# Bartosz Stoppel

**Computer Engineer**

📞 +1 (317)989-0849   ✉ bartosz.stoppel@gmail.com   in bstoppel

## OBJECTIVE

Career focusing on experience with a broad range of microcontroller testing and interest in cybersecurity.

## EDUCATION

**Purdue University**                                                                 **08 2019 – 05 2023**
*Bachelors Degree*                                                                              *West Lafayette, IN*

## Experience

**Navy**                                                                              **07 2023 – Current**
*Computer/Electrical Engineer*                                                                         *Crane, IN*
- Classified

**Purdue University**                                                                 **09 2021 – 05 2023**
*Undergraduate Teaching Assistant*                                                         *West Lafayette, IN*
- Assisted in leading labs for Introduction to Digital Systems and Design.
- Taught Verilog, debugged circuits, and hosted office hours in the evening.

**Complete Structural Consulting Inc.**                                                **05 2022 – 08 2022**
*Software Engineer Intern*                                                                            *Fishers, IN*
- Developed a software that would take barndominium parameters (eave height, roof pitch, etc.) and generate steel framing for the building.
- Replaced XCAD and adapted it to the company's project areas with this software.
- Wrote packages using the generated steel framing that included AutoCAD drawings, shop/build lists for market orders, and numerous PDFs that included all the load calculations for each part.

## PROJECTS

**BB8 (Beep Baseball)**                                                                            **09 2021**
- Headed the hardware engineering for a team in charge of making a prototype baseball for visually handicapped individuals.
- Led the magnetic switching team that would enable speakers to indicate ball location for the player.
- Implemented the modern wireless charging method known as "Qi Charging Protocol" to make the ball completely wireless.

**MIDI Polyphonic Synthesizer**                                                                    **11 2021**
- Took input from a MIDI device and was able to effectively synthesize the input MIDI signal with multiple different voices and volumes while adding pitch bending and fading.
- Coded the STM micro-controller so that it would accept and process MIDI input.
- Designed the circuit on EasyEDA and created the printed circuit board through JLC PCB.

**Augmented Reality Table Tennis** (aka R.A.C.H.E.L.)                                               **05 2023**
- Created an interactive way to play table tennis by using a projector to display creative mini-game objectives onto a table while a tracking a ball with a depth sensor.
- Finished the schematic and PCB layout for our MCU, ordered parts, and worked on blob detection using OpenCV.
- Ended up winning Purdue's Spark Challenge and project description is on my teammate's website at www.jacktmyers.com/engineering/rachel/.

## COURSEWORK / SKILLS

- Algorithms
- Data Science
- Microprocessors
- Software Engineering
- Cyber Security
- Compilers
- PCB Design
- Computer Networks

## TECHNICAL SKILLS

**Programming Languages:** C#, Python, C, C++, Verilog, Matlab, Assembly Code, LaTeX, Java
**Developer Tools:** VS Code, PyCharm, Intellij, TeXworks, Eclipse, AutoCAD API, KiCAD, Altium
**Technologies/Frameworks:** Linux, GitHub, Git, WPF
**Spoken Languages:** English, Polish