

Thuan Dinh

Electrical Engineer

Upper Darby, PA - Email me on Indeed: [indeed.com/r/Thuan-Dinh/13858d3d408811b2](https://www.indeed.com/r/Thuan-Dinh/13858d3d408811b2)

More than 10 years of engineering hands-on experience in circuit design, reverse engineering, product development, circuit testing and trouble-shooting, electromagnetic interference evaluation and testing, manufacturing, component selection, schematic design/capture, and printed circuit board (PCB) design. Design work includes microcontrollers and microprocessors, analog, digital, and RF circuits. Extensive experience in using most of the lab equipments, including HP/Tek analog and digital scopes, Tek Spectrum analyzers, network analyzer, and SigGens, etc.

WORK EXPERIENCE

Hardware Design Engineer

MEI - West Chester, PA - January 2011 to Present

- Design and development embedded hardware system for electronic bill acceptors, coin mechanisms and other unattended transaction systems. Hardware development for low noise / high speed data acquisition which involves with analog/digital circuits, A/D, D/A, active filters, op-amp, transistor based amplifier, optocoupler, and DC motor control.
- Design for environmental and electrical stress such as temperature, ESD, and EMI.
- Schematic capture and PCB layout support.

Senior Electrical Engineer

ACI Technologies, Inc - Philadelphia, PA - August 2000 to May 2010

- Technical lead on the design/ruggedization of avionic audio systems for the Department of Defense (DoD), US Navy and US Army.
- Involved in the re-designing of US Army survivor radio ARS6-A. Created all the schematics for ARS6-A re-design including RF, analog, and digital sections. Responsible for the prototype testing and debugging.
- Re-designed 1960's obsolete communication system controller C6533/ARC for the US Army Chinook and Blackhawk helicopters. Implemented corrective actions and conducted environmental, EMI, and power requirement testing, as well as prototype field testing in-platform, for form, fit, function, and airworthiness.
- Participated in the re-designing of obsolete airfield AN/TRN-30 beacon radio set and AN/ARS-6(V) UHF Receiver/Transmitter radio by using Commercial-Off-The-Shelf (COTS) parts that had increased capability and lowered total ownership costs.
- Conducted environmental MIL-STD-810, EMI MIL-STD-461, and power requirement MIL-STD-704 testing for various equipments as well as critical stress and other EMC/EMI evaluations.
- Responsible for CAD schematic capture and PCB layout for most of ACI's engineering projects. Provided guidance, support, and directions to PCB layout personnel.
- Wrote technical articles for ACIT and EMPFasis, the U.S. Navy's National Center of Excellence.

Electrical Engineer

Environ Products - Exton, PA - May 1999 to June 2000

- Designed, configured, and tested motor controlled water level sensor circuit used in residential wastewater collection tank.
- Designed, tested, and wrote source codes for embedded software/hardware systems.
- Responsible for schematic capture / printed circuit board layout of various mixed analog/digital boards including through-hole and multilayer surface mount.

Electrical Engineer, Simco

Static Control and Cleanroom Products - Hatfield, PA - May 1997 to May 1999

- Designed high voltage/low current power supplies and test fixtures.
- Tested, troubleshot, and repaired analog/digital circuit boards.
- Troubleshot and modified source codes for embedded microcontroller systems.
- Investigated, analyzed failures, recommended corrective actions, implemented changes on PCBs, built and tested prototype PCBs, and updated documents for the official release.

EDUCATION**BS in Electrical Engineering**

Drexel University - Philadelphia, PA