EEE Newsletter
March 28, 2016

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EEE Town Hall - sponsored by EEE SAC*

The EEE Student Advisory Council (SAC) is making plans for this year’s EEE Town Hall. See the attached flyer & save the date!

EEE Town Hall

When? March 29th at 5:30pm
Where? Fu Room (POTR 234)
What? A HotSeat board will open on February 22nd at this link- www.openhotseat.org
HotSeat will allow you to post thoughts and vote/comment on others’ posts ranging from choosing EEE Selectives, the FE exam, study abroad, the future of EEE and everything in between. The most popular topics will be addressed by Prof. Nies and a panel of current EEE students.

More! FREE FOOD AND DESSERT! Bring your own water bottle!!

We want this event to be discussion-oriented, not presentation-based. Come ready to participate! **Please note that we will not be discussing career topics, as those were covered at the EEE Career Workshop in January.

Have questions? See any of the SAC representatives:
Seniors: Kaley Alcock, Mustafa Ghuneim, Andrew Yacinthe
Juniors: Ashley Devore, Sydney Weiss
Sophomores: Emily Conkling, Abby Mitchell

Prof. Nies receives Murphy Award!

Larry Nies, professor of civil engineering and environmental and ecological engineering, has been named a recipient of a 2016 Outstanding Undergraduate Teaching Award in Memory of Charles B. Murphy. Nies was surprised with the news on Wednesday, March 23. Read more here: http://www.purdue.edu/newsroom/purduetoday/releases/2016/Q1/nies-receives-murphy-award.html
Grant for Student-Led Service-Learning Sustainability Projects*

The Center for Instructional Excellence is inviting applications for the Undergraduate Grant Program for Student-Led Service-Learning Sustainability Projects. The grant program goal is to foster the expansion of service-learning courses through student-led sustainability projects in partnership with non-profit agencies, schools, and governmental bodies. Grant funds will provide financial support for projects that address sustainability-related topics and encourage students to take leadership roles in building healthy, sustainable communities. This program is intended to give students an opportunity to work on a semester-long project in close partnership with a faculty mentor and apply their classroom education to solve real-world sustainability problems. To be eligible for the grant, students or student teams must participate in a credit-bearing, service-learning experience. This can be added to an existing course, formalized into a new course, or developed as an independent study. Faculty members and students are encouraged to work closely with the Assistant Director for Service-Learning, Dr. Lindsey Payne to develop this experience. Up to two $5,000.00 grants will be awarded to individual students or a team of students. Projects that demonstrate significant impact; a strong partnership with a non-profit agency, school, or governmental body; and a committed faculty mentor will be given preference for funding decisions. Applications are to be completed on or before April 15, 2016. For more details, please see the attached call for proposals.

Summer Course: Fundamental Skills for Working in the US*

ME 29700, CRN 27348, 3 cr : This new course will be offered during the first six weeks of summer session.

- Ideal for students who are considering Co-Op or Internship opportunities for Fall 2016. Three employer site visits are embedded into the curriculum to give students exposure to U.S. employers.
- See the attached course flyer for more details.

ENGR 31000: Engineering in Global Context *

Are you ready to work across cultures? ENGR31000 (Engineering in Global Context, 3 cr) can prepare you for the global challenges you will face in your career.

Through historical and comparative study, ENGR31000 will challenge you to explore and understand how unique, local cultures of technical work have emerged in diverse regions, including Western Europe, East Asia, and North America. Going around the world, we ask: who is an engineer, and how are they trained? What kinds of jobs and status do engineers hold? What are their styles of problem solving? Interactive case-study activities will help you develop your global competency, enabling you to effectively and appropriately navigate the kinds of work situations often encountered by global professionals.

ENGR31000 is open to ALL Purdue students, and is approved as a core curriculum elective course in the STS category. The course also fulfils a core requirement of Purdue's Global Engineering Studies Minor.

