

ARRHIANNA PLAYKO

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EDUCATION

NORTHWESTERN UNIVERSITY – EVANSTON, IL

JUNE 2021

Bachelor of Science in Chemical Engineering – Sustainability and Design Focus

Cumulative GPA: 3.3/4.0

Bachelor of Science in Environmental Sciences

SKILLS

TECHNICAL SOFTWARE: Python, MATLAB, Aspen HYSYS, Aspen Process Economic Analyzer, SmartSolve QMS

COMPUTER SOFTWARE: Microsoft Office, Microsoft Excel, Microsoft Teams, Zoom

LAB TECHNOLOGY: Differential Scanning Calorimeter, Mechanical Test Instrument, Electrospinning

PROFESSIONAL EXPERIENCE

EDWARDS LIFESCIENCES – IRVINE, CA (REMOTE)

JUNE – SEPTEMBER 2020

QUALITY ENGINEERING INTERN

- Evaluated complaints on Surgical Structural Heart (SURG) products in SmartSolve QMS by:
 - Conducting DHR reviews and investigating any non-conformance reports
 - Performing engineering evaluations on products to identify root causes leading to device failures
- Initiated a reference list for patient factors leading to heart valve and ring failure to provide rationale for engineering evaluations and clinical notes
- Updated and reformatted 40 page US SURG Decision Rationale Matrix document to make accessing rationales more user-friendly and consistent, reducing time and increasing accuracy of most users
- Harmonized several groups within complaints including data analytics, engineers, clinicians, data registry, and handlers via Microsoft Teams and channels leading to a more collaborative virtual environment

OHIO STATE UNIVERSITY, JOHN J. LANNUTTI MSE LAB – COLUMBUS, OH

JUNE – AUGUST 2019

LABORATORY INTERN

- Led adaptation of Dr. Lannutti's research to be applied to a class of over 100 undergraduate students
- Designed and modified electrospinning/sintering processes and aging/degradation tests of PET-PCL polymer blends to facilitate optimal student learning and understanding
- Developed lesson plans, lab worksheets, and assessments to guide teacher's assistants and students
- Established baseline thermal and mechanical data of electrospun scaffolds for the grading rubric

DESIGN THINKING AND COMMUNICATION COURSE – EVANSTON, IL

JANUARY – JUNE 2018

TEAM LEADER

- Directed the design process of user observations and testing, mockup designing, performance testing, final product presentation, and report to learn how to properly frame design challenges in the industry
- Met one-on-one with clients weekly and managed projects by delegation and use of GANTT charts
- Synergized two cross-functional teams of four to design the following products:
 - Inner Circle, a modified compression sock that allows patients with limited motion, strength, and flexibility to efficiently apply the prescribed garment
 - PulTrac, a tracking device for children to ensure their security when without supervision

LEADERSHIP

AMERICAN INSTITUTE OF CHEMICAL ENGINEERS – EVANSTON, IL

JANUARY 2020 – PRESENT

MENTOR

- Advise chemical engineers with class scheduling, career planning, and community involvement
- Ensure mentee's academic success in homework, projects, and major requirement assessments

SOCIETY OF WOMEN ENGINEERS – EVANSTON, IL

SEPTEMBER 2017 – PRESENT

MENTOR

- Support five underclassmen adjust to college life through time and stress management techniques
- Facilitate their student involvement on campus and in the community through SWE hosted events

PI BETA PHI FRATERNITY FOR WOMEN – EVANSTON, IL

FEBRUARY 2018 – JUNE 2019

PHILANTHROPY COMMITTEE

- Orchestrated fundraising events for Read>Lead>Achieve which provides access to books and promotes reading at school and home for school-aged children
- Coordinated events with other organizations to expand our chapter's local involvement and impact