

Piyush Tandon

+1 (253)392-9925 | piyush.tandon321@gmail.com | [linkedin.com/in/pitandon](https://www.linkedin.com/in/pitandon) | github.com/Mrtandon97 | [Portfolio](#)

Education:

- **Master of Science** in Mechanical Engineering (Manufacturing and Operations) **GPA 3.72** **Sep 2022 – Aug 2024**
University of Washington, Seattle, WA
- **Bachelor of Engineering** in Mechanical Engineering. **GPA 8.13/10** **Jul 2017 – Jul 2021**
Thapar Institute of Engineering & Technology, Thapar University, India.

Skills:

- **Design and Prototyping:** SolidWorks, CREO, Siemens NX, Teamcenter, CFD, Rapid Prototyping, Machining composites, 3D Printing, GD&T, ASME Y14.5 standards and ISO9001.
- **Manufacturing and Quality Control tools:** Process capability management, defect analysis, PLM, Six Sigma methodologies, 5S, Lean Manufacturing, 8D, APQP, PPAP, PFMEA.
- **Supply Chain tools:** ERP, QMS, MRP, DFM, Kaizen, Minitab, JIRA and Time study.
- **Project Management:** Stakeholder Management, Risk Mitigation, Resource Allocation, Agile/SCRUM, Timeline Tracking.
- **Data visualization and programming:** SQL (MongoDB), Python, MATLAB, Tableau, and Power BI.
- **Soft skills:** Experienced in working with cross-functional teams, ensuring alignment, and facilitating efficient project execution. Strong communicator capable of articulating technical and non-technical concepts to diverse audiences with strong presentation skills.
- **International Experience:** Summer School Abroad at **University of Oxford**, Leadership Exchange program in **Istanbul, Turkey**.

Work Experience:

- Product Engineering Intern** **Jan 2024 – Aug 2024**
Bendix Commercial Vehicle Systems – Kalamazoo, MI
 - Engineered process improvements and optimized designs for heavy duty vehicle brake components using CAD and DFMEA.
 - Utilized predictive modeling techniques to inform material selection and design approaches, improving product reliability.
 - Engaged cross-functional teams in CI initiatives, fostering a mindset of continuous improvement.
 - Participated in Design Review Council, Design Verification Plan and documenting key design changes.
- Mechanical Engineering Intern** **Jul 2023 – Dec 2023**
UW Facilities-Engineering Services – Seattle, WA
 - Collaborated on projects to enhance HVAC system reliability across campus facilities, performing heat load calculations, equipment selection, and layout adjustments.
 - Increased system uptime by implementing strategic design modifications to reduce equipment strain.
 - Identified cost saving methods to save 3.8 million dollars/year and attain 45% reduction in carbon footprint.
- Senior Analyst (Product and Data)** **Jul 2021 – Sep 2022**
Capgemini Technology Services – Pune, India
 - Managed diverse project teams through JIRA, overseeing task assignments, tracking progress, and facilitating efficient communication. Improved task visibility and helped maintain project timelines, resulting in a 10% increase in project delivery efficiency.
 - Leveraged advanced data analytics to drive product development and enhancement strategies, leading to a 15% increase in customer engagement and 0 customer escalations. Supported project engineering projects in an agile work environment.
- Manufacturing Engineer (International Internship program)** **Feb 2020 – Aug 2020**
Mercedes-Benz US International – Tuscaloosa, AL
 - Optimized assembly line layouts for GLE and GLS models manufacturing, reducing takt time and increasing production efficiency by 2%
 - Analyzed supply chain data using SAP and Excel to track that helped increase supplier on-time delivery rates by 8%.
 - Assisted in testing and validating product features, providing critical feedback to the design team based on testing outcomes.
 - Collaborated with engineering, logistics, and production teams to coordinate material sourcing and process changes for new launches.
 - Participated in internal audits and participated in CAPA meetings, driving improvements in assembly process and supply chain.

Projects:

- Tiny ML Smart watch** [project link](#) **Jun 2023 – Present**
 - Designed and assisted in development of a voice-activated panic detection system using ML for healthcare applications, managing a team of developers.
- NASA JPL (Grad Capstone)** [project link](#) **Jan 2023 – Jun 2023**
 - Led the team as project manager and assisted a team of CS professionals in developing ML Model for Multi Static Lunar GPR.
- Control model for automated traffic navigation** [project link](#) **Jan 2023 – Mar 2023**
 - Designed a control system for autonomous vehicle navigation using Control Lyapunov Functions and Control Barrier Functions
- Grainer (Undergrad Capstone)** [project link](#) **Sep 2020 – May 2021**
 - Designed and manufactured an automated grain dispensing device with a quality control mechanism for grains.

Certifications:

- Certified Associate in Project Management (CAPM) – PMI