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## Connecting qualitative research on exercise and environment to public health agendas

2	requires an equity lens
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4	Writing in the pages of the critical geography journal Antipode almost thirty years ago, John
5	Mohan (1989) reviewed four medical geography textbooks and arrived at the prognosis that
6	"medical geography requires radical surgery" (p. 176). Although citing critical potential in two
7	of the texts, Mohan concluded that they were substantively lacking in prescriptions for
8	progressive change, constrained in their scope by their empiricist persuasion, privileging of
9	aggregate data and large spatial units, and inattention to difference and first-hand experience.
10	Some of the very limitations raised by Mohan—a dearth of qualitative methods and experiential
11	data, inadequate consideration of gender and other axes of social difference, and narrow focus on
12	conventional Western medicine—were cornerstones of the early medical geography sub-
13	disciplinary identity debates of the 1990s which pushed the field toward a more inclusive
14	medical and health geography (Dorn, Keirns, & Del Casino Jr., 2010; Kearns, 1993; Kearns,
15	1995). Recent critiques have cautioned that geographies of physical activity may be falling into
16	similarly determinist traps that characterized early medical geography (Andrews, Hall, Evans, &
17	Colls, 2012; Blacksher & Lovasi, 2012; Colls & Evans, 2014; Rosenberg, 2016). The recent
18	Health & Place special issue on qualitative research on exercise and environment, edited by
19	Hitchings and Latham, offers a potential antidote to this, but I contend it does not go far enough.
20	Responding to this special issue, in this commentary I illustrate why.
21	In their introduction, Hitchings and Latham (2017a) offer five themes via which
22	qualitative research on exercise and environment can connect with public health agendas: (1)
23	varied nature of environments; (2) differentiation from sport; (3) sociality; (4) pleasure; and (5)

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changing practices; however, they overlook one cross-cutting ingredient to affecting change: equity. I argue that if qualitative research is to effectively inform public health policy and practice it cannot ignore the fact that physical activity participation is inequitable. I do not dispute the value of the areas Hitchings and Latham identify, but rather caution that without building in a critical equity lens, geographers risk perpetuating the "inequality paradox"—that is, the potential for population health interventions to inadvertently exacerbate health inequalities (Frohlich & Potvin, 2008). Related to this, I challenge the authors' assumption that geographers' critiques of public health approaches to physical activity and our applied efforts to foster physical activity participation are mutually exclusive endeavours. Rather, I argue they are mutually necessary within a social justice agenda. Finally, I close this commentary by offering ways forward for qualitative research on exercise and environment to connect with public health agendas and inform interventions.

## Putting an equity lens on exercise and environment

Being against (medicalised and individualised) exercise and appreciating the potential for it to become a poisoned elixir (rather than medicine) shifts priorities and opens up new possibilities. The solution is simple, but not easy: reducing inactivity and inequality. Refusing inequitable intervention enables the promotion of exercise to meaningfully influence the lives and health of marginalised and excluded people and reduce related inequalities. (Williams & Gibson, 2017, p. 13)

Physical activity participation is, quite simply, inequitable. Physical activity is highly gendered, with men more likely than women to meet the minimum levels for health benefits (Azevedo et al., 2007; Colley et al., 2011; Tucker et al., 2011)—and gender intersects with other aspects of

<sup>&</sup>lt;sup>1</sup> I wish to acknowledge Williams and Gibson's (2017) paper for sparking my thinking on this.

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social difference linked to physical activity disparities, including race/ethnicity (Centers for Disease Control and Prevention, 2007), sexuality (Calzo et al., 2014), disability (Caroll et al., 2014), and socioeconomic position (Grzywacz & Marks, 2001). Qualitative research is especially well-placed to illuminate the socio-spatial processes implicated in inequities in physical activity participation (Gill, 2011; Author, forthcoming), yet equity is substantively absent from Hitching and Latham's (2017a) discussion. The authors acknowledge that equity issues are apparent, but situate these as seemingly inconsequential to their goal for "qualitative research to help inform efforts to *increase* activity" (p. 304, emphasis added). This is problematic because, as we know from the inequality paradox, *more* people being active is not necessarily better if inequalities remain the same or worsen at the same time. To avoid perpetuating this paradox, qualitative research on exercise and environment should aim for horizontal (equity) improvements as objects of study and targets of change, as opposed to uncritically favouring vertical increases. Indeed, voices in sports studies and public health have argued that qualitative research on physical activity *must* be part of a social justice agenda in physical activity promotion to meaningfully affect change (Gill, 2011; Williams & Gibson, 2017).