EEE will count this as Technical Elective (TE) credit. Instructor Permission required. Contact: Prof. Brent Jesiek (bjesiek@purdue.edu).

PHIL 49000: Climate Change & the Moral Psychology of Existential Threat*

PHIL 49000 (a variable title course)

Cognitive and Social Obstacles to Saving the Planet (and Ourselves)

- How does the human mind distinguish between right and wrong, and how do we, individually and collectively, decide what to do in the face of difficult moral situations?
- What distinctive kinds of threats and moral challenges are raised by climate change, and why do they seem so difficult to assess and respond to?
- What kinds of nudges and moral technologies might be employed to help us better think about and address the challenges of climate change - & what kinds of ethical questions does the use of these kinds of tools raise?

Professor Daniel Kelly, Tuesday/Thursday, 1:30 - 2:45pm, No pre-reqs or previous philosophy courses required, Open to graduate & undergraduate students, Questions? Email: drkelly@purdue.edu

EEE has approved this course for the list of “intersection of Society and the Environment” EEE General Education Elective requirement.
Phil 11400 (sec 004): Global Moral Issues for Engineers*

Interested in learning how to anticipate and navigate global issues that will likely arise in your working life as an engineer? Do you want to learn how to understand cultural differences regarding work conduct and ethical norms that can interfere with achieving technical-related objectives? If so, you should consider taking this course to increase your understanding of professional and ethical responsibilities in national, international, and cross-cultural environments. This understanding will include not only the principles and practices of ethical engineering based on universal human challenges engineers seek to address in all cultures and contexts, but also the particular difficulties present in cross-cultural and global circumstances.

Engineering Trade Show March 30*

Next Wednesday, March 30th, the diversity engineering organizations (MAES, NSBE, SASE, SHPE, and SWE) are hosting the 3rd Annual Corporate Engineering Trade Show event. Company representatives will be on campus in ARMS and FRNY atriums to speak to students about life as an engineer in their company and display some of their latest innovations and products. More information about the event and a full company list may be found on our website: http://engineering-trade-show.weebly.com/

I2D Lab Exposition- April 1*

The 2nd Annual I2D Lab Exposition will include invited speakers from USAID, Catholic Relief Services, and Bill & Melinda Gates Foundation, global development research and student projects on display, and an announcement of seed grant winners. The Expo will focus on how engineers and engineering can support achievement of the United Nation's Sustainable Development goals. A reception will follow. This event is free and open to the public. See flyer or website for more information.

Student Sustainability Summit- April 2*

Purdue Student Sustainability Council is hosting a Student Sustainability Summit on April 2nd, 2016 from 10-2:30pm and we're discussing how sustainability can be mobilized both at and through Purdue. It will feature a mix of speakers, discussion sessions, and rotations with free lunch at the event! See attached student flyer which includes further details and this link for info and registration - universitysustainabilitysummit.org

PSG Elections & College of Engineering PSG Senator Candidate

Voting begins Monday, April 4 and continues for 2 days. This is April 4, 5, and 6, and students can vote online on Boiler Link (https://boilerlink.purdue.edu/). Just sign in and vote for whomever you choose to support! Get involved and vote!

One of EEE’s own is running for College of Engineering PSG Senator - Jake Hawes. Details of his platform:

My platform is based on the promotion of four distinct outcomes: cross-disciplinary Learning opportunities; Environmental, economic, and social sustainability across campus; increasingly the Accessibility of PSG to students; and emphasis of Diversity and inclusion across campus. I believe that I, with this platform, can help Purdue continue to LEAD our world into the 21st century. Find me online at facebook.com/hawesforpsg or contact me at hawesforpsg@gmail.com.
EEE SAC’s ANNUAL TOWN HALL!

When: March 29th, 5:30
Where: Fu Room, POTR 234
What: Scheduling, Course Selection, Study Abroad, the Future of EEE

Access HotSeat board - www.openhotseat.org

Come be a part of the community and share your thoughts!

