Happy (almost) Thanksgiving Break!
As a reminder, there will NOT be class during the week of Monday, November 20th-Friday, November 24th.
Week 10 will resume on Monday, November 27th.

AES Presidents Update: Happy Week 9!

My name is Helen Barnes and I am serving as the AES (Agricultural Engineering Society) President this year. I have a volunteer opportunity for those of you that are available this Friday afternoon (November 17th). There will be a group of high school students touring BRAE and we are asking for a group of our current students to share about the department. There will be various booths or “stations” set up in the Farm Shop and each of you would be stationed at a booth, sharing about a specific topic as students rotate through. You do not need to be an expert to help out. It would be great for the students to hear from as many of you as possible!

https://goo.gl/wJ2jys

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<th>AES Officers</th>
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Manny Ghuman
Position: AES Club Vice President
Year: Senior
Major: BioResource and Agricultural Engineering
Hometown: Fresno, CA

Why did you choose Cal Poly?
I chose Cal Poly because I wanted to surround myself with top-tier people and since Cal Poly is the premier agricultural school, in the premier agricultural state, in the premier agriculture country, top tier people can be found all around CAFES.

Why did you apply to the BioResource and Agricultural Engineering Department?
I chose to apply to the BRAE department because it had what I was looking for, the perfect combination of agriculture and engineering.

Why did you become involved with AES?
AES winning Large Club of the Year for the College of Ag for so many years in a row was definitely a great selling point. Also, just seeing all of the ways that AES helps not only CAFES, or the University, but the community as well really intrigued me.

What has been your favorite class at Cal Poly?
My favorite class at Cal Poly has been BRAE 128, because it encouraged students to become involved in the BRAE department as well as helped them build relationships with people that they will have class with for the next 5-7 years.

What would you say/show to convince them the BRAE department is where they belong?
I'd first show them around the labs and the ramp, and even stop other BRAE students to have them help sell the department to them so that they can see that everyone is excited about this department and not just the people giving the tour.

Where else are you involved on campus?
I serve in treasurer roles in a few different places on campus. I am the current Alpha Gamma Rho Chi Chapter VNR- Finance and the CAFES Student Club Council Treasurer.
Sarah Atmadja

Position: AES Secretary
Year: Senior
Major: BioResource and Agricultural Engineering
Hometown: Temple City, CA

Why did you choose Cal Poly?
I chose Cal Poly because I loved the feel of the campus. It was green, spacious, and had a homey feel.

Why did you apply to the BioResource and Agricultural Engineering Department?
I was going to be an English major, but did not know what I wanted to do with the degree. My mom was the one to suggest Agriculture, because in her words “everyone’s got to eat” - once I got to know the department I never looked back.

Why did you become involved with AES?
As a freshman I got to know some pretty awesome upperclassmen who just made me feel so welcomed. I decided I kind of wanted to give back and do the same thing.

What has been your favorite class at Cal Poly?
Food Science Nutrition 250 with Dr. Derelian. Something to know about me is that I <3 food, and this class was all about food and the cultures associated with it. Plus there was a potluck presentation at the end of the quarter - who doesn’t love free food from around the world.

What has been your favorite class in the BRAE department?
BRAE 414 with Howes. I literally cried once or twice in this class because it was definitely overwhelming at some points - but you just have to remember that everyone else is in the same boat with you. It is an upper division class, so by this point everyone knows each other and there is a real sense of camaraderie where everyone is open to helping everyone else. Once you spend fifteen straight hours in the library with someone, they are basically one of your closer friends.

Where do you see yourself in ten years?
Working not a job, but a career - hopefully in position where I will get to travel occasionally. I would really like to have settled down at this point in terms of housing and a family - I move about 6 times a school year going between school, home, and my internships so I look forward to owning a more permanent residency.

What is one thing other members (faculty and students) should know about you?
I get spacey when I am walking around campus, so if I don’t say “hi” to you its probably because I am on autopilot - Sorry in advance, I promise I am super open and friendly in person.
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BRAE 428 – Agricultural Robotics and Automation

Winter 2018 (4 units)
Lecture - Tue./Thurs. 7:40 – 9:00 am, Lab - Tues. 12:10 – 3:00 pm

• Studying sensors and sensor data analysis techniques

• Applying On-Off control, PID control, and fuzzy logic control to agricultural control systems

• Developing real-world autonomous agricultural vehicles/robots

This course is an application of mechatronics principles for agricultural control systems and robots. This hands-on, project-oriented course covers sensors, electronics, mechanics, control theories and computer programming topics for agricultural robotic systems. This course is ideal for undergraduate and graduate students who want to gain mechatronics knowledge and enhance their critical thinking skills.

