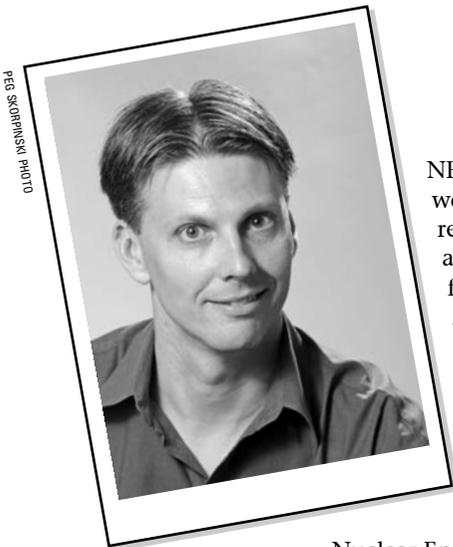


“In the great Berkeley Free Speech tradition”



PEG SKORINSKI PHOTO

NE faculty won major research awards this fall. Associate professor **Brian Wirth (pictured)** won the Global

Nuclear Energy Partnership Readiness and the Nuclear Energy Research and Development-University Consortia awards. Professor **Edward Morse** and associate professor-in-residence **Kai Vetter** won Academic Research Initiative awards. Professor **Joonhong Ahn** will share Japan's Global Center of Excellence grant with the University of Tokyo.

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By day, Shahed Amanullah (B.S.'91 CEE) works as a project manager for a Texas development firm. By night, he logs on to *altmuslim.com*, an online news and discussion forum he created and launched in 2001. As editor-in-chief, Amanullah oversees six volunteer editors and a team of contributing writers who debate important issues facing Western Muslims today.

The site's news summaries strive for objectivity, Amanullah says, and its opinion pieces encourage discussion. An entry about a Canadian girl who was asked to remove her *hijab* (headscarf) elicited more than 40 responses from readers. With 8,000 unique visitors a day, *altmuslim.com* is the go-to place for many Muslim Americans reading and discussing ideas that affect their community, and non-Muslims in high places are paying attention.

The Department of Homeland Security, State Department and National Security Council rely on Amanullah for briefings. So does the media. The father of two has made appearances on national television and contributed analyses to *The New York Times*, *Newsweek* and the *Washington Post*. That's catapulted Amanullah from regular-guy webby to Muslim American advocate—all to promote open dialogue. “We’re in the great Berkeley Free Speech tradition, where people have a safe and welcoming space to discuss ideas and ask hard questions of each other in a civil and respectful manner,” he says.

In fact, it was at Berkeley where Amanullah, an American citizen whose parents are from India, first earned his advocacy stripes. He

helped found the Progressive Muslim Alliance in 1988, which morphed into today's Muslim Student Union.

Altmuslim.com traces back to September 11. “Most Muslims I know didn't want anything to do with 9/11 or the aftermath,” he recalls. “It was just too much of a nightmare scenario for them. And most responses from the Muslim community were, for my tastes, too

dismissive of the real fears that Americans had. It's not easy to talk about extremists in your midst. But I knew silence was not an option. If we didn't ‘own’ our problems, other people would.”

Amanullah envisioned an Internet-enabled community. With a startup veteran's love of technology, he

coded the site himself and christened it with a nod to the alt./ usenet newsgroups, the original computer discussion forums first created in 1980.

Last year, a Danish newspaper ran a cartoon of Mohammed that enraged Muslims worldwide. *Altmuslim.com* advocated ignoring the cartoon. “I think many in the Muslim community were waiting for someone to take this position so that they could rally around it,” he says. “I think we shaped a lot of the debate.”

The civil engineer claims no personal agenda other than concerned dad. “I want my children to grow up in a country where they, as Muslims, feel valued,” he says, “and where their religion doesn't contradict their nationality.”

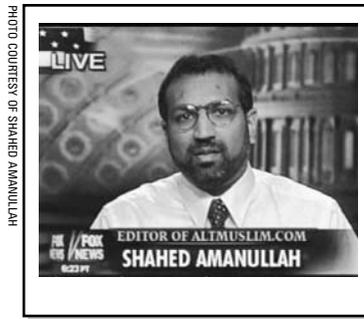


PHOTO COURTESY OF SHAHED AMANULLAH

COMMENTATOR: Shahed Amanullah appears on Fox News.

