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To Be or Not To Be: A Dialogic Discussion of Two Researchers' Hidden and Transitioning Identities

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Introduction

Simplicities are enormously complex. Consider the sentence "I am".

With this opening adapted from a poem by Richard O. Moore (2010), we emphasize how some of the simplest aspects of the human experience contain vast complexity: identity; belonging; education; justice. The CoNECD community focuses on these aspects and centers the scholarship and practice of equity and inclusion in engineering and computer science, not as a simple topic or afterthought, but as central, pressing, and complex intellectual and political terrain (Secules, Sochacka, & Walther, 2018a; Zoltowski, Buzzanell, Brightman, Torres, & Eddington, 2017). Within our collective work, there are persistent challenges related to race and gender, where visible markers of representation in the disciplines are constant reminders of slow progress and continuing challenges. There are also hidden (i.e., less- or non-apparent) identities that are growing in attention and focus in scholarship and practice communities. New and important conversations that expand our concepts of diversity have emerged surrounding hidden identities such as LGBTQ, language learning, disability status, socioeconomic status, first generation, and other marginalized and minoritized student groups (Cech & Waidzunas, 2011; Groen, Mcnair, Paretti, Simmons, & Shew, 2018a; Martin, Miller, & Simmons, 2014; Smith & Lucena, 2016; Svyantek, 2016; Weatherton, Mayes, & Villanueva-Perez, 2017). Many challenges inherent to these hidden identities also concern transitional aspects; for example, a woman who is romantically interested in other women is not identified as a lesbian until a moment when she has enough relative confidence to "come out" (Butler, 2004; Secules, Sochacka, & Walther, 2018b). This hidden, transitional, and sometimes fluid nature of hidden identities can make research and support for student populations a moving target. In this paper, we examine some *enormously complex* aspects of equity and inclusion work that can often be perceived as *simplicities*, particularly among our collective scholarship and practice communities. Those with normative and privileged identities may in fact not see or understand the range of experiences inside these hidden and transitioning identity categories and the complex challenges associated with investigating, intervening in, and embracing these communities.

There are yet more complexities under that surface. When writing about marginalized student "populations" we tend to see them through a lens that *others* them as research subjects, and in turn, often fail to recognize the researcher and practitioner (i.e., ourselves) as connected by the same or similar identity categories. In many scholarly conversations, researchers are typically treated as "identity-less" pure observers of the world. This approach draws from the positivist scientification of social research, the need for objective epistemology, and the cultivation of a politically neutral academic enterprise. Indeed, statistical social science research aimed at generalizations arose with the influence of capitalism, mass consumerism, and a desire to prescribe normativity and productivity for the human body (Cogdell, 2015). In such social scientific traditions, researchers are implicitly identified with the normative and identity-less mainstream, observing and manipulating othered and minoritized populations. There have been several prominent and parallel scholarly critiques of identity-less science, from feminist

scholarship, disability studies, critical race theory, queer theory, and others (Cogdell, 2015; Haraway, 1988; Pawley, 2017; Zuberi & Bonilla-Silva, 2008). These modern critical traditions emphasize and challenge the normative identity perspectives that inherently underpin "pure science," a perspective that speaks from whiteness, from middle-class-ness, from masculinity, from able-bodiedness, and from heteronormativity as it locates the social other. As such, hidden and transitioning identities can become important complexities to unpack not just for the inclusion and representation of students, but also for researchers and practitioners.

This acknowledgement of researcher identity intersects current conversations in engineering education regarding research quality. Moving beyond simple requests for rigor and rigorous research, several engineering education scholars have called for or supplied guidance on research methodology, including considerations to ensure quality in qualitative research (Kellam & Cirell, 2018; Walther, Sochacka, & Kellam, 2013). Examining the positionality and reflexivity of a researcher have been widely acknowledged as important to enhance quality, but the goals and practices of such reflexivity are often debated. Approaches to reflexivity and positionality range from an internal document meant to help one acknowledge bias (Bryant & Charmaz, 2007; Charmaz, 2014; Tufford & Newman, 2012) to positionality statements included in journal and conference papers where a researcher clarifies their identities and perspective (Groen et al., 2018b), to a list of researcher best practices and rules (Tracy, 2010). Each of these practices may, in effect, be used to inoculate a researcher from internal or external accusations of bias (Pillow, 2003). Problematizing the view that reflexivity practices and positionality statements are simple, complete, and absolving is yet another example of unpacking complexity hidden within apparent simplicity.

We, the co-authors of this paper, have hidden and transitioning identities, conduct qualitative research, and have examined and stated positionality in simple and complex ways in our past research. Through a dialogic exploration of our identities and research experiences, we have found that researcher practices involve enormously complex choices and interactions that can only be simplified by ignoring or being unaware of them. We find that our respective identities often intersect our research questions, methodologies, communication, and associations to and with our participants. We purport that these identities are therefore unavoidable and unsimplifiable and call for all researchers, including those with normative and privileged identities, to examine their identities and positionalities intentionally, thoroughly, and with nuance in research, practice, and scholarly conversations.