FREE FOOD AND DESSERT!!!
**Purdue University Undergraduate Grant Program**

for Student-Led Service-Learning Sustainability Projects

April 2016 – April 2017

**Program Overview**

The grant program goal is to foster the expansion of service-learning courses through student-led sustainability projects in partnership with non-profit agencies, schools, and governmental bodies. Grant funds will provide financial support for projects that address sustainability-related topics and encourage students to take leadership roles in building healthy, sustainable communities. This program is intended to give students an opportunity to work on a semester-long project in close partnership with a faculty mentor and apply their classroom education to solve real-world sustainability problems.

**Faculty Mentorship**

To be eligible for the grant, students or student teams must participate in a credit-bearing, service-learning experience. This can be added to an existing course, formalized into a new course, or developed as an independent study. Faculty members and students are encouraged to work closely with the Assistant Director for Service-Learning, Dr. Lindsey Payne to develop this experience.

**Funding**

Up to two $5,000.00 grants will be awarded to individual students or a team of students. Projects that demonstrate significant impact; a strong partnership with a non-profit agency, school, or governmental body; and a committed faculty mentor will be given preference for funding decisions. In certain cases, the grant may be awarded conditionally upon applicant’s agreement to additional terms and/or partial funding may be awarded in certain cases.

**Eligibility**

- The project proposal must be authored by a current Purdue University student(s);
- All authors must be undergraduate student(s);
- Sponsorship of a faculty mentor;
- Participate in a credit-bearing, service-learning experience; and
- Sponsoring College/School, department, office, organization, or unit must agree to serve as the fiscal agent for the project.

**Expected Uses of Funds**

- Funds may be used for materials, equipment, services, or supplies necessary to complete the project.
- Up to 20% of the funds may be used for travel, including travel to site(s) to conduct service or conferences.
- Other items must be adequately justified in the proposal.

**Funds are NOT to be used for**

- May not be used for student, faculty, or staff salaries, honoraria, or compensation to the individual(s) working on the project, but may be used for contracted services to complete the project.
- May not be used as a donation.
- May not be used for cash awards or purchasing gift cards, as an award or special prizes, etc.
- May not be used for normal departmental instruction, such as field trips, etc.
**Terms of Service & Timeline**

- **April/May 2016**: Meet with faculty mentor and Dr. Payne to plan project.
- **Fall 2016 or Spring 2017**: Participate in service-learning course with faculty mentor.
- **September 2016**: Meet with faculty mentor and Dr. Payne.
- **December 2016**: Meet with faculty mentor and Dr. Payne to share progress report.
- **February 2017**: Meet with faculty mentor and Dr. Payne to share progress report.
- **April 2017**: Meet with faculty mentor and Dr. Payne to share final report.
- **May 2017**: Submit final report.

**Application Requirements**

- A completed application;
- Letter of support from a faculty mentor, including a brief course description;
- Letter of support from a community partner; and
- Applications are to be completed on or before April 15, 2016. **To Apply**

Inquiries should be directed to: Dr. Lindsey Payne, Center for Instructional Excellence, paynel@purdue.edu or x6-6423.

**Application Review and Notification**

All applications will be reviewed by a selection committee consisting of a representative from the Center for Instructional Excellence, a representative from the Office of University Sustainability, a representative from the Global Sustainability Institute, and a representative from the Student Sustainability Council. Applicants will be notified of the Committee’s decision on or before April 25, 2016.
Purdue University Undergraduate Grant Program Application
for Student-Led Service-Learning Sustainability Projects
April 2016 – April 2017

Please apply online and upload all necessary materials by April 15, 2016. To Apply

Student Information
- Name of Student Grant Contact (first name & last name)
- Email Address
- Phone
- Major
- Graduation Date
- If applicable, list all other participating students' names (first name & last name)

Project Information
- Title of Project
- Expected # of Individuals Impacted by the project (Please categorize, e.g., 5 Purdue students, 25 community members, 1 school, etc.)
- Proposed Starting and Ending Dates of Project (mm/yyyy) to (mm/yyyy)

Description of Project
In 1,500 words or less, briefly describe the following, and upload your narrative as one complete PDF file.
- Sustainability issue & community partner need
- Project objectives
- Expected outcomes (short-term & long-term)
- Contribution to sustainability, include how the environmental, economic, and social aspects of sustainability will be incorporated into this project
- Sustainability of the project after the grant period ends
- Potential future collaborations (e.g., other partners, mentors, and/or courses).