DANN BRAUER PHOTO

www.altmuslim.com



Some Disassembly Required



MEGAN WILLIAMS PHOTO

DISSECTED: EE 24 students examine the innards of an iPod.

In EECS professor Jeff Bokor's freshman seminar, it's mass destruction every week. CD players and laptops, gutted. Laser printers and scanners, dismantled. PlayStation controllers and

iPods, ripped down to their tiny parts.

Today, it's two video projectors. Huddled around the projectors' exposed insides are 15 freshmen who — through the joys of taking things apart — get an inside look at the cool gizmos electrical engineers make.

One student extricates a projector's lightbulb. "Whoa, it's huge!" he exclaims. "That's cool."

"Look at the bulb on that bad boy!" Bokor rejoins, peering over several students who are vigorously wielding screwdrivers. "Typically that would be about \$200 to replace."

Continued on page 2

DANNY BRANDEE PHOTO



MAKING CONNECTIONS

OAKLAND OUTREACH: CEE sophomore Christine Chung (left) helps Oakland Unity High School girls learn how light can carry information during a hands-on experiment. Chung and other Berkeley Engineering women led the after-school activity as part of the College's partnership with Techbridge, an outreach program to encourage girls in science and engineering.

How do you relieve stress during midterms?



Lavanya Wusirika, BioE junior

I mostly listen to music. Sometimes I exercise, but not that much, and I paint. I like rock music or something loud that can drown out other thoughts.



Todd Russell, CEE senior

I fence with the Cal Club. I think exercise in general clears your head.



Dylan Brown, ME freshman

I go running. I went on the trails past Strawberry Canyon Recreation Area above Memorial Stadium the other day. The solitude is relaxing.



David Shis, BioE senior

I'm on the UC Berkeley Ballroom Dance Team. The exercise gets your endorphins going, and it's also really social. It's not something I'm doing for a grade.

Disassembly Required

Continued from page 1

"That's probably how the company makes its money," another student replies, ever so astute.

Bokor knows his students know technology. But they don't have much experience with the actual hardware, he believes. "My theory, and it's just a theory, is that students nowadays aren't building radios," he says. "They're not working on cars. So this seminar is a fun way to get some hands-on experience at seeing what's inside gadgets and what they do."

During a typical class, a designated student makes a presentation on the day's product and discusses different types available on the market, how they work and the technologies that power them. The class then divides up, gathering around a few specimens and toolboxes that contain small screwdrivers and Allen wrenches. "Let's open 'em up!" Bokor calls, and the fun begins.

To collect gadgets doomed for disassembly, Bokor sends an email to the EECS department; faculty, staff and students generously donate their discards and has-beens, he reports.

Today's video projectors are a big hit. Students examine prisms and circuitry, lenses and focal housing. Bokor helps them hunt for specific things, what he calls "treasures."

"Ah! There's a fan that cools the beam-splitter," he says, holding up a part after one student triumphantly works it free. "Why is there a fan? What do you think is getting hot?"

With this kind of interactive teaching, Bokor also hopes to inspire a few students to pursue electrical engineering and its hardware applications, another reason he started the class back in 1998. "It was the middle of the Internet boom, and our enrollment in computer science courses was hitting record levels," he says. "There was just as much opportunity in jobs and excitement on the hardware side, but students didn't seem to know it." Almost a decade later, Bokor's course enjoys a full roster and waiting list.

EECS first year student Uppili Raghunathan doesn't need to be converted. "I like the hardware side," he says. "This is definitely fun."



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Ready for research?

The College's URO program helps get you into the lab

Berkeley is one of the finest research institutions in the world, so consider participating in research while you're here.

One way is through the College's Undergraduate Research Opportunities (URO) Program, which links undergraduates with faculty members working on engineering and science projects.

This fall, EECS junior Derek Xie is helping ME professor Dennis Lieu create a soft, non-lethal projectile to use in riot control situations or peace-keeping missions.

"I like this project because it's a low-pressure learning environment where I can work closely with the professor and grad students to learn something that I am really interested in," Xie says. "People are often seriously injured or killed when police try to control a crowd during riots, but you also want police to use something that has enough stopping power to be effective. It's a delicate balance, and that's one of the many reasons why this research is so interesting."

Xie's tasks include making molds of different sizes and shapes, shooting the projectiles at a target and recording their impact pressure and velocity.