Life Story Positionalities

In order to situate our comments on the research process, we first introduce ourselves via an extended positionality statement to provide a level of personal context and history to our approaches to research and the topics discussed in this paper.

Stephen's Story

I am a White cisgender gay/queer man who grew up outside of DC in suburban Maryland, attending majority minority public schools. I was often aware of being an outsider, but in elementary school, you don't have a name for why you're the only boy who sometimes feels more comfortable sitting at the girls' table. I came from a Christian religious upbringing, and the idea of being gay was entirely out of my normal worldview. It wasn't a thing I ever consciously knew about myself, although I might say it was sometimes my worst fear. I

distanced myself from associations with LGBTQ people for a long time, and I would say the internalized homophobia and the social distance further delayed my self-discovery. I would also say I compensated for being uncomfortable by achieving in a few key domains, namely academics (e.g., physics and engineering) and music, majored in engineering in college, and completed a master's degree in acoustics. I moved a lot for school or work, I think both on impulse to find new horizons and to explore the world, as well as feeling like I needed to find where I fit; exploring sexual orientation in the company of strangers felt much less risky than exploring it at home. I lived in London, UK and Silicon Valley, San Francisco, and ended up having my personal eureka moment about sexual orientation while living in Silicon Valley. After taking 26 years to "come out" to myself as gay, the work of telling everyone else in my life was a tumultuous but fairly speedy process after that.

This newly discovered identity disrupted my prior worldview and caused me to deeply question my path in life. I realized I had taken a somewhat conservative path through engineering; I had never been as passionate about my work as perhaps some other social justice topics, but I saw it as stable, practical, and intellectually interesting. In coming out I decided to take more risks, to do what I thought would make me happy, and to try to align my professional life with the change I wanted to see in the world. I also noticed a much wider range of privilege and oppression than I had before. I noticed how the pool of people participating in STEM had shrunk in diversity from my high school to professional life. I realized I had worked hard but had never had to second-guess myself the way many students who are not white men do along the way. On some level, I already knew that this was happening through many of my friends, but I had never quite appreciated how my presence in engineering was tied up in that process. Now as a gay man, I started to see gender normativity everywhere I looked. It hadn't always been a verifiable fact about me that I was sexually and romantically oriented towards men, but it had been true that I was "that boy who eats lunch at the girls' table" throughout my entire life. I realized how interconnected gender normativity was to my life and experience and to the process of culture in engineering. And in that act of revealing this new layer of experience on my life, I thought I might be able to keep trying to reveal layers of experience that I hadn't yet had to question. My interest in engineering education was to leverage that perspective to uncover elements of engineering culture that myself and others coming from relative privilege and dominance were helping to maintain.

I often feel compelled to bring up this life story when asked about my identity and my research because of how complex and intertwined they are. The simple labels of straight, bisexual, gay, queer, closeted, and questioning may have all applied to me in one context or another over my lifetime, yet a longer story helps explain why and how. It feels appropriate to acknowledge a range of meanings, life transitions, processes of coming out, and contextual situations where I perform and am perceived that all make up what can be summarized as a queer identity. It's also hard to explain my commitment to justice-focused education research without explaining this journey-- frankly, people are wary of White people who may have savior complexes for diversity and inclusion work. I have recently spent a lot of time thinking about an identity as a story (Secules, Gupta, Elby, & Tanu, 2018a) and the ways that identity as a label misunderstands and misrepresents people (Secules, Gupta, Elby, & Turpen, 2018b). This paper represents a pushing back on the many systems and actors who have tried to limit or sideline my identity and positionality in my research; I am claiming the territory of the paper to tell a story-as-identity regarding my research and other dimensions of self.

Cassandra's Story

I am a White cisgender woman with a physical disability who grew up in a small, close-knit rural ranching and railroading town in southwestern South Dakota. For most of my life and into early adulthood, my identities remained fairly static and unchanging; however, being disabled – or being a person with a disability – was not an identity I would have claimed a little over five years ago. Technically I was born with my disease, but it was not detected by doctors until my late 20s. On the day of my diagnosis, I had walked into the doctor's office as an average nearsighted person with glasses and left as someone with a significant visual impairment. With this new identity, I knew that my eyesight would degenerate at an unknown and unpredictable rate, making this new identity difficult to embrace or to grasp.

