

TIMOTHY P. HOLMES

2230 N. Bissell St. ◇ Chicago, Illinois 60614
(312) · 841 · 2106 ◇ tpolmes7@gmail.com ◇ timothyholmes.github.io

EDUCATION

DePaul University, Chicago, IL

January 2015 - June 2018

Bachelor of Science Degree in Applied and Computational Mathematics & Standard Physics

Honors: National Honor Society

EXPERIENCE

Assistant Physicist

June 2018 - Present

Enertrex

Chicago, IL

- Built a database that stored element values.
- Created a program that allowed for quick calculations and models for laboratory work.
- Created algorithms to correct for the spectrum analysis when dealing with fluorides.

Teaching Assistant

June 2018 - September 2018

DePaul University

College of Science and Health, Chicago, IL

- Lead a discussion/lecture for laboratory days.
- Assisted students by helping them problem solve.
- Set up laboratories and graded students work.

Research Assistant

May 2017 - July 2018

DePaul University

College of Science and Health, Chicago, IL

- Developed technology to collect data and observe heat transfers.
- Maintained an advanced physics laboratory.
- Data analysis, modeling, assisted at Argonne National Laboratory working in experiments with Ultra-fast optics.
- Built and managed an electronics laboratory.

Research Assistant

May 2017 - June 2018

DePaul University

College of Science and Health, Chicago, IL

- Assisted with transparent conducting oxides (TCOs) and analyzed the short-range ordering of amorphous and semi-crystalline in TCO films.
- Provided research support by analyzing data and modeling.
- Developed research papers for publications based on experimental results with a marketplace in the billions.

SKILLS

Languages

L^AT_EX, Python, C/C++, R, Rust, Bash (Scripting)

Operating Systems

Linux, UNIX, Mac OS, Windows 2000/XP/Vista/7/10

Applications

MySQL, Mathematica, MatLab, Maple, GNU Octave, MS Office, AutoCAD, SOLIDWORKS, RStudio

Miscellaneous

Strong verbal and written communication skills, great troubleshooting and debugging skills, excellent analytical and numerical skills, advanced quantitative background

Tools

Vi/Vim, Emacs, and Nano

CONFERENCES ATTENDED

College of Science and Health (CSH) Research Showcase November 2017

American Physical Society (APS) March meeting - March 2018

Holmes, Timothy, Brett Freese, Miko Stulajter, and Manuel Osorio. "Advancements in Transparent Conducting Oxides: Amorphous IO & ZITO." Poster session presented at: American Physical Society March meeting; 2018 March 5-9; Los Angeles, CA.