

**Office of Professional Practice** 

# ANNUAL REPORT



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# MESSAGE FROM THE **DIRECTOR**

# Dear Boilermakers,

I am proud to conclude my first year serving as Director of the Office of Professional Practice (OPP) at Purdue University, and I'm even more excited to share the great achievements our team has accomplished in regard to work-integrated learning. The OPP team and students oversee a remarkable array of innovative and flexible programs that provide working and learning through co-ops, internships, professional development and technical skills training. With opportunities ranging from local startups in Indiana to international experiences, this office remains a gem within Purdue University. Our incredible team is initiating new projects to uniquely prepare our students for leadership roles in the semiconductor and pharmaceutical manufacturing industries, along with the launch of new opportunities within Innovation in Public Service. I am eager to come alongside our team to contribute to equipping Boilermakers with the essential professional skills for their success.

It is gratifying to highlight the significant achievements of OPP during the 2023-2024 year. We continue to break records in program offerings, student enrollment and employer engagement. This report outlines the many achievements accomplished over the year, and we invite you to join us in celebrating experiential education on our campus.

OPP has a mission to facilitate the experiential education and work-integrated learning for Purdue students. Throughout the school year, we engaged with over **19,739 students** through the co-op fair, employer information sessions, professional practice courses, family visits to campus and various workshops. Thank you to our **400+ employer partners** for providing these excellent work-integrated learning experiences.

We celebrate 1,300 academic co-op and internship work sessions this year, with 824 active co-op students and 79 students in our Global Engineering Alliance for Research & Education (GEARE) program who are studying and working abroad in 24 countries around the world. We also funded 21 student summer internships for Indiana startups and early-stage companies, to help boost economic growth and workforce development in our home state. Our Milestones Technical Skills courses awarded 742 students with hands-on learning opportunities and a micro-certificate/digital badge in engineering and prototyping skills.

We are soon to bring in new faces with new talents and ideas to benefit the Purdue Family via the extension of Purdue University in Indianapolis, and we can't wait for what's in store. We will continue in pursuit of our next giant leap with preparing the future workforce of Boilermakers. Experiential education is a vital piece of student success, and we are happy to be campus leaders in this effort.



**Dr. Phillip S. Dunston** is a professor of Construction Engineering, holding joint appointments in the Lyles School of Civil Engineering and in the Division of Construction Engineering and Management at Purdue.

# OPP // PROGRAMS

# **COOPERATIVE EDUCATION (CO-OP)**

Purdue Co-op has been the premier professional work experience program at Purdue University for nearly 70 years. Students participating in the program can earn an academic certificate upon graduation and enhance their academic knowledge with practical skills through progressively challenging work experiences with industry partners. Co-op models for undergraduate students can result in 12-20 months of work experience. Co-op provides students with an in-depth knowledge of a company. More than 80% of Purdue co-op students earn a full-time offer with their company prior to graduation. Graduate students may participate in the Master's co-op program, which allows students to complete a 6-12 month work rotation with an employer prior to completion of their degree.

After extensive conversations with top co-op universities in the U.S. and Canada, internal conversations with faculty, co-op coordinators, and students, and external conversations with industry partners, Purdue has updated the co-op certificate program. This update provides greater access and flexibility to both students and employers. U.S. News & World Report ranks our Co-op and Internship program as #9 in the nation.

## **INDUSTRY CO-OP CERTIFICATE**

The Industry Co-op Certificate is awarded to students who complete approximately one year of full-time work (at least one fall/spring semester) experience related to their academic field of study. Students are required to register for a cooperative education course during each academic term for which they are engaged in full-time work with an employer. Students are required to complete a minimum of three work terms, and participate in a progressive experience, with a minimum of two work terms occurring with the same employer. Students must complete all necessary requirements specific to their academic discipline.

## **EXTENSIVE INDUSTRY CO-OP CERTIFICATE**







The Extensive Industry Co-op Certificate is awarded to students who complete approximately 18 months of full-time work experience related to their academic field of study. Students are required to register for a cooperative education course during each academic term for which they are engaged in full-time work with an employer. Students are required to complete five work terms, and participate in a progressive experience, with multiple work terms occurring at the same employer. Students may change employers one time. Students must complete all necessary requirements specific to their academic discipline.

## **GLOBAL ENGINEERING ALLIANCE FOR RESEARCH AND EDUCATION (GEARE)**

GEARE is Purdue's premier global professional training program, available to students from all engineering disciplines, computer science and data science. GEARE students enhance their global competency by completing language study, one semester of study abroad, one domestic internship, one global internship, three one-semester cultural training seminars and one global design team project. GEARE has recently added Humanities Informed Engineering Projects, a three-credit course exploring the impact of culture on various engineering projects across the world. This course was developed via a National Endowment for the Humanities grant in collaboration with the Purdue School of Languages and Culture.

The Office of Professional Practice develops relationships with world-renowned university partners and global industry partners interested in developing future employees with top of the line technical and global skills. Our office maintains strong partnerships with universities and global employers in more than 20 countries. Purdue's recent membership into the International Association for the Exchange of Students for Technical Experience (IAESTE) network provides students with internship opportunities in over 80 countries.

GEARE utilizes the Intercultural Development Inventory (IDI) and a series of courses to help students maximize their growth in global competency. Continuous assessment finds GEARE to be one of the most effective programs in encouraging global competency development among its participants.

## **INTERNS FOR INDIANA (IFI)**

The Interns for Indiana program connects entrepreneurially minded Purdue University students to Indiana startups and early-stage companies in order to promote economic development, enhance student success and provide professional opportunities to high performing students. Students will complete their internship during the summer. The Office of Professional Practice offers funding to help these companies hire student talent. Throughout the past two years, 450+ students have applied to be part of the program and 30 students have been awarded internships. OPP currently assists with stipend funding for current students and hopes to expand programming and grow the program size.



### **MILESTONES**

The Milestones program was created in 2019 to enhance technical skills to supplement and enrich knowledge gained in the classroom. Milestones modules average 15 hours of hands-on education in a particular technical field. The modules are currently offered for free to Purdue students. Students successfully completing a Milestones module will earn a digital certificate. Milestones modules include various topics in Prototyping and Manufacturing as well as Electronics and App Development. The Milestones program aims to elevate the technical abilities of Purdue students while providing industry with co-op students and interns ready to make an impact.

## LEARNING WHILE WORKING (LWW)

Learning While Working (LWW) is a work-integrated learning initiative that allows students the opportunity to engage in sequential industry experiences in a variety of modalities. Students can engage in full-time work for 12-15 months while reducing their time to graduation through online courses or receiving technical electives through faculty mentored industry projects. Students may also opt to engage in part-time work while enrolled in the fall and spring semesters. This model of LWW can be an extension of a summer experience or used as an introductory experience to a full-time internship/co-op experience.

LWW students are ideal candidates for extensive projects and are able to support industry needs through impactful and engaging experiences. LWW partners have included Cummins, General Motors, Tesla, Merck, Apple, Amazon, Lilly and more.