Disability is more fluid than many identity dimensions because it can happen to anyone at any time (Adams, Reiss, & Serlin, 2015), and my suddenly-accumulated identity was nuanced and difficult to decipher. I questioned my position within the disability community and began battling my own conceptions of what it meant to be blind. Growing up, it was my understanding that all blind individuals, or those who were considered to be legally blind, lacked any and all light perception. In other words, I equated blindness with darkness. My blindness was not that. While objects would randomly disappear from view and I needed screen magnification to read, I could generally see for the most part. As I continued to engage in my support community and research my disease, I slowly began to understand that my overarching conception of blindness, while not completely incorrect, was not accurate. Rather than equating blindness with darkness, I realized that blindness is more closely related to perception; that *seeing* was not the same as *perceiving*. My understanding was further underscored in an ASEE Distinguished Lecture session that I organized with Matt King, Facebook's lead accessibility engineer. As he told me about his transition into his blindness, he rhetorically asked me, "What do you do with the sighted blind kid?" His simple question validated my own feelings and experiences of trying to make sense of my new identity.

I often feel compelled to tell my story when asked about my research because of their intertwined and reciprocal nature. As part of a community that is simultaneously sighted and blind (as reflected in the group's emerging use of the hashtag: #itscomplicated), I recognize that the seemingly simple labels of *blind* or *disabled* are highly nuanced and context-dependent, a perspective that I apply to every aspect of my research. Telling my story highlights the complexity of disability while also acknowledging the range of meaning-making and life transitions that individuals face, no matter their social or cultural identification. Disclosing my non-apparent disability also serves an act of self-advocacy within the scholarly community. For me, this paper pushes back on traditional conceptions of a specific, normative type of researcher who is assumed to generate knowledge for "everyone else" and celebrates the diversification of researchers who are contributing to important bodies of work.

Paper Process and Research Approach

The concept of this paper arose out of personal conversations that centered on key research experiences and our roles within them, particularly related to our prior work on the design and implementation of grounded theory (Cassandra) and ethnographic (Stephen) research. Through these conversations, we began to identify ways our observations and frustrations paralleled one another across research contexts and methodologies. One notable area of frustration was navigating conflicts between the *theoretical guidance* for conducting qualitative

research and the *lived reality* of conducting qualitative research. Specifically, our perspectives differed from the standard advice typically communicated in qualitative methods courses, by peer reviewers, and by scholarly collective wisdom. To unpack these experiences, we utilized autoethnography and collaborative inquiry to assemble and make-meaning of ourselves as research participants. In autoethnography, a researcher reflects on their own perspective and experience to find patterns and principles related to the social systems and culture at question (Anderson, 2006; Ellis, Adams, & Bochner, 2011). In collaborative inquiry, researchers reflect together around a specific topic (Walther et al., 2017). In the context of this paper, we collaboratively reflected on our own experiences as grounded theory and ethnographic researchers to question our impacts on our research practices. Aligning with the basic view of "researcher as instrument" in qualitative research (Creswell, 2013), we questioned the influences of our own identities on and positionalities toward our grounded theory and ethnographic methodologies, particularly as the researcher is often integrated as a co-constructor of data and meaning-making within these traditions.

Through regularly-scheduled meetings over Skype, we had conversations that coalesced around themes of conflicting, confusing, frustrating, or insightful experiences that often linked researcher positionality to our apparent and non-apparent identities. From these iterative conversations, we identified six primary research-related themes to further articulate why and how our identities impact our lives as emerging professionals in our research fields. These themes include research questions, epistemology, ontology, methodology, relating to research participants, and communicating to an audience. For this paper, we focus on the themes related to research implementation and dissemination that were deemed most salient to the CoNECD audience. In the following sections, we discuss 1) research questions, 2) relating to participants, and 3) communicating findings. Reflections on epistemology, ontology, and methodology will be presented in subsequent publications.

Collaborative Inquiry Analysis

What questions do we ask and answer?

Stephen's reflection on the questions he asks:

Growing up, I was conscious of a desire to help the world, but I was also intellectually curious, and I didn't like being bored. When identifying my future career options, I often struggled between these career characteristics – at 22, I was choosing between joining the Peace Corps to do work that I imagined would be important but mundane, and going to acoustics graduate school to do work that I imagined would be intellectually stimulating, but might not change the world in positive ways. Although coming out as gay didn't change these dichotomous inclinations, it made it more urgent for me to find a way to combine them both into one career. Life seemed too short not to pursue one's passions, and the world's problems seemed too urgent not to spend a lifetime addressing them. My research career has brought more personal harmony regarding these two sides of me, where I can make my life's work asking questions about how to further social justice causes in education.

It feels obvious but important to state: this orientation towards social justice in education is tied to but not solely because of my queer identity. In coming into greater understanding of my intellectual interests and personal passions, I have increasingly aimed myself towards asking questions that further our understanding of equity and culture in engineering. I have primarily

focused on intersectional race, gender, and other social positioning forms of privilege and inequity such as meritocratic ability hierarchies. As a person who experiences relative gender, racial, and other forms of privilege, but who has been increasingly aware of the function of masculine and heteronormative norms since coming out, I have felt it necessary for personal and professional reasons to begin with unpacking privilege in areas I still experience privilege. It has felt important for me not to center only the problems that I experience, but also to work on uncovering the ways that I have been complicit or not resistant enough to marginalization that does not directly impact me.