FOR MORE INFORMATION CONTACT: BO LIU / BLIU17@CAL POLY.EDU / BLDG 8-106 / 805-756-2384
This course is an application of aquacultural engineering principles for freshwater and marine food production systems. Examination of system design constraints for maximizing productivity and minimizing environmental impacts, nutrient management, gas exchange and animal husbandry.

This course will cover learning outcomes including recognition of basic aquacultural engineering technologies, application of quantitative analytical processes for developing solutions, evaluation of aquaculture system designs within realistic constraints, analyzing research journals proposing different types of production systems, predicting biomass production applicabilities given input constraints, and explaining the interconnected systems nature of technology.

The course is ideal for undergraduate and graduate students interested in enhancing their critical thinking skills in advanced agricultural engineering topics.

BRAE 470 Aquacultural Engineering will be taught by Dr. Greg Schwartz, entailing two lectures and one laboratory (students must enroll in both BRAE 470 and BRAE 471) for 3 unit of upper division BRAE credit.
Meetings:
Monday- Sustainability Task Force, Project Team Meetings
Tuesday- IMPACT
Wednesday - General Meeting
Sustainability Task Force is a group seeking to enhance Cal Poly's EWB Chapter through working on projects related to socio, economic, cross-generational and environmental sustainability. We want to ensure that our chapter is fulfilling its purpose of “equipping leaders to solve some of the world’s most pressing challenges”. The STF meets at 6pm every Monday in Building 10, room 225.

Project Meetings will be every Monday from 7:00-9:00pm!
Here are the team room locations:
Fiji: 10-225
Local Projects: 33-289
Thailand: 10-227
Nicaragua: 10-124
Malawi: 38-227

IMPACT There will be no meeting this week!

General Meeting! In the sprit of thanksgiving and a very busy week, we will be using this time to give out free coffee and provide a study space! Come join!

Announcements:

Letter Writing
Fundraising Committee!
EWB Olympics

Fundraising Committee!
Do you like helping out your team? Come join us at the club-wide fundraising committee! All majors and levels of experience are welcome, we'll teach you everything you need to know! This is an awesome way to get more involved and potentially take on a leadership role. Interested? Fill out this snazzy form!

EWB Olympics is coming up! Battle of the brains and the brawns! There will be events like: Spikeball, Puzzles, Relay Races, and so much more! Coming to you Friday, December 1st at the WOW fields.
Job Posting | GIS/Science Intern

Land IQ, LLC is seeking a GIS/Science Intern in its Sacramento, California office for a minimum of a 3-month internship. This position is expected to be part to full time (24 to 40 hours per week) depending on successful candidate availability.

Land IQ specializes in providing solutions to challenging agricultural and environmental problems throughout the western United States. Our areas of expertise include water quality and demand evaluation, agricultural systems, soil science, salinity and nutrient management, ecosystem restoration, statistics, remote sensing, geospatial analysis, and regulatory policy. Land IQ helps clients develop high value, scientifically sound, proactive solutions to their complex, large-scale, land-based challenges.

The successful Intern candidate will be responsible for working with our growing geospatial and land-based sciences team comprised of remote sensing/GIS experts and a range of agronomic, environmental, and science disciplines. Applicants must have strong analytical reasoning skills including some basic exposure to GIS and an environmental, geographical, or agricultural science discipline. Land IQ will work collaboratively with this individual to train them on needed work elements.

This is an environmental consulting position requiring the ability to develop analysis approaches/methodology and work within a team to optimize methods. The applicant must have strong communication skills, readily work in a team environment, and use efficient work approaches. The position will be highly centered on GIS work products, efficient data management, and some spatial interpretation of image resources. Some occasional multi-day travel within the state of California will be required.

Office Location: Sacramento, CA

Hiring Timeframe: Immediate

Employment Type: Part to Full time (full time preferred). This is a paid, hourly internship.

Primary Responsibilities and Qualifications:

- Work in a team environment on a wide range of projects, supporting our team of scientists, remote sensing analysts, and GIS analysts
- Organized and methodical with communication and work documentation
- Basic understanding of geospatial challenges and analysis
- Knowledge of land based systems.
- Excellent written and oral communication skills, responsive, collaborative, and the ability to take direction
- Valid CA driver’s license
- Ability to travel and remain away from home for up to 1 week on occasion
PAAC is Here!
Come for fun people, free pizza, and robots
We've got an exciting quarter and we hope you can be a part of it!
Meetings are Thursdays 6-8 pm in room 8A-3E

Arduino Programming
8-3E (PC/Electronics Lab)
Taught by: PAAC Officers

Member of the Week
This could be you!
Do you have a friend in the club who did something cool but doesn't want to brag? Do you have something neat to share? Let us know and we'll put you in the newsletter!

ASABE Robotics Competition
New in Ag Automation
This year, Cal Poly is participating in the Harvest Competition. If you are interested and want to learn more, click the link below. If you want to be on the AgBot team, talk to Caleb Fink!

Check it out here!
Read the article here!