

COLUM MURPHY

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EDUCATION

SEPTEMBER 2017 - SEPTEMBER 2021

M.S. COMPUTER SCIENCE, BOSTON UNIVERSITY

GPA: 3.9/4.0

Elective Courses: Web Apps, Server-Side Web Apps, Advanced Programming, Artificial Intelligence, Design Patterns.

SEPTEMBER 1996 - JUNE 2001

M.ENG. ELECTRONIC SYSTEMS, UNIVERSITY OF ULSTER, UK

EXPERIENCE

July 2014 – September 2015

INSTRUMENT TEST ENGINEER, MIT KAVLI INSTITUTE

- I worked in a research team which designed and built the instrumentation for the NASA NICER (Neutron star Interior Composition) Space Mission.
- I designed equipment and created procedures for the testing of flight hardware.
- I was in charge of getting the flight PCB boards built at an external lab.
- I tested the instrument in a high vacuum chamber, within a clean room environment.
- I performed EMI testing on the instrument at MIT and at external laboratories.

MAY 2009 – MAY 2013

RESEARCH TECHNICIAN, QUEENS UNIVERSITY, BELFAST, UK

- I worked in a marine renewable energy research team.
- I built the instrumentation for the ETI (Energy Technologies Institute) PERAWAT (Performance Assessment of Wave and Tidal Array Systems) project.
- I programmed LabVIEW and MATLAB systems to acquire and analyse data.
- I built prototype systems for Ph.D. students working on renewable energy projects.
- I trained lab personnel to use data acquisition systems.
- I tested, calibrated and interfaced various types of sensors.

NOV 2001 – MAY 2008

SENIOR ENGINEER, THALES AIR DEFENSE, BELFAST, UK

- I designed electronic systems which are deployed on the UK Stormer HVM (High Velocity Missile) air defense system.
- I developed PCBs incorporating real time embedded microcontrollers, FPGAs, communication and analog circuits.
- I designed digital circuits for Xilinx FPGAs/CPLDs using EDA tools.
- I debugged and integrated microcontroller based designs using logic analysers and oscilloscopes.

SKILLS

- Languages: Java, Javascript, HTML, CSS, SQL
- Software: Eclipse, Visual Studio, Git, MATLAB, LabView

ACTIVITIES

Running 5K/10K's, hiking and mountain climbing.
I have climbed Kilimanjaro, Mont Blanc and the Dolomites.