Project Timeline
- Briefly describe your project timeline from April 2016 - May 2017, including key milestones and dates, and upload as one complete PDF file.

Proposed Budget
- Provide an itemized list of the expected expenses that will be charged to this grant. Also list expected revenue for the project (if any), including sources and amounts. Upload as one complete PDF file.

University Sponsor Information
- Faculty Mentor Name (first name & last name)
- Faculty Mentor Email Address
- Faculty Mentor Phone
- Faculty Mentor Home Department
- Course Title and Number

Letters of Support
Faculty Support Letter
- Upload your letter of support from a faculty mentor as one complete PDF file.

Community Partner Support Letter
- Upload your letter of support from a community partner as one complete PDF file.
Prepare for Success
ME 29700: Fundamental Skills for Working in the U.S.

Are you seeking a Co-Op or Internship Opportunity for Fall 2016?

An international student interested in Co-Op/Internship? A U.S. student looking to hone your workplace skills?

This **FIRST SIX WEEK SUMMER COURSE** will prepare you to succeed in the U.S. workforce through experiential learning opportunities!

Open to ALL ENGINEERING MAJORS!

**Course Elements**
- Site visits to employers
- 1st site visit Cummins!
- Resume preparation
- Job search strategies
- LinkedIn tutorials
- Consultation from the Office of Professional Practice for Co-Op opportunities!
- Minimal assignments

Limited Spots! Register today!
CRN # 27348
ARE YOU READY TO WORK ACROSS CULTURES?

ENGR31000 (Engineering in Global Context, 3 cr) can help you prepare for a globe-spanning career!

Through historical and comparative study, ENGR31000 challenges you to learn how unique, local cultures of technical work have emerged in diverse regions, including Western Europe, East Asia, and North America.

ENGR31000 (formerly ENGR20100) is open to ALL Purdue students, and counts as a core curriculum elective in the STS category. The course also meets a requirement of the Global Engineering Studies Minor.

Fall 2016 CRN 18332
MWF 12:30 - 1:20 PM

Questions?
Contact: Prof. Brent Jesiek
(bjesiek@purdue.edu)
NEW COURSE ANNOUNCEMENT
Professor Daniel Kelly

Full Title: Climate Change and the Moral Psychology of Existential Threat: Cognitive and Social Obstacles to Saving the Planet (and Our Selves)

Course information:
- Philosophy 490 (Advanced Topics in Philosophy: Moral Psych & Environ)
- Fall 2016, Tuesday and Thursday, 1:30 – 2:45pm, Beering 1248
- No pre-reqs or previous philosophy courses required
- Open to graduate and undergraduate students
- Please email me with any questions at drkelly@purdue.edu

Course Description:

A threat will qualify as ‘existential’ if it puts the continued existence of our species, and possibly our world, at risk. There’s an old saying that if you want to save the world, you need to know which levers to pull; in this course, we’ll consider how in many cases, some of the most important of those levers might lie within ourselves. To that end we’ll develop concepts to think about the philosophic and ethical facets of existential threats, with an eye toward the human cognitive, affective, and social dimensions that make them difficult to see clearly or address effectively. Our main focus will be on the distinctive kinds of challenges posed by climate change and destabilization of the global ecosystem, but we’ll also briefly consider some other examples (the possible rise of hostile artificial intelligence, contact with aggressive extra-terrestrial life) for the contrasts they bring into relief.

