

WORK EXPERIENCE

Baker Hughes

Software Engineer

India

Sep'23 – Present

- Relocated from Ireland to India, taking on leadership for 1 project and consulting responsibilities for 3
- Led product release and drove technical delivery across 4 projects in 2 years, contributing to features, PDRs, & SRS
- Standardized 10+ hygrometry algorithms and created reusable documentation for future product development
- Spearheading UI/UX design for a state-of-the-art hygrometer, leveraging TouchGFX & C to deliver a modern, highly interactive UI
- Authored 4 design records in 1 year, spanning diverse topics including proprietary algorithms to image conversion scripts

Baker Hughes

Software Engineer

Ireland

Aug'22 – Aug'23

- Joined as a Graduate Software Engineer and was rapidly promoted to SWE 1 within 5 months
- Utilized Figma to design and prototype user interfaces, developed wireframes, interactive prototypes, and detailed user workflows
- Developed a Windows application simulator for rapid prototyping - resulted in early user feedback driving usability
- Created the first icon-based GUI for the product line, significantly improved user experience & reduced user error by 30%

Ericsson

AI Intern

India

Jun'21 – Aug'21

- Implemented a clustering-based query classifier to categorize internal IT requests, enabling efficient routing and resolution of issues
- Implemented NLP preprocessing, TF-IDF vectorization (Scikit-learn & NLTK), followed by k-means clustering for query classification

EDUCATION

Trinity College, Dublin

BAI Computers and Electronics Engineering

Ireland

2018–2022

- Activities:** Indian Society, Formula Trinity, Voluntary Tuition Program
- Group project ranked Top 5 in class, advanced to EU competition. Developed a sustainable water solution for water-scarce countries

KEY PROJECTS

HygroPro XP - Smart Moisture Analyzer

Lead Engineer

India

Jan'24 - Oct'24

- Took over project leadership after previous lead's departure. Drove 2 major releases (Mar '24 & Oct '24); generated \$500K revenue in 6 months.
- Led a team of 3 developers, delivering 10 high-priority features and resolving 20+ bugs in the October release.
- Facilitated design verification reviews, ensuring adherence to industry standards (including MISRA) and high-quality software
- Improved hygrometry algorithm accuracy from 10% to 3% using a Python simulator, tested 20+ algorithms, and resolved 4 defects
- Improved code modularity and application reliability by refactoring a monolithic 6000-line file, reducing its size by 33%

XMTCpro: Smart Gas Analyzer

Consulting Engineer

Ireland, India

Aug'22 – Sep'24

- Designed & developed the complete UI/UX, encompassing 17 menu types and 12 core features; generated \$400K+ revenue in 2 months.
- Partnered with product and technology teams to develop features & workflows focused on minimizing user errors
- Resolved 70+ bugs, including 40 critical issues within a focused 2-month period, significantly improving software stability
- Led cybersecurity reviews, ensuring compliance for product launch, and contributed to detailed design reviews.
- Oversaw static analysis for MISRA C compliance and collaborated with an external agency to achieve SIL 2 certification.

SKILLS

Programming: Python, C, C++, SQL, XML, Git, Matlab, TeX, Static Analysis, Git Workflows

Technologies: IAR, Parasoft, PostgreSQL, Linux, SPSS, Protege, Figma, Touch GFX