



Rebecca Costa Bilden  
Rcb95@pitt.edu  
March 5<sup>th</sup>, 2025

Dear Drs. Grogan and Pollack,

I am excited to apply for the University of Chicago Crown Family School of Social Work, Policy, & Practice's postdoctoral position as I am committed to improving access to healthcare and addressing challenges in treatment for opioid use disorder (OUD). The University of Chicago's impactful research in OUD aligns with my research goals, and I am motivated to contribute to the important work being done by the Medicaid Working Group with the Center for Health Administration Studies.

My academic and professional experiences have prepared me well for this position. I hold an undergraduate degree in Pure and Applied Mathematics from Boston University, where I developed strong quantitative skills. Before graduate school, I worked at several healthcare startups as an analyst where I first learned how to apply quantitative methods to answer health services questions, like using compartmental modeling to predict the number of COVID-19 tests needed. I also contributed to research at Beth Israel Deaconess Medical Center's Division of Digital Psychiatry where I led a global team of collaborators, conducted analyses to identify trends in mental health apps, and gained experience writing peer reviewed publications which first sparked my passion to lead my own research projects. I earned a Master's in Applied Data Science and Statistics from the University of Exeter where I further grew my quantitative skills and applied them to a health technology assessment in my master's thesis, *Comparing Biologic Treatment Options for Severe Asthma Using Discrete Event Simulation*.

My time in the Health Services Research and Policy doctoral program at the University of Pittsburgh has given me the skills and training necessary to lead innovative, mixed methods research projects that align with my interest of improving access to treatment for OUD and other substance use disorders. I am a fully funded Graduate Student Researcher under the supervision of Dr. Mark Roberts at the Public Health Dynamics Laboratory (PHDL). My work in the lab included building and calibrating a complex agent-based simulation model to study OUD. I am the first author of the literature review for this model, which is currently in preparation, and I learned about model calibration methods through collaboration with the Department of Industrial Engineering. I have had the opportunity to make novel contributions to Dr. Roberts' work as well, such as investigating the role of a social contagion in the spread of OUD (manuscript under review), and I was selected as a finalist in the Lee Lusted Competition at the Society for Medical Decision Making in 2023 for this work. I am also a co-author on an invited manuscript from *Health Affairs* where my collaborators and I are examining changes in access to medication for OUD after private equity acquisition of opioid treatment programs.

My dissertation work has focused on assessing the potential impact of expanding buprenorphine access on the opioid crisis. My first dissertation paper examines the effect of eliminating the X waiver on buprenorphine prescribing practices in Pennsylvania using a difference-in-differences approach and has been published in *Substance Use and Addiction*. In my second dissertation paper, I conducted a rapid scoping review and subject matter expert interviews to identify factors influencing provider willingness to prescribe buprenorphine. Currently, I am conducting a modified Delphi study to gather expert



consensus on which interventions are most effective. This study will inform my third dissertation paper, where I built and am currently calibrating an agent-based simulation model to compare these interventions in terms of lives saved from opioid overdose. Results from the qualitative work will inform which interventions I include in this model. Together, these projects show my commitment to advancing research in access to treatment for OUD and demonstrate a natural progression toward expanding this work around examining other policy change around access to care for OUD to other substance use disorders. This focus aligns directly with the goals of the postdoctoral program and my broader objective of improving access to healthcare for individuals with OUD.

This postdoctoral position program offers the opportunity for me to expand my work in OUD to examine other policy changes and expand the scope of this work to other substance use disorders. Furthermore, the opportunity to engage in interdisciplinary research aligns with my methodological area of interest, as it will facilitate my collaboration with other mixed method health policy researchers. By continuing to build on my experience with qualitatively informed models and econometric methods, I am committed to informing evidence-based policies that improve access to the treatment for individuals with substance use disorders. I am eager to collaborate with the strong mentorship team of this program, continue growing my grant writing and methodological skills, and contribute to the research being conducted at the University of Chicago.

Thank you for your consideration of my application. I look forward to the opportunity to contribute to and learn as a postdoctoral scholar.

Sincerely,

A handwritten signature in black ink, appearing to read "R. Bilden".

Rebecca Costa Bilden, MSc  
PhD Student  
Department of Health Policy and Management  
University of Pittsburgh School of Public Health