At the same time, I feel a sense of solidarity and importance to tackling LGBTQ issues in engineering. I have not yet taken up LGBTQ issues as a centerpiece of my research, and I wonder if this reluctance comes from a few key sources: *Would I be stereotyped as researching LGBTQ issues from a LGBTQ perspective, and would that lead some to discount the work? Do I have a unique insight or experience that others cannot provide?* As someone who left engineering nearly at the same life moment I came out to myself, I could not have experienced any engineering workplace or academic homophobia in reaction to an uncloseted identity. I experienced pain, but I think the original pain was as much related to my own need for personal awareness as to heteronormative/masculine norms in engineering, not understanding why I didn't fit in and keeping myself at a social and mental distance from the eventual realization that I was gay. On the other hand, I wonder: *do I have the appropriate emotional distance from the subject to work on it?* I hear many others speak about work on social justice that centers their own experience, which can be emotionally exhausting and may require a great deal of self-care. When pursuing social justice work on topics I care about but have not as deeply victimized me, I sense that I am not weighed down as deeply. In the times when I have given LGBTQ inclusion workshops, I found I was particularly sensitive and not as easily generous to faculty who discounted the opinions of LGBTQ students or who microaggressed them in dialogue. I imagine my perspective on which research questions to pursue will continue to evolve; currently I work on issues which matter deeply and intellectually to me, they relate to experiences and problems I have had, but they are not so extremely personal that I find myself paralyzed or despondent over the findings.

Cassandra's reflection on the questions she asks:

Throughout my educational career and industry experience in engineering, I always thought that I was different and that I didn't quite fit in academically or socially. Academically, classes didn't come as easily to me as they seemed with my peers. This was a significant struggle for me, particularly as someone who traditionally did well in high school. This newfound academic struggle in my engineering classes was new and isolating. Rather than using my mediocre grades as objective feedback for improvement, I took them very personally and repeatedly questioned my major choice, despite my interest in engineering. Socially, I was always "trying to fit in with the guys". I intentionally minimized my femininity to show that I belonged; I made sure not to wear a lot of makeup or form-fitting clothes to class because I was there to learn, not to find a husband. While I could externally manage these perceptions by how I looked, I could not hide my interests outside of engineering. Unlike many of my peers, I was very interested in the humanities, social sciences, and professional development courses that I took during my undergrad and was often teased for spending too much time on them. These combined academic and social experiences eventually led to lower confidence and a feeling of unpreparedness. This resulted in a hesitancy to get summer internships and go out into the field.

Upon finishing my undergraduate degree, I decided it was necessary to go to graduate school to better prepare myself for industry and the civil engineering profession, overall. My experiences as an undergraduate civil engineering student inform my interests and the areas I explore as an engineering education researcher. As a woman who didn't excel academically in college and struggled to fit in with her mostly male peers, I was unaware that other students were having the same experiences as me. Inspired by other students' stories and the realization that my experiences were not unique, I became interested in exploring engineering identity and the key events, relationships, and identity dimensions that shape it. Because my significant experiences have shaped who I am and how I perceive myself as an engineer, I want to know how other students experience, manage, and navigate this space within their own contexts. Similarly, my experiences with disability as a graduate student in civil engineering and engineering education have further influenced my research interests to explore the identity formation of civil engineering students with disabilities and the perceptions of marginalized identities within engineering culture. In particular, I focus on the ways in which students navigate both the disability and engineering communities, especially at points of conflict across identity dimensions (e.g., disability identity and engineering identity), perceptions of disability (e.g., social expectations and lived experiences of disability), and engineering culture.

As a qualitative engineering education researcher, I often ponder questions related to my disability identity and its influence on my work, particularly due to the intersection between my own life experiences with disability and my current research topic. In other words, I ask *how do my lived experiences with disability influence my own thinking about others' experiences with disability?* Similar to Stephen, I see navigating this intersection as an emotional exercise that requires significant reflection and work, which poses both benefits and challenges to the research process. The disclosure of my disability serves as a form of self-acceptance and justification for my research interests while enacting and embracing the "nothing about us without us" mantra of disability self-advocacy. However, embracing this identity in research can also be daunting: *will this disclosure prompt ill conceptions about my motivations for conducting this work; will I be perceived as self-serving in my research?* Throughout my research experiences, I have realized that, while I will disclose my disability to others if needed, I am much more comfortable advocating for the participants in my study and, in some ways, live vicariously through that work. At this point in my career, I am more comfortable advocating for the rights of students with disabilities rather than for staff and faculty with disabilities –a concept that I attribute to my own transitions in experiencing a disability and becoming a member of faculty and staff communities in higher education.