Spring projects will be posted on

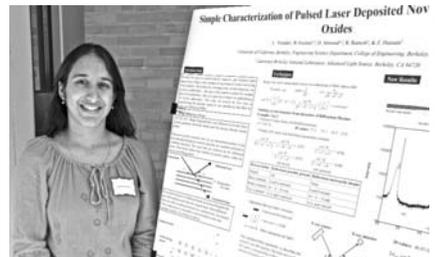
the URO website this month.

Faculty researchers are looking for applicants with a high GPA, a background in relevant coursework, a strong interest in the subject matter and dedication to the project. Be prepared to spend at least six hours at it per week.

Preview the program at the Fall Engineering and Science Poster Session, where students will answer questions about their research. The event will take place on Tuesday, November 20, from 11:30 a.m. to 1:30 p.m. in the lobby of Hearst Memorial Mining Building.



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RACHEL SKINNER PHOTO

LAB SAVVY: A URO participant shares her research during a poster session.

CITRIS Research Exchange

On Wednesday, November 14, EECS professor Costas Spanos will present a lecture entitled "Innovations at the Design-Manufacturing Interface" as part of the Fall 2007 CITRIS Research Exchange. The event will take place at noon in 290 Hearst Memorial Mining Building, the Maria & Dado Banatao Conference Room. For more information, go to www.citris-uc.org/citris_research_exchange_fall_2007_schedule.

Attention researchers

Big Ideas @ Berkeley provides funding and support to Berkeley undergraduate and graduate students who are passionate about tackling major global, regional and local challenges. Come to the informational meeting on Thursday, November 15, at 6:30 p.m. in the Pauley Ballroom, MLK Student Union to learn about the Big Ideas competition, meet current project leaders and enjoy free food. Reserve your spot by emailing annieyeh@gmail.com. Click on <http://bigideas.berkeley.edu> for more information.

Calling all clubs

Cal's 2008 Engineering Week (E-Week) is scheduled for February 19 to 22. The Engineers' Joint Council is encouraging all engineering student societies to get involved and help host events throughout the week to make it one of Cal's best E-Weeks ever! Anyone wanting to help out should contact QJ Flores at vp@ejc.berkeley.edu. Remember, E-Week comes only once a year, so don't miss out!

Senior Gift Campaign

Come join the Senior Gift Campaign Committee and make a huge impact on your College! In addition to raising crucial income for the Annual Fund, the campaign encourages student participation and enables you to build your resume, network with other graduating seniors and alumni and show your school spirit. You don't need to be a senior to get involved. To learn more, contact Tara McCulloch at tmcculloch@berkeley.edu or 643-6291.



How did you go about finding your interest/passion?

I've always sought out opportunities to have new, different experiences. At Cal, I participated in clubs, worked, volunteered, read, talked to people and traveled as much as I could. Two guiding principles have helped me: "Think globally, act locally," and "Do what you love and the money will follow." I've always been drawn to jobs where my work has a direct impact on the people around me.

WITH EECS ALUM ANDY LIEBERMAN

After graduating from Cal, Andy Lieberman (B.S.'88 EECS) worked at a couple of short-term programming jobs before deciding to take a break from computers. He traveled to Guatemala to learn Spanish and volunteer and then became a teacher. Later, he got involved with international development projects and founded Ajb'atz' Enlace Quiché, a nonprofit that helps indigenous peoples through innovative applications of information and communications technologies. Today, he's back in San Francisco, serving as permanent advisor to the organization.

What do you recommend students do during school to prepare for a career?

School should be about learning how to learn and how to think rather than acquiring specific skills to do a job. Of the formulas and facts I studied in my courses, I doubt I have actually used more than 10 percent in my work. However, the abilities to think, solve problems and visualize the future of technology have helped me succeed. School should be a time of trying new things to see what you like and what's important to you.

What helped you make the transition from student to career employee?

I participated twice in the Engineering Co-op Program, once during my sophomore year

(for a small Bay Area company) and again before my senior year (for a large corporation in Massachusetts). That gave me a taste of two very different work environments and helped me understand what to seek out and what to avoid.

What are some things to think about while considering a potential job?

Ask yourselves: Is it just a job, or is it an opportunity for professional growth? Is the company focused on making money, or does it want to make the world a better place?

Have additional questions? Email andy@enlacequiche.org.

career corner