We’ll first look at state of the art research on the character of human moral psychology that brings together work from philosophers, psychologists, biologists, economists, and anthropologists, paying particularly close attention to our cooperative capacities and the central roles that culture, social norms and informal institutions play in shaping both individual and group behavior. We’ll then look at how the threats produced by climate change engage our minds, and more alarmingly, fail to engage them. In contrast to alien invasions or an uprising of the machines, the problems linked to climate change make up a nearly perfect storm, and can appear almost custom designed to elude the grasp of our intuitive moral psychology. We will examine in more detail how key features of those problems lie behind various of our cognitive blind spots, fail to push our emotional buttons or get a grip on our motivational apparatus, and give rise to particularly difficult forms of collective action problems. Finally, we’ll consider some ideas for how to get around these types of obstacles. We’ll examine strategies that take into account, and often try to leverage, knowledge of the details of human cognition and sociality to more effectively address climate change and other existential threats. We’ll also think about what factors might distinguish versions of such strategies that are justifiably paternalistic and ethically acceptable from “nudges” that are excessively manipulative and morally indefensible.
Global Moral Issues for Engineers  
PHIL 11400 – 004  
CRN 68226  
MWF 2:30 – 3:20 pm

Interested in learning how to anticipate and navigate global issues that will likely arise in your working life as an engineer? Do you want to learn how to understand cultural differences regarding work conduct and ethical norms that can interfere with achieving technical-related objectives? If so, you should consider taking this course to increase your understanding of professional and ethical responsibilities in national, international, and cross-cultural environments. This understanding will include not only the principles and practices of ethical engineering based on universal human challenges engineers seek to address in all cultures and contexts, but also the particular difficulties present in cross-cultural and global circumstances.

Students in this course are expected to have a science, technology, or engineering experience (EPICS, GEP, internship, co-op, EWB, student design team, etc.) to be used to explore the topics of the course, which include:

1. Introduction
2. Basic Ethical Principles for Global Engineering
3. The Global Business Environment
4. Casuistry as a Useful Tool
5. Cross-Cultural Issues
6. Balancing Autonomy and Adherence to Rules
7. The Approach of Professionalism as a Basis for Global Engineering
8. Broader Responsibilities of Engineers
9. Fundamental Rights of Engineers

The capstone of the course is a case study in engineering ethics comprised by both technical/engineering and non-technical/social, political, economic, etc. components.

Attributes: Lower Division, S General Education, GTC-Humanistic-Artistic, UC-Humanities
Engineering Trade Show

What is it?

✓ Engineering Show & Tell
✓ Go behind the scenes without going anywhere
✓ Ask anything. Learn anything.
≠ Traditional Job Fair
✓ Casual, no need to dress up or research companies
✓ Just stop by and learn more about life in industry
✓ Put yourself ahead of the competition and get ready for career fairs

3.30.16 | ARMS | FORNEY
10-4pm

go curious or go home
For more information:
engineering-trade-show.weebly.com
FRIDAY, APRIL 1, 2016

OPENING SESSION @Seng-Liang Wang Hall Lobby
9:30-11:00am  Poster session and exhibits
              Research and development projects with engineering students and faculty
10:45am       Winning Posters Announced

KEYNOTE & PANEL DISCUSSIONS @Mackey Arena Spurgeon Room
Focus on engineering partnerships to address the Sustainable Development Goals

12:00-12:15pm  Opening
                Dr. Leah Jamieson, Ransburg Distinguished Professor of Electrical and Computer Engineering and the John A. Edwardson Dean of the College of Engineering, Purdue University

12:15-1:00pm  Project Updates from I2D Lab Seed Grant Recipients
               Recipients of 2015 and 2016 I2D Lab Seed Grants will provide rapid-fire presentations about their projects

1:00-1:45pm  Keynote Address: Engineering for Change. By Engineers. For Everyone.
              Noha El-Ghobashy, President and CEO, Engineering for Change