Discussion on the questions we ask:

We are both conscious of the ways our identities and experiences motivate the research we choose to pursue and the questions we seek to answer. The depths of our researcher positionalities move beyond a simple disclosure in a journal paper or to a research participant; who we are often influences the focus and scope of our studies and motivates us to ask and explore certain questions with our work. While this connection seems logical and straightforward, we both experience some level of tension regarding ways to transparently represent our motivations and where they come from. In traditional conceptions of rigor in scientific research, claiming an identity as motivation for asking particular questions may put our work at risk of bias accusations. In social science research, not disclosing these motivations may elicit accusations of an unacknowledged bias and perspective as a privileged outsider. In either

case, stating identity as motivation may overshadow other influences and suggest a more linear relationship than the complex reality. While our hidden identities contribute important insights into the types of questions we ask and answer, they are not the only features of our lives and research interests.

How do we relate to our participants?

Stephen's reflection on relating to participants:

Like many people, I am always learning more about how I present to others and navigating and adjusting that in subconscious or conscious ways. Like many in the queer community have recognized, the concept of "coming out" applies more to people who are able to "pass" for straight, intentionally or unintentionally. As a person who unintentionally passed for straight, even to himself, for 26 years, I still find coming out is an ongoing, practical necessity. People cannot guess my sexual orientation immediately or with complete accuracy. I think of being out as a proactive daily practice; I add safe space stickers to my laptop and office door, I add more bright colors to my wardrobe, and I am conscious of the way I discuss romantic partners (often with neutral "they" pronouns at first, then transitioning to gendered pronouns – I do not avoid my romantic life or misrepresent my partner's gender). Over time, I've learned when these cues work and when they fail. In my experiences, I have found that many people from religious or cultural backgrounds that situate gay people as an exotic "other" tend not to pick up on these subtle cues; it is as if they expect gay people to be far different from the "normal" person they are already relating to. People who have many LGBTQ friends have typically picked up on these subtle cues by the time I disclose.

Recognizing this range of how I can be read throughout my life has also made me particularly aware of how I am read by my research participants. I spent a lot of time in graduate school interviewing marginalized students in engineering classes, many of whom were specifically women. At various points, this involved inviting women, many of whom were approximately 10 years younger than me, to a private meeting room for an in-depth conversation. It has occurred to me that this could cause concern or questions from participants or others depending on how I was being read by any individual. This reality has become particularly relevant due to the #metoo movement – I wonder if their safety or my intentions were on the minds of any of my participants. In addition to other forms of disclosing intentions and providing safety, I wonder whether my other, more subtle forms of being proactively out (i.e., the sticker, the clothes, the speech practices) produced any additional source of comfort for them. Beyond mitigating any of these immediate concerns, I think about whether and how being proactively out in an interview helps people better understand me in terms of solidarity and motivations with social justice causes. People are perhaps rightly wary of the straight White male cisgender (privileged) savior who may not have an intuition for issues of marginalization or any proverbial skin in the game. In practice, I think disclosing my sexual orientation helps people understand me better, but this is also a strange and concerning dynamic; the need to disclose sexual orientation in order for people to accept that I do care about social justice as a White man. Instead, knowing that I may be read as a straight White man by participants, I usually try to make that solidarity overt by verbalizing agreement and empathy with marginalized student experiences and perspectives. While verbalizing my perspective may sometimes break rules for remaining objective in qualitative research, I think it can be necessary to counteract a way people often read and make assumptions about me.

I have rarely explicitly come out as gay during interviews. Sexual orientation or romantic choices have never been the primary topic of conversation and is often not even a secondary topic. But my own identity still fashions this into a fine line; a question about work-life balance may simply involve making time for a girlfriend for a straight person, but for me, it brings back moments of conscious strategic choices about presentation, similar to the ones I make in everyday life. I had one long term research participant who shared many personal things with me, a devoutly Catholic straight woman who was an undergraduate engineering student at the time. While pursuing our participatory research, I would share more of my own experience in solidarity with her to co-construct a critique of engineering culture. Over time, I was consciously skipping past experiences related to the LGBTQ perspective or coming out; given the Catholic church's official stance on LGBTQ people at the time, I did not want to create an uncomfortable circumstance for the participant. Eventually though, the inertia of the conversation seemed to outweigh the potential for negatively impacting the research relationship, and I did end up coming out to her. Although it seemed to deepen the conversation, I was conscious that, at the time, I was taking a risk with bending our topic of conversation towards my own identity and sexual orientation. This experience has made me think about the ways heteronormativity and other forms of privilege implicitly bend conversations away from queer identity. I am not saying that all participant conversations are or should be about being queer/gay, but I am noticing how hard it is to draw the line and that the hard work of drawing the line is mental/emotional labor on the person with the hidden identity.

Reflecting on this now, I return to the idea of "coming out." Of many facts research participants will read about me and make assumptions about, including skin tone, gender presentation, language/accent, and dress; sexual orientation is one that I know they may or may not assume. Perhaps, the need to "come out" is directly proportional to the amount of normative privilege I have regarding sexual orientation and gender presentation, and I wrestle with how to remain in solidarity with more marginalized communities within and beyond the LGBTQ community. As a hidden identity that impacts how I relate to participants, it creates a range of strategic choices and subconscious subtle cues. I am not satisfied with the clear-cut research advice I have received around when it is appropriate for a researcher to disclose their identity, and I continue to sit in tension with these dilemmas and choices in pursuing justice-oriented qualitative research.

