

Kenneth DeBacker

kcdebacker@gmail.com | (734) 474-5786 | [LinkedIn](#) | [GitHub](#) | [Website/Portfolio](#)

OBJECTIVE

I'm a chemist turned programmer seeking a goal-oriented workplace to continue learning, growing, and creating.

EDUCATION

The University of Chicago

Graduated June 2018

Bachelor of Science with General Honors, Chemistry

GPA: 3.61

Rice University (Through Coursera)

Completed October 2018

Specializations: "Introduction to Scripting in Python", "Fundamentals of Computing"

Coursework/Independent Learning: Data structures; Algorithms; Object-oriented programming; Excel; Graduate level chemistry studies at The University of Chicago.

TECHNICAL SKILLS

- Fluent: Python, Kivy Language (KV)
- Intermediate: C++, Bash
- Beginner: HTML, CSS, MS Excel, MATLAB

WORK EXPERIENCE

Snyder Lab

Chicago, IL

Undergraduate Researcher

February 2017 – May 2018

- Designed and improved synthetic routes for constructing natural products and testing reaction methodology targeted by the group, supported with funding awarded by Jeff Metcalf Internship.
- Collected and interpreted data from a host of sources/instruments (SciFinder, Reaxys, Mass Spectrometer, Column Chromatography, and NMR Machine).
- Author on published paper, author on another manuscript submitted to Nature for review.

Michigan Technological Research Institute

Ann Arbor, MI

Research Intern

June 2016 – September 2016

- Interpreted relationship between brain EEG data and environmental noise to demonstrate the effect of sample sleeping environments on newborns' brain activity.
- Interpreted sonar data containing environmental and test noise; used machine learning techniques to develop a sensor prototype for detecting environmental anomalies.

Ridenour Landscaping

Ann Arbor/Saline, MI

Employee

June 2014 – September 2015 (Summers)

INDEPENDENT PROJECTS

Chem-Cat

- Python-based Android/iOS application for learning organic chemistry. The app is available on both [Google Play](#) and the [App Store](#).

Additional Projects

- My full portfolio is available on my website (link in the header).

LEADERSHIP EXPERIENCE

University of Chicago Ultimate Frisbee

Chicago, IL

Captain

September 2015 – June 2018 (Captain Junior/Senior Year)

- Helped team to highest finishes at D-I Sectionals (1st) and D-I Regionals (2nd) in program history.
- Organized and led workouts as well as team practice.

Skyline High School Ultimate Frisbee

Ann Arbor, MI

Coach

October 2018 - Present

HONORS AND ACTIVITIES

Honors: Top 3% Project Euler Problems Completed; HackerRank Badges: Problem Solving, Python, C++ (all gold); The University of Chicago Dean's List; Jeff Metcalf Internship Recipient

Activities: Food Gatherers (Volunteer), University of Chicago Undergraduate Chemistry Society "Benzene" (Member), Club Frisbee Teams (Ann Arbor Spoiler, Chicago Beachfront Property, Ann Arbor Four)