

# Personal Statement

Alexander Metzger

I started playing the violin when I was four and a half with the Danish Suzuki Institute. It has been a constant comfort, even as I was uprooted and moved to the US seven years ago, shaping my resilience and initiative. The support I received from teachers and friendships I made with peers, kindled my high school interest in mentoring and motivated me to teach music to elementary schools with Seattle Music Partners (SMP).

When SMP was struck down by COVID, I carried on the torch and founded my own tutoring company (creatively named Seattle Tutoring Partners) to keep teaching music. I also started teaching coding and connecting mentors with students. Going into college, I had created the Tech Leadership position at Cascade Enrichment to write accessible assessment software for students and empower tutors to teach coding remotely through a curated curriculum and remote learning certification program.

Now in college, I continue to mentor students in academic subjects, music, research projects, and science olympiad events. Violin is an active part of my life in the UW Symphony Orchestra and continues to teach me how crucial teamwork and discipline are, both in and out of music. This propensity to discipline and teamwork compliments my drive to pursue opportunities that combine technical growth with leadership.

As Lead Computer Scientist for Design Build Fly, a student organization for RC-plane building enthusiasts, my co-leads and I led our team to secure the annual bronze medal. I'm putting the experience with sensor data and aircraft optimization to direct use in my research with the UbiComp Lab. As a math discord member, I took action on an unsolved genus problem which led to research with Dr. Stefan Steinerberger. Motivated by these positive experiences in my communities, I seek to positively impact marginalized communities through my research.