

Grady Conwell

Pasadena, CA | **818-928-9441** | gradyconwell@icloud.com | 3.9/4.0 GPA | gradyconwell.com

Mechanical and Mechatronic Engineering Major seeking an internship during Summer 2025 with a focus on design for manufacturing, hardware development, and testing.

EDUCATION

Pasadena City College | 2023-24

B.S. in Mechanical California State University: Chico | Expected Graduation: Spring 2027

EXPERIENCE

2025 | Mechanical Engineering Intern at Copper | (Full-time from June–Aug.; extended to part-time from Aug.–Dec.)

- Engineered, validated, and qualified an injection-molded component from concept to mass production for a 3rd-generation battery electric range.
- Optimized part for Design for Assembly (DFA) by introducing U-shaped cantilever snap joints to resolve production bottlenecks and simplify assembly.
- Supported NPI by designing assembly fixtures, authoring SOPs for the production line, creating detailed electrical harness drawings, and lifetime testing of PCBAs.

2023-25 | Boutique stationary design and machining. | <https://www.ebay.com/usr/grcon-1>

- Achieved **100% positive feedback** across 500+ sales and 150+ written reviews.
- Continuous reduction of COGS and steady sales growth over 2 years.
- Managed relationships with key suppliers and contracted machine shops to ensure quality.

2025 | Co-Chair / Vice President, Chico State Society of Manufacturing Engineers

- Mentoring of members in machining and design for manufacturing.
- Hardware / Controls lead for Chico SME's humanoid robot arm.

ENGINEERING PROJECTS | See gradyconwell.com for pictures and details.

2021-22 | High Speed FFF 3d Printer

- Used CAD tools, to draft and model an original design.

2022-24 | Benchtop Aluminum Router

- Used CAD tools to develop a machine simulation and CAM post processor.

2024-Ongoing | Compact Gang-tool CNC Lathe

- Fabricated aluminum frame and mineral casting.
- Engineered CNC control cabinet and drive system with AC servos, sensors and closed loop stepper motors.

SKILLS

CAD/CAM & Parametric Modeling

- Proficient in Autodesk Fusion 360 and SolidWorks (CSWP Certified).
- Project experience with Sheet Metal Design, GD&T, Large Assemblies, Motion systems, Design for Manufacturing, Manufacturing Drawings.

Programming

- Project experience with JavaScript, C++, Python and LaTeX. Classroom experience with MATLAB.
- Project and work experience with ESP32 devices, with a focus on manufacturing test equipment.

Other

- Operation, Repair, and Maintenance of prosumer 3d Printing machines, esp. Prusa.
- Working knowledge of graphic design tools (Affinity Designer & Publisher, InDesign, Illustrator).
- International Vendor Sourcing, Outreach, and Procurement.