Cassandra's reflection on relating to participants:

When I first started conducting qualitative research, I was very hesitant to let my own identities and ways of being influence the ways in which I conducted participant interviews in fear of guiding the interview. Initially, I took a distanced approach to interviewing participants; I would not share any of my life experiences with them, I would not laugh if they told a joke. I just continued with my questions. However, as I gained experience and grew more skilled in conducting interviews, I realized that I had to do more than sit and ask questions, particularly when discussing a topic as personal as identity. Building the necessary participant rapport to gain deeper insights into participants' lives became more important than researcher objectivity, and I began to structure and position interviews as question-led conversations that included asking a very broad question followed by a conversation tailored to the participant's response that encouraged storytelling. Building rapport with participants to this extent often required me to tell my own stories about my own life experiences and sharing experiences related to our shared

identities, which encompassed race, gender, socioeconomic status, disability status, first generation status, or profession.

I used this approach while recruiting participants for my dissertation research. Recognizing that engineering is often described by students as a "club," I understood the benefits of disclosing my civil engineering identity while conducting research on civil engineering students. However, I also grappled with the potential to create a power dynamic between myself and potential participants. Therefore, I conducted in-class recruitment visits, disclosing my civil engineering identity to some and not to others. In classes where I disclosed my civil engineering identity, I received substantially more volunteers to participate in my study. While this approach bolstered my recruitment, its impacts on interviews varied. Some students had forgotten about my professional identity and would go into grave detail about civil engineering content, not realizing my own knowledge of the topic. On the other hand, some students would explain a particular civil engineering concept and ask me to evaluate their response. In those instances, I reinforced my researcher identity by reminding them that there were no right or wrong answers to the topics being discussed.

In my current work with students with disabilities, I am much more measured in the disclosure of my disability identity to participants. While I want to connect with them and build that rapport with the participant, I must also be strategic about when and how that disclosure occurs so as not to minimize the participant's experience. I became aware of this form of identity dismissal throughout my own life, particularly during instances in which my disability disclosure resulted in a misinterpretation or misrepresentation of its implications on my life. For example, I once disclosed my degenerative eye disease (not correctable with eyeglasses or surgery) to an individual, and they responded by stating they have the same issue and frequently get new glasses to correct it. These types of interactions have been significant for me, particularly due the transitioning and ever-changing nature of my gradually-acquired/acquiring disability identity – a dimension that I still struggle to fully embrace. That moment left me feeling like I had not been heard and my experience minimized. In translating that incident to my research participants, I only disclose my disability if the topic naturally presents itself in conversation and/or if I anticipate that it will benefit the participant, myself, and the research.

While I often disclose my hidden identities to build rapport with participants, not disclosing such identities still has its merits. Regardless of whether I choose to disclose, my experiences living with these identities have influenced the depth at and the nuance by which we discuss related topics. As an individual with a transitioning disability, I am attuned to the variations in which disability occurs or presents itself in different contexts throughout one's life. As a woman who majored in civil engineering, I am aware of microaggressions within and outside the classroom in a traditionally male-dominated profession. As a civil engineer, I recognize the increasing and emergent feeling of responsibility that many of my participants describe. Therefore, as a researcher, the participant and I can co-create meaning from these experiences to enhance engineering education and contribute to ongoing research.

Discussion of relating to participants:

For both of us, the choice to disclose hidden identities to participants or unintentionally pass is a significant and grey area. As a rule, we tend to disclose when an identity is relevant to the research, as consistent with the ethnographic and constructivist grounded theory methodologies in which we work. However, Cassandra experiences tension with fully claiming her disability identity due to the variation in its impacts on her life. Because of this variation, she

is hesitant to claim a category occupied by others with more serious forms of disability, while also recognizing the importance of claiming and belonging to the disability community. However, regardless of this disclosure, she feels that living with this identity has significantly influenced her ability as a researcher to gain rich descriptions of student experience that enable her work to move forward. While Stephen experienced similar tensions related to terminology and claimed community during his initial transition, he experiences less tension with labels (i.e., gay, queer, LGBTQ) at this point in his life. Rather, he experiences more tension around interpretations of the topical focus of his work (i.e., identifying when exactly his work is "about sexual orientation" or not). In his work to date concerning social justice (e.g., on race, gender, meritocracy), sexual orientation is not directly the topic of any interview protocol or research question. However, sexual orientation is a primary way that he, as a researcher, orients towards social justice topics related to gender, intersectionality, and marginality, which are centrally important to his research. The idea of non-normative identities being irrelevant to engineering classrooms and education research, unless the research is explicitly about non-normative student populations, is part of an oppressive, heteronormative, ableist, and problematic view of our academic cultures and practices. In these research experiences, we have identified the need to make exceptions, adjustments, and compromises to traditional researcher rules with regards to relating to participants, particularly in order to pursue our research with a level of transparency, justice, and purpose.