Following through on Hitchings and Latham's proposition that "studies concerned with how particular environments are inhabited by particular groups of exercisers could play a more central part in public health promotion" (p. 300) requires critical qualitative evidence that challenges taken-for-granted categories and reveals processes of inequity to inform interventions for inclusive participation. The special issue, however, does not fully realize this goal. Who these "particular groups" are remains conspicuously blank. Hitchings and Latham (2017a) point to paying attention to "the everyman and everywoman of exercise" (p. 302), but bodies remain decontextualized and disembodied. While most studies describe participants in terms of their

exercise identities, including runners (Hitchings & Latham, 2017b; Little, 2017), walkers and mountain bikers (Brown, 2017), cyclists (Barratt, 2017), swimmers (Ward, 2017), physically inactive students (Olafsdottira, Clokeb, & Vögele, 2017), or mixed-martial arts practitioners (Blue, 2017), only four of the seven papers using human subjects clearly report the gender mix of their samples (Barratt, 2017; Hitchings & Latham, 2017b; Little, 2017; Olafsdottira, Clokeb, & Vögele, 2017). Of these, only Barratt (2017) explicitly considers gender equity, noting evidence for gamified fitness apps to exacerbate existing gendered inequities and the need to ensure "policies and schemes that promote engagement with them are not intrinsically gendered further disadvantaging women's fitness or broader position in the home and society" (p. 334). Little's (2017) study focuses on women's experiences with running and fitness technologies, but it remains unclear how these findings can be directed to intervene in the gendered context of physical activity participation. There is little attention to diversity throughout the issue, with no mention of ethnicity/race, sexuality, or other axes of difference; socioeconomic position was accounted for only by Hitchings and Latham in their sample description of runners (2017b).

We cannot ignore how social identities intersect with and are mutually constitutive of and by place, and what this means for physical activity participation. Exercise is prescribed 'as medicine,' but I suggest it is very the task of qualitative health geographers is to *situate these prescriptions in context*. Take the case of the gym, for instance. A recent systematic review by Morgan et al. (2016) showed that a significant reason for failure of exercise adherence schemes was perceptions of gym environments as uncomfortable or intimidating. Richardson and coauthors' (2017) qualitative study found that disability intersected with gender in ways that could be a barrier to participation for men in the gym; disabled men felt incongruent with dominant gym masculinities. My own research has shown that micro-level socio-spatial processes within

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gyms can contribute to normalizing gender differences in physical activity participation (Author, forthcoming). Research on African-American women's experiences of physical activity in the US is a prime example of the importance of centring participant perspectives and qualitative research in developing physical activity interventions (Versey, 2014). Hall et al. (2013) found that African-American women's concerns about hair resulted in about 29% of women avoiding aerobics and gyms, and that those who avoided exercise for hair-related reasons were less likely to meet physical activity guidelines. By showing the socio-spatial processes of in/exclusion that impede participation in a variety of exercise environments, geographers are particularly well-placed to speak directly to public health agendas.

## Critique versus critical praxis

To excavate these aspects of inequities requires critique; yet, Hitchings and Latham (2017a) claim that "efforts to increase activity" are somehow at odds with how "so much social science activity is taken up in critique" (p. 304). This draws an unhelpful line between the roles of critique and critical praxis, which I argue undercuts the aim of connecting qualitative evidence with public health agendas. Parr (2004) distinguishes between critical thinking, which can *reveal* channels to praxis, and praxis, which comprises direct action. There is certainly an argument to be made that critical thinking does not always translate into change, and it has been noted that there is "an enduring tension between analysis and action" in health geography (Kearns & Moon, 2002, p. 616). Hitchings and Latham's (2017a) call for "further conversation with public health practitioners instead of taking a stance of comparative indifference or skeptical critique" (p. 304) does not break free of this tension. Indifference is certainly counterproductive, but I contend that avoiding a critical stance is misplaced because we need *both* critique and critical praxis to

connect qualitative research on exercise and environment with public health agendas. To illustrate this, I turn to Guthman's (2012) critical political ecology of fat.

