the community.

SNAP has also reached out to the children of the community by providing visits from our educational director, Dorell Sackett. The children are invited to become "SNAP Dragons" and sign a pledge to promote kindness to animals and to teach others how to raise healthy, happy pets. She makes trips to local schools with furry friends and fun games that teach children responsible pet ownership and the importance of good pet care.

Page 4 Sept/Oct 2005

SNAP has been a great organization for which to work, and their impact on the community will last for generations. If you'd like to learn more about volunteering or donating, please visit our website at www.SNAP-sandiego.org. And if you see that big bus driving down the freeway on the next surgery day or participating in your local holiday parade, be sure to give us a big hello!

Kelli Barnett joined AWIS-SD after the WIB Conference in May. She recently earned a master's degree from the Department of Molecular Pathology at UCSD. She has a veterinary degree from Mississippi State University.

DEPARTMENTS

Review from the AWIS-SD Book and Movie Club: "The Blank Slate: The Modern Denial of Human Nature"

By Peggy Wallace and Jay Aiyar

Steven Pinker's "The Blank Slate" is a challenging book to read, so many Book and Movie Club members read only the "hot button" chapters of interest to them such as Politics, Violence, Gender, Children and The Arts. Pinker is a professor of psychology at MIT and researches visual cognition and the psychology of language.

Pinker refers to three different models and dismisses them with his theories. The concept of the Blank Slate is that the mind has no innate traits; it is a tabula rasa, imprinted by our environment. The term Noble Savage means that people are born good and then corrupted by society. The Ghost in the Machine is the idea that each of us has a soul that makes choices that are free from our biology.

Pinker's theory is that human beings have an inherited universal structure shaped by the demands made upon the species for survival that still allows room for cultural and individual variations. He gave substantial weight to genetics in balancing biology and fate versus free will and spirituality. Pinker demotes cultural relatives (the supremacy of nurture over nature). He believes that people of all cultures share inborn predispositions, and our common nature springs from our common biology. He further states that differences among people are much smaller than what we have in common and what is primarily biologically determined.

The main criticism of the book is that the author has a bias. He justifies complex human behavior and morals using genetics, rather than drawing on conclusions from biological observations. The arguments lack solid data.

Our group's lively discussion focused on the importance of free will and the notion that the spiritual element is uniquely human. One attendee pointed out that there is little difference genetically separating humans from primates, yet there is a colossal difference in creativity and emotions.

One reassurance found in the book was that one should do one's best in raising children; however, total responsibility for how a child turns out is so strongly influenced by genetics. So, parents cannot obsess about perfection in their parenting. This is an interesting concept that provides solace to parents waiting for teens to come home late at night.

Our group maintained that free will is crucial. We thought that although we might be hardwired to react a certain way, experience can teach us over time to make better judgments for our future.

Pinker's reliance upon genetic determinism can lead to making moral decisions through genetics and laying the responsibility for each of our actions at the feet of genetics. Thus, one could avoid personal responsibility for one's actions and the results of these actions.

We gave the book an average of 3.00 stars before our discussion and 3.33 stars after our discussion.

Your Two Cents

Compiled by Hima Joshi

Question from last time:

If you could invite any deceased scientist to give a talk at your work, home, or cocktail party, whom would you invite, and what would you ask that scientist?

Responses:

I'd invite Barbara McClintock and ask her all about the ins and outs of doing science without actually having your own lab space. I'd want to hear all her stories about driving around the country, back and forth, to get her work done by whatever means necessary.

– Samantha Zeitlin

I would invite Rosalind Franklin and ask her to give us her account of the contribution she made to the discovery of the structure of DNA and the nature of her relationship with Watson and Crick. I would also ask her to describe the challenges she met at her time as a woman scientist. In addition, since I brought her back to life, I would ask the Nobel Prize Committee to grant her the well-deserved share of the Nobel Prize for the discovery of the structure of DNA. – Sherry Nouraini

Barbara McClintock, 1983 Nobel Prize winner for the discovery of "jumping genes" or transposons in Indian corn. I would ask her how she found the drive to continue her research even when it wasn't taken seriously by her peers. – Karin Lucas

Question for next time:

What's your favorite movie and why?

We would like to publish your responses to this question in the next Newsletter. Please reply to Hima Joshi (hjoshi@sandiego.edu). **Note:** Unless you indicate that you would like to remain anonymous, your name will be included with your response.

Member News

Janet White has joined Structural GenomiX as the director of business development.

Have you recently published an article? Do you have a new job or career? Send your news to Hima Joshi (hjoshi@sandiego.edu) or Janice Payne (janice_payne@hotmail.com). We'd love to hear from you!

Page 5 Sept/Oct 2005

About the AWIS-SD Newsletter

The AWIS-SD Newsletter is published six times per year and provides AWIS members and supporters with information on Chapter activities, career development, and issues related to women in science.

September/October Newsletter staff:

Hima Joshi Julie Kinyoun Joanne Mullen Janice Payne Siobhan Malany Sama Tamrakar

Susan Paz

Write for the AWIS-SD Newsletter!

If you are an AWIS-SD member, we encourage you to contribute articles to the Newsletter. Please send articles as MS Word attachments to Hima Joshi (hjoshi@sandiego.edu) or Janice Payne (janice payne@hotmail.com). News articles should not exceed 250 words, and event summaries may not be longer than 500 words. Feature articles (special-interest stories and profiles) should not exceed 1000 words. The submission deadline for the next issue is October 7, 2005.

IMPORTANT INFORMATION ABOUT



San Diego Chapter

Website: http://awis.npaci.edu E-mail: AWISSD@hotmail.com Mail: AWIS, San Diego Chapter PO Box 178096

San Diego, CA 92177-8096

National Chapter

Telephone: (202) 326-8940 Website: http://awis.org E-mail: awis@awis.org Mail: AWIS National

1200 New York Avenue, NW, Suite 650

Washington, DC 20005

IMPORTANT CONTACTS

AWIS Board

President Janet White Vice President Karin Lucas Past President Anna-Maria Hays Kathy Ogilvie Treasurer Secretary Karin Zeh Sheela Talwalker Member at Large Interim Members Hima Joshi

Fran Putkey

To contact the Board, visit the following website: http://awis.npaci.edu/officers/biographies.htm

AWIS National Councilor (San Diego Chapter)

Sonya Summerour Clemmons

To contact Sonya, visit the following website: http://www.awis.org/network/board.html

Committee Chair(s) Book and Movie Club Amy Cullinan Corporate Sponsorship Susan Myers Fitch Sheela Talwalker Events

Cindv Atwell Rosemary Cesario

Julie Kinyoun Membership

> Lisa Whalen Janice Payne

Newsletter Hima Joshi Outreach

Alicia Bicknell Holly Heaslet

Susy McKay Laura Waggoner **Public Relations** Jenafer Evans Scholarship Strategy Sessions Swanie Schmidt Website Barbara Armstrong

To contact the committee chairs, visit the following website:

http://awis.npaci.edu/officers/committeechairs.htm

Page 6 Sept/Oct 2005