# OPP OFFICE // UPDATES

# NEW STAFF MEMBERS



### Kimberly Graham

Pharma Co-op & Lilly Scholars Program Manager

Kimberly joins the Office of Professional Practice with a background in academia and with extensive experiences within educational leadership, curriculum creation and relationship development. Passionate about people, her work centers around creating and sustaining student success, building and strengthening industry partnerships and the development and implementation of wellness initiatives and community relations. Kimberly holds a BA in English and Secondary Education from Bradley University and an MA in Educational Policy, Leadership, and Administration from the University of Michigan. During the Fall semester, Kimberly received a Bravo+ Award thanks to her work in establishing the Lilly Scholars at Purdue program.



Sophie Tung Semiconductor Co-op Program Manager

Sophie (Chen Chin) serves as the Semiconductor Co-op Program Manager in the Office of Professional Practice. She graduated with an MBA from Duke in 2023. In her role as Semiconductor Co-op Program Manager, Sophie coordinates co-op opportunities, fostering meaningful connections between students and industry partners in semiconductor. Her diverse background, coupled with her comprehensive approach to program management, ensures the seamless operation of these valuable experiential initiatives. Growing up in Taiwan, she completed her undergraduate studies in Business Administration with a minor in Music. Prior to her MBA, Sophie accrued experience as a Product Manager within a hardware technology company.



### Katrin Danielson

Assistant Director (Purdue in Indianapolis), Co-op Programs & Student Development

Katrin serves as Assistant Director, Co-op Programs & Student Development at Purdue in Indianapolis. In her role, Katrin handles program implementation, co-op certificate administration, advising, mentorship and the development and coordination of internships and co-ops with domestic and global companies. Prior to transitioning to this role, Katrin has been with the Office of Student and Career Services in the School of Engineering and Technology on the Indianapolis campus for over 7 years. During this time, she worked closely with incoming students and their families, as well as current engineering and technology students. Katrin first came to Indianapolis as an international student and graduated with a Purdue degree from the College of Science.

# **OPP EXTENDS TO PURDUE IN INDIANAPOLIS**

The College of Engineering is excited to announce a guaranteed paid internship to Purdue University in Indianapolis Engineering students in good academic standing. As part of the undergraduate degree program, the work-integrated learning experience may come in the form of a co-op or an industry or academic related research internship.

Engineering students in Indianapolis will be required to enroll in a 1-credit professional development course – ENGR 103: Intro to Engineering Professional Development. This course is designed to prepare students for their work-integrated learning experience by building professional skills while receiving interactive insight from industry reps. College of Engineering students will work with their academic advisor to enroll in the ENGR 103 course during the Fall 2024 or Spring 2025 semester.

As the guaranteed internship initiative is for the inaugural class in 2024, Purdue is ramping up services to take advantage of co-op and internship opportunities for current students in Indianapolis.



# STAFF AWARDS AND RECOGNITION



### Joe Tort

### Associate Director, Office of Professional Practice

During 2023-2024, Joe was recognized as a finalist for the College of Engineering Leah H. Jamieson Leadership Award. Finalists for this award demonstrate initiative, innovation and leadership within the College of Engineering, motivate and encourage the development of other staff members by example, serve as mentors and resources and promote a welcoming environment for all faculty, staff, students and visitors.



### Jenny Strickland

Assistant Director, Co-op Programs & Student Development

During the 2023-2024 academic year, Jenny was promoted to Assistant Director, Co-op Programs & Student Development. She also received an Honorary Helen B. Schleman Medallion Award, which recognizes a faculty member who has served the Purdue, West Lafayette or Lafayette community with excellence, particularly with respect to engagement in empowering and serving women. Honoraries exhibit these qualities and service to the community to a high degree. Jenny also placed in the top three for Poster Presentation at the Conference for Industry and Education Collaboration.



### Patrick Francis

Assistant Director, Employer Engagement

During the 2023-2024 academic year, Patrick was promoted to Assistant Director, Employer Engagement. He was also a finalist for the College of Engineering (COE) New Employee Award in the Professional/Management category, nominated for his recent contributions to OPP and COE in early 2022. Finalists for this award demonstrate uncommon initiative on the job, show a desire to improve job skills by furthering their education and/or taking on more responsibility and show a positive attitude in dealing with the University family/community. During the Fall semester, Patrick was recognized as an outstanding engineering teacher, ranked in the 75th+ percentile based on teacher survey questions related to instructor effectiveness. Patrick is a current participant in the Purdue Engineering Staff Leadership Academy Cohort 4.0.



### Congratulations to the GEARE 20th Anniversary Event Team

Joe Tort, Jenny Strickland, Heather Fabriès, Francisco Montalvo (ME) and Jared Pike (ME)

The GEARE 20th Anniversary Event Team was recognized during the College of Engineering Staff Awards of Excellence for planning and implementing a celebration highlighting two decades of a unique network of universities and industry partners dedicated to developing the world's best engineers through study abroad, global work experiences and global engineering design team projects.



# SHOWING EXCELLENCE AT SCALE // GROWTH & IMPACT











# TOTAL STUDENT ENGAGEMENT









88%
OF STUDENTS REPORT THEY WOULD BE INTERESTED IN WORKING FULL-TIME WITH THEIR FMPI OYER

### MAPPING OPP'S REACH International Internship Conference C Dublin, Ireland ASEE Conference Baltimore, MD 9 **Premier Partner at ESTACA** Paris/Toulouse, France Silicon Valley & the Tech Industry Tour 🧕 8 9 Annual Colloguium on International San Francisco, CA 0 **CEIA Academy** Engineering Education **CIEC Conference** Vail, CO Alexandria, VA Garden Grove, CA **NAFSA Conference** CEIA Annual Conference in collaboration with ASML New Orleans, LA Tampa, FL **IAESTE Conference** Cartagena, Colombia Visiting partner universities and industry Ecuador/Peru

# OPP ON CAMPUS // EVENTS & ENGAGEMENT

# **BOILER GOLD RUSH WELCOME PICNIC**

To welcome the 2023 incoming First Year Engineering (FYE) class, OPP interacted with **2,000+ new Boilermakers** at the Boiler Gold Rush Purdue University College of Engineering Welcome Picnic. FYE students made connections and learned about different opportunities including Co-op and GEARE, along with ENGR 103 course offerings and a variety of OPP programs to kickstart their professional careers as they enter their first year. Many students enrolled in ENGR 103: FYE Professional Development and this welcome event served as a catalyst for student involvement on campus.



# **BASTIAN SOLUTIONS SITE VISIT**

**16 students** participated in a site visit to the Bastian Solutions Headquarters in Indianapolis. Bastian Solutions specializes in automated material handling systems, equipment and consulting. Not only were students given a site tour and the opportunity to learn how the company operates, but they were also able to engage with current employees and Purdue alumni and gain insight into how they can apply their disciplines in industry.



# FYE INDUSTRY EXPLORATION NIGHT

In collaboration with the First-Year Engineering Program, OPP hosted the second annual FYE Industry Exploration Night. This year's event welcomed **over 1,000 FYE students**. The evening provided a dynamic platform for students to connect with a diverse group of industry professionals. **Over 100 industry representatives** participated, including Purdue University College of Engineering alumni, current staff, co-op coordinators, upper-level co-op students and engineers in practice. This group of professionals offered students a well-rounded perspective on engineering careers, encompassing various disciplines and experience levels. Students explored potential career paths and gained valuable insights as representatives shared their professional journeys, offering practical advice and highlighting the diverse opportunities available within the field of engineering. By providing this platform for early engagement and exposure, FYE Industry Night empowers students to make more informed decisions about their academic and professional futures.



