Ronak Chougule

ronakc@bu.edu | ronakc.info | LinkedIn | +1 (857)-869-3538

EDUCATION

Boston University College of Engineering
Master of Science in Product design and Manufacturing
May 2023
Vishwakarma Institute of Technology
Pune, India
Bachelors of Technology in Mechanical Engineering
Aug 2020

PROFESSIONAL EXPERIENCE

Mechanical Engineer Co-op

Burlington, MA

Desktop Metal

Jun 2022- Present

- Implemented concepts and followed through initial prototype and testing of vacuum chamber, print head gantry and oxygen sensor for future production
- Co-led multiple drawing reviews using SOLIDWORKS and Salesforce propel data management
- Designed and constructed test rig for production setup to conduct static electricity generation experiment
- Built parts to specification for prototype using machine tools and 3D printers

Graduate Student Technician

Boston, MA

Boston University

Jan 2022 – May 2022

- Teaching Assistant for Automated Design and Manufacturing Labs
- Hands on experience with Haas Mills, Gibbs CAM and Universal Robots and grading student work
- Operating CNC machine for demonstrating various machining process to students

Mechanical Engineer Intern

Kolhapur, India

Chougule Steels

May 2021- Sep 2021

- Maintained furnaces of 1500 kg and 500 kg capacities used for sand casting of heavy parts
- Lead two CAD design projects in production improvement of contract machinery
- Performed analysis on furnace coolant monitoring system used for quality control during the melting process
- Prepared quality report including project progress and test results for further approval

Product Design Engineer

Kolhapur, India

Wings44

May 2020- May 2021

- Collaborated with technicians and senior engineers to ensure DFM and product performance
- Planned and developed multiple industrial products using SOLIDWORKS and ergonomic studies
- Programed CNC Laser for precision cutting sheet metal and reducing finishing requirements
- Worked in optimizing hospital functionality by designing comfort ICU beds

SKILLS

Mechanical: Ender 3D printer, Flashforge Finder, Lathe, Arc welding, CNC Lathe

Software: CAD: SOLIDWORKS, Auto CAD, Onshape, Programming: Gibbs CAM, C, C++

ENGINEERING PROJECTS

MIT Hyperloop III Sep 2021

- Prototyped Tunneling Machine including guided auger boring with Barbco Tribor, Inc
- Re-designed new safety system for cutter head and existing guidance mechanism
- Installed information acquisition system for monitoring real-time temperature, position and velocity of steering head
- Lead MIT's Mechanical Engineering team in passing the safety regulations
- Managed onsite operations to set up the Tunneling Machine

Data Acquisition Device for Inspecting Orthopedic Foot Pressure

Aug 2020

- Developed Foot sole with force sensitive resistance's for measuring pressure intensity
- Established a software to collect and analyze the data
- Obtained experimental results to quantify degree of deformation of foot and areas with high pressure