How do we communicate to an audience?

Stephen's reflection on communicating to an audience:

I think research communication is the conventional way researchers think about identity and positionality in research, if at all. I have written positionality statements into my research to help situate the reader to who I am and how I communicate. Similar to the prior section on relating to participants, I am aware that many researchers' identities are masked in print – when reading the name "Stephen" people, in all likelihood, may subconsciously assume that I am a man; the name "Secules," which is an Americanized German name, indicates no strong clues about ethnicity. In in-person presentations at conferences, audience members probably guess that I am White.[1] I have realized I am not always perceived as gay in professional spaces, even by fairly close colleagues. This mix of perceptions produces some dilemmas: I want people to engage with my research without suspicion that I have a "privileged savior complex", but I also do not want to pass racially for an identity group I do not actually hold such as Latino. I could probably allay some suspicions by championing and performing my LGBTQ identity, but I also feel that this should not be a requirement of listening and engaging my work. People from majority and dominant groups can and should be engaged in diversity and inclusion work and should find ways to do so empathetically and humbly without perpetuating a savior complex. I worry that coming out as a way of gaining buy-in for my work is perpetuating ideas that only marginalized groups engage diversity and inclusion, or that because one has a single marginalized identity, one does not need to stay aware of and humble about other intersecting privileged and normative identities.

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[1] Lately I have also been asked if I am Hispanic/Latinx. This has been a new and interesting development in my life and never happened when I was a child in a family known to be White. I have guessed the shift stems perhaps from my investment in diversity and inclusion, my participation and publication in venues like CoNECD, and a few other physical features such as dark hair and facial hair, dark eyes, tan skin.

These dilemmas came to a head in one experience writing a collaborative ethnographic conference paper about a campus program. During the analysis, I raised concerns about LGBTQ and racial intersectionalities in group discussions, which were not the focus of the group but may have created challenges for certain populations and constituencies. Concerned with these emergent findings, some participant administrators wanted more context for them, including personal positionality statements from the co-authors and the influence of positionality on the analysis. I was happy to do it and came out as a White gay man invested in diversity and inclusion in the paper. This felt relevant to me because I believe that, due to my positionality, I often "see" different phenomena in settings that other straight participants may not. While participants appreciated the addition of the positionality statement, another contributor did not and said that coming out in this way could forever mark me as researching from a gay perspective and jeopardize my career. The clashing perspectives on this choice became so significant for those involved that the paper had to be pulled from publication entirely.

This experience was pivotal regarding my own positionality as an out scholar and researcher. It seemed I was perceived by one participant group as a critical and judgmental outsider as opposed to having some valuable insider perspective related to sexual orientation and intersectionality. The positionality statement I added was productive for improving my researcher-participant relations and understandings; yet the same positionality statement was found to be dangerous and inappropriate by another researcher. This situation felt like a deeply unfair double bind. There seemed to be no space between passing as a straight white man with the associated privileges and disclosure as gay and therefore researching from "a gay perspective." When a straight married scholar shares a written anecdote about their spouse and children they are simply sharing their fuller self; when a gay scholar talks about a partner, they are immediately oversharing, biased, or political.

The practice of making statements of positionality requires more solidarity, bravery, and understanding from majority and normative groups. It requires an acknowledgement that for me to say "I identify as White and I identify as a man" requires no risks; however, for me to say "I identify as gay" could risk a range of professional and scholarly consequences that I cannot predict nor control. I may have situations constructed for me where there is no safe space between passing and disclosure. If we are to continue to gain the important perspectives of researchers with marginalized and hidden identities, the research community must help create additional forms of safety for bringing one's whole self to the work.

Cassandra's reflection on communicating to an audience:

Communication is an integration of a researcher's positionality, identity, and meaning-making as they describe and present their work to the world. In the STEM fields, we are generally discouraged from writing first-person research perspectives and are often taught to "remove" ourselves from our work – as if writing in this way will add legitimacy by focusing readers on the work and not the researcher. At the same time, we are trained to write actively and with authority to portray expertise in our chosen fields. But I see these two concepts in conflict with one another; how can you simultaneously be authoritative and take ownership of your work while actively distancing yourself from it? In this attempt to objectify our written work, we inherently continue to privilege individuals with normative identities and make assumptions about their motivations and research decisions.