# **TESLA ROADSHOW VISITS PURDUE CAMPUS**

**1,000+ students** engaged in the on-campus networking event, classroom sessions and the Cybertruck experience. Boilermakers had the opportunity to see the vehicle and experience some of the features and tech come to life. Many Purdue alumni working at various Tesla locations were present and shared how their time at Purdue prepared them to join in Tesla's mission to accelerate the world's transition to sustainable energy.



# **PHARMA & LIFE SCIENCES CAREER FAIR**

OPP was thrilled to welcome industry partners for a career fair focused on Life Sciences and the Pharma sector. **Over 300 students** across the College of Engineering, Health & Human Sciences, Pharmacy and the College of Science were in attendance. Connections were made with representatives from local Indiana startups and with some of the largest pharma companies in the world. This fair will continue to serve as a catalyst to the initiatives of the new Pharmaceutical Manufacturing Certificate offered in collaboration with the William D. Young Institute for Advanced Manufacturing of Pharmaceuticals.



# **NEW: INNOVATION IN PUBLIC SERVICE CERTIFICATE**

The NobleReach Foundation, a nonprofit organization uniting America's best minds from industry, academia and government, is committed to cultivating emerging technologies and scientific advancements. In its dedication to enhancing the talent pool within the public sector's STEM domain, NobleReach has made a resolute commitment to the new Innovation in Public Service certificate, in partnership with the Office of Professional Practice.

The Innovation for Public Service Certificate program is designed to increase the number of engineering graduates entering the public service sector, contributing as technology leaders and innovators. The 15+ hour certificate is available to students from various STEM majors. This certificate is a collaboration between Purdue University College of Engineering and the NobleReach Foundation.



Students participating in the Innovation for Public Service Certificate will build connections with individuals from local and national government, policy research centers and government agencies like Department of State, Department of Defense, Department of Homeland Security, Department of Energy, the National Security Agency, NASA and many more. During the spring semester, OPP launched ENGR 103: Engineering in Public Service, where these individuals were able to engage with students on campus to provide insight into their careers in the public sector.

# STUDY ABROAD, WORK ABROAD // GET IN GEARE

420 GEARE 79 STUDENTS ABROAD

# STUDENTS CURRENTLY ABROAD IN **24** COUNTRIES

Australia, Austria, Belgium, Colombia, Costa Rica, Ecuador, Hong Kong, India, Ireland, Italy, Japan, Germany, France, Mexico, Netherlands, New Zealand, Peru, Poland, Spain, Singapore, Sweden, Switzerland, Taiwan, United Kingdom



# **GLOBAL ENGINEERING STUDIES** MINORS AWARDED (2023-2024)

**19** MAJORS REPRESENTED (2023-2024)

850+ GEARE

AAE, AE, BE, BME, CHE, CE, CMPE, CEM, EE, EEE, FYE, IDE, MSE, ME, MDE, NE, CS, DS, ECON

# **GEARE NETWORKING NIGHT**

In September, nearly 200 talented students and 17 global companies, including Daimler, R.A. Jones, Tektronix and others, came together for GEARE Networking Night. The event afforded students from various engineering disciplines the unique opportunity to explore internships and full-time positions while networking with leading industry professionals. GEARE Networking night offers a strong focus on international work and study opportunities. Students and employers engaged in meaningful conversations, forged valuable connections and gained insights into Purdue and the global job market. The Networking Night highlighted the importance of global collaboration and provided a platform for students eager to enhance their careers through international experiences.



# GEARE STUDENTS ABROAD



# INTERNS FOR INDIANA //

Interns for Indiana (IFI) connects entrepreneurially minded Purdue students to Indiana startups and early stage companies. These opportunities promote economic development, enhance student success and provide specialized, paid internships to high performers.

# **HOW IT WORKS**

- Internship opportunities will be offered during the summer and students must apply directly to IFI opportunities
- Students will work for a minimum of 10 weeks on a full-time (40 hours per week) basis
- Students selected for internship opportunities must register for ENTR 39699 Interns for Indiana Experience
- Students completing all course deliverables will receive a minimum \$6,000 stipend from the Lilly Interns for Indiana Endowment





# **STUDENT BENEFITS**

- Unique professional development interactions with C-suite executives
- Contributing immediate impact by working in a small team environment
- Individualized internship experiences with specific roles and results driven outcomes
- Opportunities to explore startup culture and learn about all business functions

# **RESOURCES FOR EMPLOYERS**

- OPP opens applications for the IFI program each fall semester and employers are asked to submit a proposal of outlined roles and request internships for the upcoming summer
- Upon approval, employers are notified of funding level and are required to submit a job description with responsibilities and student outcomes
- OPP drives the entire student recruitment process for each IFI employer partner and submits candidate resume books by early spring (typically end of February)
- Employers are required to screen, interview and create offer letters for students and must report hired IFI interns by May 1



# INDUSTRY KNOWLEDGE CERTIFICATES //

# **SEMICONDUCTORS & MICROELECTRONICS**

The certificate in Semiconductors and Microelectronics will be open to students in all undergraduate majors interested in careers in the field of semiconductors and microelectronics. Students will engage in technical exposure to topics in the areas of semiconductors and microelectronics. This certificate is designed to supplement the baccalaureate plans of study in different majors, including (but not limited to) engineering, computer science, physics, chemistry, technology and business.







Enroll in ENGR 103: Changing the World with Chips

Semiconductor related internship, research or study abroad experience

9 hours of technical courses



# PHARMACEUTICAL MANUFACTURING

The certificate in Pharmaceutical Manufacturing is open to undergraduate students interested in careers in the pharmaceutical industry, primarily within the manufacturing and supply chain sectors. The certificate is designed to supplement the baccalaureate plans of study in different majors, including (but not limited to) engineering, computer science, chemistry, biology, pharmaceutical sciences, health sciences, technology, and business.



Enroll in ENGR 103: Pharma Careers and Drug Development



Pharmaceutical manufacturing related internship, research or study abroad experience



9 hours of technical courses



# **LILLY SCHOLARS** AT PURDUE PROGRAM //

OPP is now home to a new, innovative industry-academia partnership unlike any other. The Lilly Scholars at Purdue program is a collaborative scholarship program that is making strides in developing enthusiasm, interest and outstanding talent in the pharmaceutical manufacturing industry.

Covering up to eight semesters of full tuition, this pre-professional scholarship program will have a profound impact not only on the pharmaceutical manufacturing industry in Indiana, but in the pharma space as a whole. Lilly Scholars at Purdue are selected from a competitive application process and, once on campus, engage in a variety of both professional development opportunities and community building events. From enrolling in ENGR 103: Pharma Careers for Lilly Scholars to participating in Mentor Circles with Lilly employees, Lilly Scholars at Purdue are connected to the pharmaceutical industry beginning their freshmen year. Lilly Scholars at Purdue are guaranteed an internship at Lilly.