1:45-3:00pm  Panel: Role of Engineering Innovation in Global Health*
              Moderator: Dr. Marietta Harrison, Professor of Medicinal Chemistry and Molecular Pharmacology, Deputy Director Discovery Park and Interim Director Regenstrief Center for Healthcare Engineering
              Panelists:
                        • Robert Clay, Vice President for Global Health, Save the Children
                        • Dr. Jacqueline Callihan Linnes, Assistant Professor of Biomedical Engineering, Purdue University
                        • Dr. Patrick Loehr, Director of the Indiana University Simon Cancer Center, Professor of Oncology and Associate Dean for cancer research at the Indiana University School of Medicine
                        • Dr. Katey Owen, Deputy Director for Vaccines Development, Bill & Melinda Gates Foundation
                        • David Plater, Program Manager, AMPATH Research Network & Research Program Manager (North America), Regenstrief Institute, Inc

3:00-3:45pm  Keynote address: Collaborating to Achieve the Sustainable Development Goals
              Michael Deal, President and CEO, Volunteers for Economic Growth Alliance (VEGA)

3:45-5:00pm  Panel: Role of Engineering Innovation in Food Security*
              Moderator: Dr. Melba Crawford, Purdue Professor of Excellence in Earth Observation, Director of the Laboratory for Applications of Remote Sensing, and Associate Dean of Engineering for Research
              Panelists:
                        • Dr. Gebisa Ejeta, Distinguished Professor of Agronomy/2009 World Food Prize Laureate
                        • Dr. Klein Ileleji, Associate Professor Agricultural & Biological Engineering, Purdue University
                        • Dr. David Lege, Director, University Engagement and Research, Catholic Relief Services
                        • Charlene McKoin, Senior Program Officer, Agricultural Development, Bill & Melinda Gates Foundation
                        • Dr. Alvaro Ocampo, Professor of Sustainable Tropical Production, Universidad de Los Llanos - Colombia

RECEPTION @Grissom Hall Atrium
6:00-8.00pm   Open to faculty, staff, and students. Featuring cash bar and catered snacks

*Tweet questions for the panelist and speakers with #I2DExpo2016
FRIDAY, APRIL 1, 2016

I²D LAB EXPOSITION

Opening Session:
Seng-Liang Wang Hall Lobby
9:30-11:00am

Keynote & Panel Discussions:
Mackey Arena Spurgeon Room
12:00-5:00pm

Reception:
Grissom Hall Atrium
6:00-8:00pm

The Innovation for International Development (I²D) Lab puts engineering innovations to work for global sustainable development

https://engineering.purdue.edu/GEP/I2DLab/Innovations

CORE AREAS

Water & Sanitation
Healthcare
Energy
Labor-Saving Innovations
Information & Communication Technologies
Food Security
I2D LAB
EXPOSITION

Student Breakfast

FRIDAY, APRIL 1st 8am-10:30am

Join Noha El-Ghobashy for Breakfast in ARMS 1098B

Noha El-Ghobashy is the Founding President and CEO of Engineering for Change, LLC, a global alliance of 15 organizations and 24,000+ individuals dedicated to promoting sustainable and accessible technology based solutions for underserved communities worldwide. She is also Executive Director of the ASME Foundation in New York City, focusing on K-16 STEM education, social innovation and sustainable design.

Discuss strategies for effective and sustainable international project work.

RSVP by 3/28/16 to gep@purdue.edu
Purdue Student Sustainability Council and Discovery Park presents

The Purdue Student Sustainability Summit 2016

Join the conversation on sustainability here at Purdue!

For more information/registration, go to universitysustainabilitysummit.org!

When: April 2nd, 2016, 10 AM - 2:30 PM
Where: Class of 1950 Building, Purdue University, West Lafayette, Indiana

Got a specific question not answered in the FAQ? Email huang430@purdue.edu for more information!