

Jason Joshua

jajoshua@ucsd.edu • (925) 888-9270 • [linkedin.com/in/jajoshua](https://www.linkedin.com/in/jajoshua) • jasonjoshua.com

A passionate, energetic man who is willing to learn and work on creative yet out-of-the-box innovation. Experienced in both forging strong teamwork between individuals as team player.

WORK EXPERIENCES

Diagnologix LLC, San Diego, CA, (6/18 – 3/19) - Mechanical Design Engineer Intern

A Biotech startup that utilizes MicroBubble (MB), an innovative cell isolation technology, on developing innovative tools and products for unmet medical needs. Awarded with multiple Phase II SBIR Grants, totaling more than USD \$1MM.

- Designed and developed medical grade automated system for MB isolation
 - Utilized 3D CAD tools, CNC Machine, 3D printer to prototype for NIH and NCI
- Integrated Arduino and PSoC to automate a closed system MB blood isolation technology
- Utilized FEA to approximate lifetime of gear and device's mechanical system
- Coordinated with suppliers and vendors to obtain prototyping parts. Generated technical specifications and drawings to be used by machine shops, plastic injection molding companies.

Specific Project Experiences:

- Designed and prototyped centrifugation tubing system to prevent tangling by utilizing bevel gear assembly
- Calculated the mechanical power transmission system for the device to meet the MB isolation method criteria

University of California, San Diego, San Diego, CA, (1/18 – 3/18) – Machine Shop Teaching Assistant

Mechanical Engineering Department

- Taught 20 senior undergrad and graduate students to brainstorm and develop multiple project prototypes by utilizing 3D printer and Fabrication Machines
- Collaborated with the lab manager to maintain and fix the Fabrication Machines by recalibrating machines, refabricate parts for broken machine, purchasing tools and extra parts from suppliers
- Remodeled the class system by making lab procedures, videos, worksheets, quizzes to be more efficient

PT. Indofood CBP Sukses Makmur, Jakarta, Indonesia, (07/16 – 09/16) - Mechanical Engineer Intern

A USD \$5.5 billion Global Fast-Moving Consumer Goods company in Indonesia

- Initiated business research for FMCG (Fast-Moving Consumer Goods) regarding purchasing five packaging machines that are worth over USD \$200MM
- Assisted a maintenance and improvement presentation to the Head of Human Resource and Board of Directors
- Developed and presented a continuous improvement plan on KPI analysis, and packaging machine performance with other interns from Bandung Institute of Technology (Indonesia) to the Packaging Division Management

EDUCATION

University of California, San Diego, (03/19) – B.S Mechanical Engineering and Minor in Business Administration

- Diablo Valley College M.K Fives Academic Scholarship Recipient (May 2016)

EXTRACURRICULAR ACTIVITY

San Diego Indonesian Association, (06/18 – Present) – President

UCSD's official Indonesian student association with over 200 members

- Managed 2018 primary project of providing Indonesian student with future career platform in the United States or Indonesia
- Increased the number of events executed per quarter by streamlining the existing process in the organization for event planning
- Implemented feedback from club members to offer more events that are favored by the club members
- Planned and managed several fundraisers over the course of the quarter to raise USD \$5,000 which was used in several new events to promote inclusion among new and old club members

OTHER RELEVANT INFORMATION

- **Computer:** Proficient in Solidworks (FEA, 3D Modelling), AutoCAD, ANSYS, Pro-E, Autodesk Inventor, LabVIEW, MathCAD, 3D Print, Arduino, PSoC, Matlab, Mechatronics, PID Controller, Microsoft Office
- **Languages:** Bahasa Indonesia (Native), English (Fluent), Mandarin Chinese (Fluent), Malay (Fluent)
- **Machining:** CNC machine, Milling, Lathe, Band-saw