Working closely with OPP to develop programming for Scholars' experiences, Kristen McCain, Associate Director of Strategic Talent Partnerships for Manufacturing and Quality at Eli Lilly and Company, notes the high hopes she has for this program.

# "Lilly Scholars will produce a stream of talented students who want to work in pharmaceutical manufacturing and who are prepared for their future careers through the program's course offerings, internships and other activities that will increase skills and build connections."

Between welcoming Scholars who had never before thought Purdue University was a possibility for them, providing firsthand experiential learning opportunities for Scholars, facilitating relationship and community building experiences and so much more, the Lilly Scholars at Purdue program values student growth and commits to talent development in a manner unlike any pre-professional scholarship program or industry-academia partnership that has come before it.

"

As the Lilly Scholars at Purdue program is dedicated to building a diverse pipeline of talent and developing interest in pharmaceutical manufacturing, the goal is that this program continues inspiring and facilitating academic and industry excellence. Prioritizing the importance of making an impact, Boilermakers persistently pursue helping others, serving communities and advancing society. This is what the Lilly Scholars at Purdue program means: helping, serving, advancing."

- Kimberly Graham, Senior Program Manager, Pharma Co-op and Lilly Scholars at Purdue



Maria Molina Dallas, TX

### "As a Lilly Scholar there are endless networking and professional development opportunities that I couldn't receive otherwise."

As a Data Science major, Maria proudly states that "being selected as a Lilly Scholar at Purdue is the reason I am a Boilermaker." Maria has enjoyed being able to connect with so many individuals through this program. "I feel as though I am never alone, as I am constantly surrounded by hardworking, genuine people. Everyone around me seems to share the same purpose: to learn and to grow."



### Ivan Tomas Lafavette, IN

### "To feel appreciated by an organization such as Lilly was truly a first-time feeling for me."

As a first-generation student majoring in Pharmaceutical Sciences, the support provided by the Lilly Scholars at Purdue program was and continues to be invaluable for Ivan. "The incentive of a four-year scholarship coupled with a great opportunity to network with Lilly is an experience not every student has the honor to receive." In reflecting upon some of the best things about being a Scholar, Ivan notes the connections and friendships he's made. "Everyone has their own background, and the Lilly Scholars at Purdue program allows students to be expressive of their diverse backgrounds and to accept one another" all while sharing passions, interests and common goals.

This spring, Lilly Scholars at Purdue attended a site visit to Lilly. At Lilly's Corporate Center, the Scholars heard from Lilly senior leadership team members, including CEO David Ricks, and learned about Lilly's storied history. In the afternoon, the Scholars visited Lilly's Technology Center South and toured the Indianapolis Parenteral Manufacturing (IPM) and Indianapolis Device Assembly and Packaging (IDAP) facilities.



### MORE ABOUT THE LILLY SCHOLARS AT PURDUE PROGRAM

The Lilly Scholars at Purdue program seeks to welcome students who are from under-resourced urban and rural populations, students who have overcome socioeconomic or educational disadvantages or students who are among the first generation in their family to attend college. With a focus on reducing barriers to higher education, all students interested in pursuing a career in pharmaceutical manufacturing will continue to be well served through this pre-professional scholarship program and all that it entails. To learn more about the Lilly Scholars at Purdue program, please visit https://www.purdueforlife.org/lilly-scholars/.



# 2024 CO-OP DAYS // **CAREER FAIR**

Co-op Days encompasses various activities with a specific focus on the Co-op Career Fair, an event tailored to students looking for co-op opportunities. This multi-day event began January 29, 2024 and brought employers and students together in multiple formats over the next three days. Networking Night, hosted by Professional Practice Ambassadors (PPA), along with the Co-op Career Fair and Interview Day, attracted over 2,000 unique students from 115 majors representing seven different colleges.

Each year, OPP welcomes both returning and new companies to participate. Employers provide feedback highlighting the positive impact and success of this fair for both the recruiting teams and the students they interact with.

Attending career fairs is a tremendous opportunity for students to 66 practice. It is a skill to be able to, within a few moments, convince an employer that you are worth interviewing. Students who have never attended a career fair or similar event will have a harder time competing against their peers because of that opportunity to practice."

- Nate Huntsberger, Process Engineering Manager at Silfex

On average, five out of ten first-year engineering (FYE) students receive at least one interview from participating in these events. Jasmine Asumang, an FYE student, attended the PPA Networking night prior to the career fair. This event provides students the opportunity to stand out and connect with industry in an informal setting. Participating in this event allowed Asumang a more confident transition heading into the career fair, where she earned four interviews.

"I was nervous about the experience at first, but after the networking night, I felt comfortable talking to professionals and employers. It made such a difference coming to the fair. Being able to talk to employers informally and have my resume looked at really helped me attend the fair with confidence."

for the next giant leap in their professional careers.

Photos by Thomas McClure

Co-op Days events are open to all majors and students of any year. Many students return annually to refine and improve their elevator pitch to recruiters in hopes of receiving an interview. All in all, by offering various activities, fostering networking opportunities, and providing essential services, the Office of Professional Practice Co-op Days plays a vital role in empowering students and preparing them









# CO-OP DAYS STATISTICS



# **232** COMPANY REPRESENTATIVES

# **89** UNIQUE EMPLOYERS

# **600+** UNIQUE OPENINGS FOR STUDENTS



**370** UNIQUE STUDENTS HAD AT LEAST ONE INTERVIEW



# POWERED BY SYMPLICITY®

The College of Engineering has rebranded their database platform powered by Symplicity for the College of Engineering as **X Engine: the hub to Empower the Future of Purdue Engineering Experiential Education**. X Engine will deliver a stronger platform for internships/co-ops, research opportunities, skills training, project-based learning, global experiences and professional development workshops.

Student logins and engagements have soared with 300% growth over the past two years through embedding cross-functional usage from FYE to graduation. This initiative will create a pathway for students to navigate, secure and report their individualized experiences in addition to understanding the importance of registering all experiences. The vision forward is to drive a systematic culture of more robust database utilization and will be a true catalyst for students to engage with the top-industry partners along with faculty, staff and alumni.

# **MAKE AN IMPACT** THROUGH OPP SPONSORSHIP PROGRAM //

Office of Professional Practice (OPP) corporate sponsorship supports industry connections with direct access to Purdue students across 13 different colleges and schools. Sponsorship focuses on strategic efforts with select employers seeking to enhance outcomes on campus with a multifaceted approach to connect with early talent pipelines.

# **SCHOLARSHIP & STUDENT FUNDS**

The most important impact of our sponsorship program is the ability to award students with company-named academic scholarships. In addition, sponsorship supports experienced OPP ambassadors serving as mentors and teachings assistants.

# **EVENTS & CAMPUS ENGAGEMENT**

Host exclusive "day-on-campus" with customized programming and receive embedded OPP marketing, including featured stories on our website, social media and OPP newsletters, etc.

# PREFERRED PROGRAMMING ACCESS

Receive early registration to career fairs with cost savings and priority invitations to campus events including ENGR 103 classroom lectures & First-Year Engineering Industry Exploration Night.

