Kartik Shreenath Bohra

Portfolio | kshreenathbohra@gmail.com | +91 9660269595 | LinkedIn

SUMMARY

Experienced Electronics Engineer specializing in hardware development within the aerospace and healthcare industries. Committed to creating innovative products with a blend of creativity, engineering precision, empathy, and leadership excellence

SKILLS

Software Tools : MS Office Suite, Altium Designer, Siemens EDA Tools (Questa Sim, Hyperlynx, Xpedition), Robot

Operating System (ROS), Git, JIRA, Confluence.

Hardware Proficiency: Microcontrollers (AVR, STM32, NRF, ESP Series), FPGA Platforms (AMD, Intel), Discrete &

Analog ICs, Spectrum Analyzers, Digital Storage Oscilloscopes (DSO), JTAG Debugging Tools.

Communication Protocols : I2C, SPI, UART, Mill-1553, ARINC-429, ModBus, ARINC-825 (CAN)

Programming Languages & HDL: C/C++, Python, Verilog, VHDL

Miscellaneous: Familiar with FDM, SLA, and SLS 3D Printing Technologies; expertise in MKB Panel Design.Soft Skills: Expertise in Electronic Product Lifecycle Management, Collaborative Teamwork, Critical and

Analytical Thinking, Project Management, Change and Risk Management, and Effective

Communication.

EXPERIENCE_____

Boeing, Bangalore, India

Electronics System Design Engineer

Jun, 2022-Present

- Vehicle Management Sysbsystem Computer, Wisk
 - Developed and implemented the Mil-1553, ARINC429, and SPI modules on the Vehicle Management Subsystem
 Computer, resulting in a \$25,000 cost reduction and a 52% checkout time decrease by replacing existing COTS
 modules.
 - Analysed 1400 hardware requirements from LRU System to component level and proposed design improvements.
 - Managed 3 design phases: Preliminary Design Review, Schematic Capture, and Integration.
- Boeing Defence & Space Projects
 - Conducted Value Stream Mapping for Boeing Defense & Space projects, achieving 100% milestone fidelity and a 1.25 CPI.
 - Led obsolescence analysis on 60 high-risk parts, providing alternatives for 42 NRND parts to maintain uninterrupted production.
 - Coordinated library part creation and resource allocation for new 3D printed relays in MKB panels.

Johari Digital Healthcare Limited, Jodhpur, India

Product Engineer

Sept,2021-Jun,2022

- Designed hardware for 4 medical devices, optimizing component selection to comply with **ISO13485**, **MDSAP**, and **CE standards** while reducing costs by **60.14%**.
 - o Leveraged QFN package FPGA in place of obsolete discrete circuits, reducing PCB area by 32%.
 - o Collaborated across departments to ensure BOM accuracy and mechanical integration.
- Proposed and planned 10 new hardware projects, creating **POC circuit designs, project plans, and work breakdown structures** for effective production estimates.

EDUCATION

Jai Narayan Vyas University

Bachelors in Engineering, Electronics & Communication

2017-2021

Majors in Digital Circuits, Embedded System & Robotics.

PUBLICATIONS

- Kartik Shreenath Bohra & Yoshita S. Dharmadhikari, Historical case study of Fly by wire, The Tech That Expanded Human Horizons in Aviation, IEEE History of Electrotechnology Conference, Florence, Italy, 2023
- Manoj Nath, Kapil Sharma, Kartik Shreenath Bohra, Modernizing the User Experience of 'Integrated Production Visibility'- a supply chain application, Boeing Technical Journal, volume 12 issue 1 (Boeing-internal).