

Mary Iva (Anna) Knorr

Intelligent Systems Engineering Major – Physics Minor – Cybersecurity Minor
Wilmington, North Carolina e-mail: mak7684@uncw.edu

Skills:

Software/programming

(Python, C, C++)
Fusion 360 CAD
Altium Designer
Visual Studio
MATLAB

Hardware:

Soldering
Arduino
Raspberry pi
3D printing

Soft skills:

Critical thinking
Excellent communication
Time-management
Strong interpersonal skills
Public speaking

Education: Current student at University of North Carolina Wilmington – GPA: 3.67
Cape Fear Academy, Wilmington, NC – Diploma received in Spring 2022

Research Experience:

Automated Foosball Table:

Making a Foosball table with autonomous player 2 using computer vision to track ball and linear actuators/stepper motors for motion of rods. Used Raspberry Pi for the first iteration.

NSA Patent Challenge:

Researching the patent on demodulation of unknown carrier phases for Automatic Identification Systems (AIS), finding improvements, and implementing them. Working with National Security Agency (NSA) mentors to collect resources otherwise unavailable to us.

Professional Experience:

New Potato Technologies, 5508 Business Dr, Wilmington NC

May 2025 - Current

Developed a custom PCB test platform in Altium Designer for Myotone PCBs, enabling automated post-assembly testing and improving manufacturing efficiency and defect detection.
Conducted component lifecycle analysis and sourced suitable replacements for obsolete parts, preserving design integrity and minimizing production delays.

Polar Ice Wilmington, 7201 Ogden Business Ln, Wilmington NC

Oct. 2023 - May 2025

Hosted children's birthday parties, engaged customers, kept skaters safe on ice.

South East Dance Academy, 220 Avondale Ave, Wilmington NC

Aug. 2018 - June 2021

Office assistant and assistant dance teacher for young children (ages 2 to 6) at South East Dance Academy.
Organized office files and found more efficient ways of file organization.

North Carolina Ukulele Academy, 203 Racine Dr, Wilmington NC

June 2016 - Sept 2020

Worked in the North Carolina Ukulele Academy as a store assistant, and as an assistant teacher.

Co-Curricular & Extracurricular Involvement:

Homeschool Assistant: Instruction in middle school computer science, physical sciences and astronomy topics.

Active Clubs: Leader of ACM Robotics sub-group, Member of ACM Computing Club, Member of Cyberdefense Club

Cape Fear Academy Robotics Team: Founding member, captain of the marketing team. Was also team captain.

Volunteering & Interests:

Cape Fear Star Party, Carolina Beach, NC

Taught attendees astronomy equipment usage, star formations, and astronomy history