# ASSIGNED OPP ACCOUNT MANAGER

Obtain a high touch level of support with direct access to campus engagement with a designated OPP staff member. Opportunities available for site visits and industry facility tours in person or virtual.

# **OPP LEADERSHIP & ADVISORY TEAM**

Provide input for the future of talent and collaborate to share industry ideas. Help customize programming and build new professional development opportunities.

# \$5,000

annual commitment to become an OPP Corporate Sponsor





# OPP CORPORATE // SPONSORS

OPP would like to thank our corporate sponsors for their generosity during 2023-2024 academic year. Through their continued support and engagement, our team is able to make a deeper impact on the overall outcomes of OPP students. We look forward to continuing to support the success of work-integrated learning partnerships in the 2024-2025 academic year.

# SPONSOR ENGAGEMENT



OPP Corporate Sponsors were invited to attend our annual Sponsors Forum prior to the Employer Engagement meeting.



OPP's Patrick Francis visits Air Products' Global Headquarters in Lehigh Valley, Pennsylvania.



Through opportunities provided by the Semiconductors in Belgium Study Abroad and Silicon Valley Study Away programs, students were able to visit ASML facilities in Veldhoven, Netherlands and in San Jose, California - all within a 24-hour time frame.



5 Purdue alum from Elanco visited campus with their furry friends to network with students.



Students visited Tesla during OPP's Silicon Valley and the Tech Industry Study Away Program.



VS Engineering COO and Professional Practice Hall of Fame Inductee Drew Bender (CE '96) speaks to students about his professional experience at the co-op callout in January.

















TISLA

# ExonMobil KRYPTOS LOGIC Landis+Gyr

# 2023 PROFESSIONAL PRACTICE HALL OF FAME

OPP was proud to celebrate the incredible achievements of this year's Professional Practice Hall of Fame inductees. These distinguished alumni, recognized for their exceptional contributions to their respective fields and the Purdue co-op program, were honored at a formal induction ceremony.

Apart from the ceremony, the weekend also fostered valuable connections. Students, faculty and staff had the opportunity to participate in a Q&A panel with the inductees, gaining insights into their career journeys and the impact of the co-op program on their accomplishments. Whether it was building spacesuits or delving into the world of venture capital, the inductees' personal stories of success offered valuable guidance for the future generation of Boilermakers in industry.

The inductees were also given walking tours to see the expansion and transformation of Purdue's campus and enjoyed a breakfast with OPP staff and teaching assistants, many of whom are current co-op students. This provided a chance to encounter the evolution of



*Top row from left to right: Keith Churchill, Chuck Krousgrill, Nat Keammerer Bottom row from left to right: Andy Mosier Jr., Melanie Sprague, Ed Barriball, Amy Ross Not pictured: Curtis McKee* 

the co-op program firsthand and connect with those shaping the next wave of co-op experiences.

Our formal induction ceremony brought together families, co-op coordinators, students, alumni and distinguished faculty members to witness the official welcome of the inductees into the Professional Practice Hall of Fame. Inductees were able to share their impactful and inspiring stories of success. Their achievements serve as a testament to the value of co-op at Purdue.

Congratulations once again to this year's Hall of Fame inductees! The Office of Professional Practice and the Purdue University College of Engineering are honored to celebrate your remarkable contributions to the co-op legacy.



Photos by Tate Kirgiss













# HALL OF FAME // INDUCTEES



### Melanie Sprague (ME '98)

Senior Vice President, Interventional and Surgical Technologies, Spectrum Plastics Group

Melanie completed five co-op sessions with Zimmer Biomet and DePuy in Warsaw, IN. She began her career as a Process Engineer at Abbott Laboratories, where she spent seven years gaining comprehensive experience across diagnostics, pharmaceuticals, and hospital products divisions. Melanie has served in several progressive technical roles at Spectrum Plastics Group, a DuPont Business, spending time in Program Management, Product Development and Quality Engineering. She eventually became a member of Spectrum's senior leadership team in 2020, overseeing s manufacturing sites spanning from Utah to Ireland.



### Amy Ross (ME '94 & '96)

Space Suit Engineer and Space Suit Pressure Garment Technical Discipline Lead, NASA Johnson Space Center

Amy completed five co-op sessions with NASA in Houston, TX. During her co-op, she worked through rotations in Flight Operations, at White Sands Test Facility and the Engineering Directorate. Amy has served in various role at NASA including Life Support Systems Branch Technical Assistant, Assistant Chief Engineer for the International Space Station Program and Exploration Extra-vehicular Mobility Unit (xEMU) Pressure Garment Subsystem Team Lead. Her team recently introduced the Z2: a new generation of spacesuits that accommodates the microgravity of space, as well as the environments of other planets. This new design is set to be used for future human visits to the moon, Mars and beyond.



### Andrew "Andy" C. Mosier Jr. (ChE '78)

Director, Consumer Marketing Operations, Mead Johnson & Co. (Retired)

Andy completed five co-op sessions with Mead Johnson & Co. in Evansville, IN. During his time at Purdue, he was a member of three honor societies: Tau Beta Pi, Omega Chi Epsilon and Phi Eta Sigma. He returned to Mead Johnson & Co. shortly after graduation, and remained there for 43 years until retirement. There, Andy served in numerous positions including Director, Women's, Infant's and Children's (WIC) Business and Director, Adult Medication Nutritional Institutional Products Marketing. He serves as Chairman of the Board of the Good Samaritan Home and as Principal at ACM Strategic Solutions, specializing in strategy development and execution particularly with data driven businesses and categories.



### *Curtis M. McKee (EE '01)* Partner, Third Point Ventures

Curtis completed five co-op sessions with Kimberly-Clark Corporation in Neenah, WI, Beech Island, SC and Fullerton, CA. He is a current member of the Silicon Valley Boiler Innovation Group (SVBIG) Steering Committee, and serves as an advisor for the Daniels School of Business's Student Managed Venture Fund (SMVF). His previous roles include Assistant Vice President and Head of Corporate and Investor Development at Arista Networks. Curtis was also an Investor and Corporate Development leader for Intel Capital, concentrating on Cloud, IOT, Enterprise SW, HPC, 5G, Edge/Networking and AI sectors.



### Charles "Chuck" Krousgrill (ME '75)

### Tebbe Family 150th Anniversary Professor of Mechanical Engineering

Chuck completed five co-op sessions with NASA in Huntsville, AL. He was awarded the Charles B. Murphy Teaching Award in 1994, the highest teaching award given by Purdue University. He earned seven H.L. Solberg Best Teaching Awards from the School of Mechanical Engineering and three A.A. Potter Best Teacher Awards from the College of Engineering. Chuck worked with colleagues in developing the Freeform instructional program for undergraduate mechanics instruction in Mechanical Engineering. He has also co-authored three lecture books that are currently being used in the instruction of the three mechanics courses in the undergraduate curriculum.