As a researcher who explores the intimate and social constructs of identity and its formation, distancing myself from my work seems limiting and counter to my overarching

research goals. As an individual with a transitioning disability, disclosing this identity in my work adds to its rigor, rather than taking away from it, by orienting the reader to my perspective and allowing them to follow my logic. For example, in our paper presented at CoNECD last year, Groen et al. (2018b), my colleagues and I disclose our positionality toward participant disclosures of disability. This was particularly important because these disclosures were emergent and occurred in a study that was initially designed to examine identity formation, broadly. This sensitivity led us to rich, unanticipated discussions surrounding students' lived experiences of disability, disclosure, and accommodations in the university setting. Because I was also struggling with my own disability identity, I was attuned to the nuance in students' nuance experiences and identified emergent themes and research findings that I may not have been privy to otherwise. This unexpected intersection between my and the participants' identities led my research into a positive and challenging direction that I had never before considered. However, my decision to disclose my non-apparent identities is also based on its perceived relevance toward my research topic, as previously discussed. If I'm working on non-disability-related projects, I feel it less salient and relevant to my research and will not disclose. However, in my current research area of exploring identity formation in undergraduate civil engineering students who experience disability, I often feel the need to disclose my disability, particularly as a way to justify my interactions with participants and key themes that I pull from my data.

While the decision to disclose may sound straightforward and steadfast, it can be quite complex, confusing, and risky. Not only is positionality a statement to orient the reader toward your research lens, but it also identifies an identity that may not otherwise be assumed. To explicitly identify with non-normative identities typically seen in engineering and engineering education research requires a sense of vulnerability and can be painful to articulate in words. As someone who is still questioning her belonging with the disability community due to a transitioning and intermittent disability, I fear that I may be perceived as an uninformed outsider attempting to conduct research *for* students with disabilities rather than *with* these students. At the same time, will others see disclosure as a self-righteous spotlight that distracts from my work? The uncertainty of not knowing how disclosure will be received and interpreted is intimidating.

Discussion of communicating to an audience:

An overarching theme across our reflections on communicating findings is the inability to control how others will perceive us and our research; we know that some people may see our disclosures as necessary and explanatory while others simultaneously perceive them as self-serving and indicating bias. Not only is there not a safe middle-ground between passing and disclosure, or an easy rule of thumb to choose between the two; there are actually contentious diverging interpretations of the same acts by different parties and audiences. The danger zone is the entire communicative space. With uncomfortable outcomes abundant on all sides of the issue, the conclusion is that more solidarity and understanding is required from the majority and privileged research communities.

Concluding Thoughts and Requests

Writing this paper has been challenging for both of us. We found ourselves surprised by the level of vulnerability it required, at how much it resurfaced prior painful experiences, and how much the future risks weighed on us during the writing process. We want to acknowledge

those tensions we and others will feel, and yet we are making the decision to intentionally engage with the subject matter of our identities. We acknowledge we are breaking some traditional roles of empirical researchers; for as much as we have progressed as a community to think about the researcher perspective, there is still an underlying sense of the researcher as dispassionate, removed, and identity-less. We realize that in writing this paper, we are making public and permanent disclosures and that those disclosures have the risk of being read in many different ways – as self-centered, navel-gazing, inappropriate, admitting bias, or opening ourselves up to future discrimination. This risk is part of the pressure that keeps identity at arm's length on an ordinary day for a researcher.

Nevertheless, we are embracing vulnerability and publishing these disclosure because we think it is important for several reasons. As members of marginalized communities who are sometimes mis-recognized as members of the normative identity group, we recognize that our discomfort around disclosure comes from a place of privilege with respect to axes of social power. We want to be in solidarity with members of our and other marginalized communities for whom non-hidden identities create circumstances for harm on a regular basis. It does not escape us that if our skin color, gender presentation, or features of disability were somewhat different, we might not be given the choice whether to disclose identity or not. In the grand scheme, we see the statement made by this paper as a relatively small act of resistance and solidarity.

We also think people with more privilege around intersections of identity – in which we include ourselves for many categories – do not have a full awareness for how much identity impacts research. Marginalized communities can often see how and the extent to which dominant identity groups wield power. Understanding identity is particularly important when anyone engages in research about and for those marginalized communities and/or when those hidden identities are potentially present in a research population; thus, this is an important conversation to have with the CoNECD community. Hidden identities are difficult and vulnerable for participants to disclose, intersect, and experience in a myriad of complex ways and impact our interactions and interpretations of each other. Researchers should have an appreciation for those sensitivities before and while engaging with human participants. As such, we leave our fellow researchers with the following requests and reflective questions to guide their own thinking about the ways in which their hidden identities – or the awareness of the potential for others' hidden identities – impact the design and implementation of research in our field.

When considering your research questions, integrate reflections on identity and research purpose:

Why do you do the work you do?
How does who you are impact that choice?

When relating to participants, consider the impact of hidden identities and critically examine normative assumptions:

When is a research interview "about disability" or "about sexual orientation"? When is it "about" any given identity category?
When does a participants' lived experience of a hidden identity intersect their other experiences of engineering education?

Regarding communicating to an audience, we can all engage with and make space for revealing non-normative identities that can be dangerous to disclose in academic settings:

How can we represent our fuller selves in written and oral communication?

How can we support others in a fuller representation of self?

We hope to explore these and other questions in an interactive session at CoNECD and the broader scholarly discussion in the engineering education research community.

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