### Nathanael "Nat" Keammerer (ME '94)

Technical Assistant for Lunar Operations, Space Flight Systems, NASA Johnson Space Center

Nat completed five co-op sessions with NASA in Houston, TX, with rotations in Flight Safety, Space Station Systems Integration, Shuttle Propulsion, Manufacturing and Space Station ADCO Flight Controller. He began his full-time NASA career as a Space Station Flight Controller, spending eight years flying the space station in Mission Control Houston. Nat also acted as the Managing Group Lead for the Exploration Data & Communication Group, containing two Mission Control Flight Controller positions for the Orion onboard computers and Orion communications, who both operated the successful Artmeis I mission around the moon in 2022. On campus, he serves as a mentor for the Purdue Mechanical Engineering Alumni Mentorship Program.



# Keith Churchill (CE '06)

Chief Innovation Officer, Bechtel

Keith completed five co-op sessions with Traylor Bros., Inc. in Louisville, KY, Cape Girardeau, MO, Galveston, TX and Evansville, IN. He began his career at Bechtel as a field engineer on the Motiva Crude Expansion Project in Port Arthur, TX. He provided oversight of the development of Bechtel's Welding and Applied Technology Center, a world-class welding and research center providing innovative solutions to Bechtel's projects. During his time at Purdue, Keith participated in Engineering Projects in Community Service (EPICS), where he coordinated an award-winning design of a new soccer complex for the Tippecanoe Youth Soccer Association.



# Edward "Ed" Barriball (MSE '08)

Partner, McKinsey & Company

Ed completed five co-op sessions with GE Aviation in Evendale, OH, with rotations in Turbine Airfoils Center of Excellence, Glades Park Aviation Component Repair Center, Advanced Composites Technology, Small Commercial Engine Product Support and Rotation Parts Materials Application Engineer. He founded McKinsey's supply chain risk and resilience service line and leads the firm's U.S. Public Sector Operations practice. Ed has been quoted in the Wall Street Journal, Bloomberg, Reuters and World Economic Forum on supply chain resilience, and his research has been referred to by the Financial Times, The Economist and 30+ other significant publications.

# CAREER EXPLORATION & INDUSTRY PREPARATION // ENGR 103 COURSES



# **FYE PROFESSIONAL DEVELOPMENT**

This course is available to First-Year Engineering students and aims to prepare students for successful co-op or internship experiences. In the course, students will develop a resume, cover letter, elevator pitch, interview skills and a LinkedIn profile. They will have the opportunity to connect with engineering student mentors who have already gained professional experience and will hear from several industry speakers on topics such as building a professional networking, creating effective working relationships and more. *Offered in the Fall.* 



## **CHANGING THE WORLD WITH CHIPS**

This course will introduce students to semiconductor technology and the broad range of opportunities within the semiconductor industry. Speakers from some of the largest companies in the world including Apple, ASML, Intel and others will engage students on a weekly basis. Topics covered include logic microprocessors, sustainable manufacturing processes, auto industry, digital healthcare technology, memory technology and more. *Offered in the Fall & Spring.* 



## **SMART CITIES (NEW)**

This course will introduce students to the technology and innovation that impacts the future of our communities. Topics include space habitats, electrification of roadways, the design and inspection of infrastructure, environmental disasters and public health, automation systems for buildings and more. Speakers from companies such as SpaceX, Collins Engineers, Thornton Tomasetti, and others will guest-lecture on how technology and innovation will impact the way we live. Students in this course will develop their personal networks while being presented with resources and opportunities to prepare for exciting careers. *Offered in the Fall.* 



# **DEFENSE & SECURITY**

The United States Departments of Energy, Defense, and Homeland Security play important roles in ensuring the security of our nation. These agencies ensure safety in transportation security environments; organize, deploy, and supply our military; maintain stewardship of our nuclear arsenal and more. This course will feature speakers from various institutions, including the Air Force Research Laboratory, Sandia National Laboratories, and the National Security Agency. Topics include quantum computing for national security, cyber-physical systems in critical infrastructure and more. *Offered in the Fall.* 



## **ENGINEERING IN PUBLIC SERVICE (NEW)**

There is a great need for technical know-how within local government, federal government, and government agencies. This course will introduce a wide range of career opportunities for engineers within the public sector, while engaging with guest speakers on interesting topics. Students will build their network and learn about opportunities to develop skills for successful careers impacting U.S. policy. Students taking this course will have earned credit toward the new certificate program. *Offered in the Spring.* 



# **PHARMA CAREERS & DRUG DEVELOPMENT**

This course will serve to enhance career development across various sectors of the pharma industry. Students will learn from industry professionals at Lilly, Merck, AstraZeneca, Novartis and others. Weekly seminars will provide industry knowledge and help build professional development skills to prepare students for internships, co-ops and full-time jobs. *Offered in the Spring.* 



## **SILICON VALLEY & THE TECH INDUSTRY**

This course will serve to enhance students professional development and prepare course participants for careers in the tech industry and Silicon Valley. This is an embedded spring semester course with travel over spring break to network with employers and Purdue alumni in Silicon Valley. Students will complete assignments to enhance their professional skills and have the benefit of hearing from several industry speakers to develop an understanding of how to successful compete for opportunities in the tech industry. *Offered in the Spring.* 



# BUILDING CONFIDENCE AND CAREERS THROUGH ENGR 103 COURSES //

Rising sophomore in ECE Jash Pola's initial perception of Purdue University underwent a transformative evolution upon setting foot on campus. Throughout his first year on campus, Pola's academic and professional paths have been highlighted by the importance of exploration, networking and personal growth, shaping a successful path in his education.



Pola's interest in engineering took root at an early age, getting involved in robotics as early as the fourth grade. In ninth grade, however, he experienced a newfound passion for the field when he built his own gaming computer. Initially intimidated by the thought of assembling his own computer, Pola found the

process surprisingly straightforward after researching components, specifications and performance, likening it to "adult Legos." While initially drawn to engineering for its problem-solving aspect, the real-world application of building his own computer solidified his decision to pursue it as a career.

During his time at Purdue University, Pola's engineering coursework expanded his knowledge base. Furthermore, his participation in professional development courses offered by the Office of Professional Practice provided him with additional skills and a more nuanced perspective on both his academic and professional pursuits.

# "I remember my resume going into college. It was three pages long. I had a bunch of graphics, had a bunch of different fonts, and different font signs. It was just a mess of a resume. Had every possible thing on there. I did not know how to do an elevator pitch and I could not sell myself."

Pola noted that taking the ENGR 103: FYE Professional Development course provided him with valuable networking opportunities and helped him develop essential professional skills. He noted that the class, combined with the Professional Practice Ambassadors mentorship program, played a crucial role in enhancing his elevator pitch and resume while

also preparing him for career-related events such as networking nights and career fairs. Pola overall credits the class for contributing to his confidence and success in navigating the professional landscape.

After taking the ENGR 103 course, Pola explored various programs offered by the Office of Professional Practice. He discovered classes like "Changing the World with Chips" and "Silicon Valley" through these programs. Motivated by these opportunities, he created a to-do list back in his dorm, researched OPP-offered courses, and planned to take the "Changing the World with Chips" class in the spring semester, as well as participate in OPP's Silicon Valley Study Away program. Attending the Co-op Career Fair and engaging with OPP programs and events further informed Pola's decisions. It was also these experiences that led him to secure a co-op position with GE Appliances.

This summer, Jash will participate in Purdue's Summer Training, Awareness, and Readiness for Semiconductors (STARS) program in the design track. In Fall of 2024, he will begin his first co-op rotation at GE Appliances as a an Electrical Engineering Co-op in Louisville, KY.



# GRADUATING // TEACHING ASSISTANTS



Through the generosity of our sponsors, OPP was able to expand the team of Undergraduate Teaching Assistants to build a strong presence in ENGR 103 courses, create additional support for students going into co-op and GEARE and diversify reach across campus. OPP's impact and engagement are significantly influenced by the incredible mentorship and outreach of the TAs. Their presence across campus supports student success.



Feraas Al-Najjar Mechanical Engineering

Industry Experience Cummins, Inc.

Achievements & Involvements GRIT Award

Full Time Role Graduate School at Stanford University



**Rosemary Allison** Chemical Engineering

Industry Experience Kimberly-Clark

Achievements & Involvements Amateur Radio Club, PPA

Full Time Role Belden

**Ryan Brown** Mechanical Engineering

**Industry Experience** 

HP, AMC Mecanocaucho

Achievements & Involvements

GEARE Ambassadors Executive Board,



Rithika Athreya Chemical Engineering

Industry Experience Procter and Gamble, L'Oréal USA

Achievements & Involvements Purdue Engineering Fellow, Zimmerman Family Award

Full Time Role L'Oréal USA



**Dean Constantine** Chemical Engineering

Industry Experience Capital Adhesives, Eli Lilly

Achievements & Involvements ChE Scholarship x3, Earl and Jean Schrader Scholarship x2, Dean's List

Full Time Role Batelle



**Kyra Fales** Civil Engineering

Honors FYE TA

**Full Time Role** 

**Textron Aviation** 

Industry Experience HNTB, Universidad San Francisco de Quito

Achievements & Involvements Civil Engineering Outstanding Undergraduate Senior

Full Time Role Graduate School at Purdue University



Grant Fiedler Chemical Engineering

**Industry Experience** Endress+Hauser, Max Planck Institute Magdeburg

Achievements & Involvements GEARE Ambassadors Executive Board

Full Time Role Evonik



Chloé Johnfroe Chemical Engineering

Industry Experience SABIC, UL Solutions

Achievements & Involvements PPA Mentor Program Director, Dean's List/Semester Honors

**Full Time Role UL Solutions** 



Zach Logar Materials Engineering

Industry Experience Northrop Grumman, 3M

Achievements & Involvements Purdue Engineering Fellow, MSE Service Award

**Full Time Role** Graduate School at Purdue University





Chemical Engineering

Anjali Padiyar

**Industry Experience** The Clorox Company, Procter and Gamble

Achievements & Involvements **GEARE Ambassadors Executive Board** 

Full Time Role Procter and Gamble



**Industry Experience** NASA, Intel, GE Appliances, Tesla

Achievements & Involvements SWE, Co-op Employer Scholarship

**Full Time Role** Intel









Isabel Hardy Industrial Engineering

**Industry Experience** Anheuser-Busch, HP, Medline

**Achievements & Involvements** Industrial Engineering Undergraduate Viva Voce Committee, GEARE Ambassadors

**Full Time Role** Ernst & Young

Emma Johnfroe Chemical Engineering

**Industry Experience** SABIC, UL Solutions

**Achievements & Involvements** PPA Secretary, Dean's List/Semester Honors

**Full Time Role UL Solutions** 

### Annelise Nauman **Biological Engineering**

**Industry Experience** Merck

**Achievements & Involvements** Ambassador and Peer Mentor for Honors Engineering, Dean's List/Semester Honors

**Full Time Role** Merck

Kavlee Smith Computer Engineering

**Industry Experience** Microsoft

**Achievements & Involvements GEARE Ambassadors Executive Board, SWE** 

Full Time Role Microsoft

# **Undergraduate Teaching Assistants** continuing into 2024-2025

**Emily Barone** Cat Bradley Jarrett Corneil

Kai Ze Ee Marek Gibson James Mock

Grace Olden Ali Steele Noah Willis

# ACADEMIC ACHIEVEMENT // SCHOLARSHIPS \$144,799 AWARDED TO SUPPORT STUDENTS IN WORK INTEGRATED LEARNING

# LEONARD E. WOOD SCHOLARSHIP

Established in 2007, this scholarship honors the memory of the late Leonard E. Wood. Wood received his PhD from Purdue University in 1956 and subsequently joined the faculty as a Professor of Civil Engineering. He then became the School of Civil Engineering's Faculty Coordinator for Purdue's Cooperative Education Program in 1989, a role he continued in until his untimely death in 2004. The scholarship fund exists thanks to a generous donation from Professor Wood's widow, Margaret, who sought to honor his dedication to the co-op program while enabling the achievement of today's students. The Leonard E. Wood Scholarship for Cooperative Education is awarded to deserving Co-op students based on academic merit and life-changing experiences brought about by the Co-op program. Cooperative education never had a greater friend, supporter or promoter, and no one better exemplified the co-op value of practical education as a mentor, counselor and teacher.



Owen Jones (BME)

Pranav Krishnamoorthy (AAE)

Chance Lim (IE)

Grace Rennekamp (BME)

# WILLIAM C. & LINDA E. NELSON SCHOLARSHIP

William and Linda Nelson have been long-standing generous supporters of Purdue's Co-op program. William (Bill) is a 1974 Chemical Engineering graduate from Purdue University. A year later, he earned his Master's in Chemical Engineering. Having over 40 years of industry experience, Bill has received many awards to honor his accomplishments. Bill was inducted into the 2013 Cooperative Education Hall of Fame and was also honored as a 2017 Outstanding Chemical Engineer by Purdue University. An endowment fund was established by Bill and Linda for the creation of annual scholarships for co-op students. Additionally, incentive grants for instructors offering on-campus and/or online courses for co-op students have been generated.

Madison Bird (ChE) Rosemary Allison (ChE) Grant Fiedler (ChE) Bailey Feller (ChE)

Catherine Bradley (ChE) Chen Yuan-Jung (ChE)



# **OPP IMPACT AND EMPLOYER-SPONSORED SCHOLARSHIPS**

The Office of Professional Practice has awarded the students listed below with \$500 scholarships through the generous support of employers and alumni. Employers are able to help students remember and recognize their company through assisting them with their education and sponsoring one of these scholarships. The OPP Impact scholarship is supported by various Co-op/GEARE alumni contributions and is awarded yearly. These awards are given to OPP students who demonstrate excellence and involvement in work-integrated learning.

- Devon Christner (IE) Landon Goetz (ME) Caio Gindler Corsini (ME) Annelise Nauman (BE) Maya Driscoll (BE) Alex Beers (ME) Manav Jhaveri (ME) Rohil Senapati (ME) Denny Guo (BME) Chalisa Kulprathipanja (BME)
- Elijah Moss (ME) Brooke Yorio (ABE) Malia White (CMPE) Alyssa Williams (ME) Zoe Egbert (BME) Quan Dinh (CS) Yash Agarwal (CS) Rickyjon Balgenorth (AAE) Isabel Hoppe (EE) Jennifer Cahillane (ME)
- Charles Stewart (EE) Mohnish Shah (IE) Emelina Aubeneau (ME) Nicandro Díaz Butrón (IE) Neha Pal (ME) Owen Hayes (RET) Meredith Dawes (EE) Essey Adnew (AAE) Aksh Iyer (AAE) Alyssa Brewer (CMPE)



# CO-OP ALUMNI SPOTLIGHT // ALEX DOBBINS

From early adoption of the unique opportunities the Office of Professional Practice offers to thriving in diverse work environments, Alex Dobbins' (ChE '22) story is a testament to the benefits of experiential learning. Upon graduating, Dobbins moved to Austin, Texas where he currently works as a Cybersecurity Solutions Architect at Emerson. During his college co-op experiences, Dobbins was able to develop and hone both technical skills and soft skills, which have helped shape his early career experiences at Emerson.

Throughout his time at Purdue University, Dobbins was eager to get involved with as much as he could. With involvement in his fraternity, Alpha Epsilon Pi, and his leadership in the Purdue Engineering Student Council (PESC), Dobbins did not waste opportunities to expand his development outside of the classroom. Paired with his time participating on co-op rotation, Dobbins was able to learn and retain many skills beyond just academic and technical.

"The experience you get while co-oping is so much better than what you can get from an internship. Since graduating, many of my peers have struggled with the post college adjustment. Trivial things like 'Oh shoot, I don't live next to my best friends anymore and I don't know what do with all this free time. How do I cook? How do I clean? How do I do all these things that were never talked about in lecture?' When you co-op, you get to practice these things for a couple of weeks or a couple of months at a time in a safe environment versus when you graduate, and it's all the real world at once."

The co-op program offered by the Office of Professional Practice allows students to gain hands-on experience while being directly exposed to industry. Maximizing these opportunities, Dobbins spent two summers interning with The Sazerac Company. Additionally, from August 2018 through January 2021, he completed four rotations at Vantage Specialty Chemicals in Quality Assurance, R&D, Process Engineering, and Production Supervision.

*"The soft skills were nice to figure out in college [through the ENGR 103: FYE Professional Development course], but during my two Engineering rotations at* 





Vantage I worked directly with the plant control system. Although I wasn't directly coding or doing any of the process control, I was working with the teams responsible for these actions and becoming familiar with how it affected the plant. Now at Emerson, I once again work with plant control systems and my co-op experience has given me a huge leg up on some of my peers because I already understand how these systems work at a high level."

Dobbins took full advantage of every opportunity to shape a fulfilling and successful start to his career. Throughout recounting his successes, he noted the invaluable impact that the Office of Professional Practice's opportunities such as co-op has had for him. To give back to the program that provided so much for himself, Dobbins returned to campus this year to speak to current students in the ENGR 103: FYE Professional Development course.

"While working for the Office of Professional Practice, I was helping students get jobs, helping students figure out what they want to do with their life, and creating opportunities for students to get experience that can genuinely make a huge difference in their lives. I love what I do now, but that was the most rewarding job I've ever had. I think about that a lot and it's like, 'OK, if I won the lottery tomorrow, I would probably retire and go work at a Co-op program somewhere."

# **CARA BIRSCHBACH**

From a small-town upbringing in Geneva, Illinois, to a thriving international career, Cara Birshbach (ME '18) represents the power of global educational opportunities. Before starting college at Purdue University, Birshbach embarked on a pre-freshman study abroad experience that shaped her future. This early exposure to international education ignited her passion for Spanish fluency and a global career.

Upon returning, Birshbach took a semester-long class with an action project hosted by the Study Abroad Office. This experience cemented her desire to immerse herself in international environments. Through this pursuit, she discovered the Global Engineering Alliance for Research and Education (GEARE), a perfect fit for her goals. The GEARE program was eye-opening. The opportunities were designed to immerse students in international engineering contexts.

One pivotal moment in the GEARE program was planning her international internship. Birshbach's desire to work in Europe, specifically Spain, led her to leverage contacts made through various programs, including Boiler Gold Rush (BGR) and staff at the Office of Professional Practice. This network helped her secure an internship with HP in Barcelona. The support from the GEARE program, coupled with her initiative, made this possible.

During her six months in Barcelona, the GEARE program's emphasis on adaptability was reinforced. Navigating a new country, from securing residency to managing unexpected changes, taught her invaluable lessons in flexibility and resilience. These skills have been crucial in her career, especially in a large corporation like HP.

"The biggest takeaway is adaptability. Things just don't go as planned, and that relates fully to work. You have to be adaptable, especially in a big company. Adaptability is a key skill that hiring managers look for and is important to have as an employee anywhere because it allows you to switch into different roles."

Post-graduation, Birshbach transitioned from R&D in mechanical engineering to roles in product management and marketing within HP's international framework. Living and working abroad, especially in a vibrant city like Barcelona, has provided a fulfilling work-life balance.

The GEARE program was the catalyst for Birshbach's international career. It taught her to embrace opportunities aligned with her goals and push her comfort zone. Her advice to others is to challenge themselves to expand their comfort bubbles and embrace failure as a stepping stone to growth.

"Challenge yourself to fail. It's hard to start something new when you know you're not going to do it well the first time. I try to have a mantra in my head: dare yourself to fail. Just go for it. By shifting to the edge of your comfort zone, you might find something you wouldn't have otherwise."







# GET INVOLVED // STUDENT ORGANIZATIONS



GEARE Ambassadors serve to advance the GEARE brand to students, alumni and employers, while improving students' overall GEARE program experience. They also promote global opportunities for Purdue engineering students through internships, study abroad programs and other worldwide programs. Through the numerous social and professional events they hold throughout the academic year, including resume reviews, global research panels and tote bag painting sessions, they have aided in the growth and development of the GEARE program.

Professional Practice Ambassadors (PPA) is a student organization with members who have a shared experience in work-integrated learning. PPA includes co-op students that seek to enhance the awareness and experience of the co-op program at Purdue. PPA act as delegates to the Office of Professional Practice in promoting OPP programs to prospective students, assisting with recruitment events and interacting with industry partners. They hold programs and events of their own such as PPA Networking Night, ENGR 103 Mentorship Programs and various social activities.





# OFFICE OF PROFESSIONAL PRACTICE **ADMINISTRATION**

Dr. Phillip Dunston, Director

Joe Tort, Associate Director

**Jenny Strickland**, Assistant Director, Co-op Programs & Student Development

Patrick Francis, Assistant Director, Employer Engagement

**Katrin Danielson**, Assistant Director (Purdue in Indianapolis), Co-op Programs & Student Development

Barb Albrecht, Employer Information Specialist

Tina Alsup, Student Information Specialist

Julie Peretin, Professional Practice Programs Administrator

Gabriel Rios-Rojas, Assistant Professor, Global Engineering

Heather Fabriès, Global Co-op Specialist/GEARE Manager

Kimberly Graham, Pharma Co-op & Lilly Scholars Program Manager

Sophie Tung, Semiconductor Co-op Program Manager

Akash Patil, Graduate Assistant, Intercultural Learning & Milestones

Alejandro Benítez De la Riva, Graduate Assistant, Milestones

Lucy Wagner, Graduate Assistant, Communications

Margaret Mowrer, Undergraduate Communications Specialist





**Office of Professional Practice** 



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