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According to Guthman (2012), a critical political ecology "encourages examination beyond common sense" (p. 956) and involves interrogating dominant knowledge—or 'environmental orthodoxies'—to consider how they may 'foreclose' other possible explanations. This approach sees scientific explanations not as neutral, but rather as situated within the social and political contexts in which they are produced and sustained. In particular, critical political ecology provides a framework to address potential 'problem closure;' that is, "when a specific definition of a problem is used to frame subsequent study of the problem's causes and consequences" (Guthman, 2012, p. 954). Critique in this way may yield insights into aspects of exercise experience that can otherwise be overlooked if research questions are based uncritically on particular types of knowledge, particularly biomedical knowledge related to body weight (e.g., Body Mass Index or BMI). Indeed, this is precisely why Williams and Gibson (2017) have argued that "ubiquitous knowledge of [exercise's] elixir-like qualities has not resolved the issue of inactivity" (p. 5). Rather than shying away from critique in qualitative work on exercise and environment, I hold we should do so from an explicitly critical stance that broadens the evidence base upon which new solutions in public health can be derived.

Writing from neighbouring anthropology, Hale (2006) defines critique as "an approach to research and writing in which political alignment is manifested through the content of the knowledge produced," but "neither proposes nor requires substantive transformation in conventional research methods to achieve these goals" (p. 98). Undertaking praxis—or achieving material change—requires different research practices (Hale, 2006). How might we *do* praxisoriented qualitative research on exercise and environment?

**Getting creative for change** 

To be for practice, and to promote physical activity as social justice and public service, we must move beyond typical academic research to other types of scholarship. (Gill, 2011, p. 311)

Qualitative methods in health geography have been conceived as having the potential to bring previously neglected perspectives and everyday life experiences into the policy arena (Dyck, 1999). While Hitchings and Latham advocate for more than cultural critique to connect with public health agendas, they stop short of showing us how to do it. The special issue as a whole does not necessarily move beyond critique. It offers useful qualitative evidence that stakeholders in public health *could* engage, but how this becomes more than words on a page is unclear.

I propose that to connect qualitative research with public health agendas in the way Hitchings and Latham lay out can be supported by engaging with principles of 'knowledge translation' or KT—a concept often engaged by health researchers that refers to the processes and practices of moving evidence into action. KT emphasizes tailoring content in formats for specific audiences in specific contexts, developing actionable messages, and taking a planned approach to identifying the barriers and facilitators of evidence being used (Graham et al., 2006; Grimshaw et al., 2012; Lavis et al., 2003). This involves considering questions such as: (1) Who is the evidence for? (2) What is the best format for that audience? (3) What are the change(s) we want to see? (Lavis et al., 2003). Given the current research climate in many countries that has "encouraged researchers to become more responsible for affecting change" (p. 371), Andrews and colleagues have called for a "practice and evidence-oriented health geography" (Andrews &

Evans, 2008; Andrews, Evans, Dunn, & Masuda, 2012)—a call which can be readily engaged by qualitative researchers on exercise and environment.

Despite cautions in the KT literature about translating findings from single studies (Grimshaw et al., 2012), such efforts may actually be appropriate for some of the highly context-specific work that qualitative geographers do. Moreover, it is possible to synthesize qualitative evidence from different studies in ways fit-for-purpose for a particular program, policy, or practice target. A strong recent example of this is a duoethnography produced by Williams and Gibson (2017), in which they merged qualitative datasets and "developed an analysis through storytelling to *show*, not just tell, our findings and arguments" (p. 7). The result was two relatable vignettes formulated from qualitative evidence that might be deployed to communicate with decision-makers about the equity implications of 'exercise as medicine' approaches to physical activity. Health geographers might consider how to collaboratively link up qualitative evidence, using meta-techniques like duoethnography, about particular places and environments to develop evidence-based tools that can be applied in decision-making and program-planning settings.

Creative approaches to KT may be another potential avenue for qualitative research on exercise and environment to affect change. Arts-based methods can connect with audiences at an emotional level and thus "serve to provoke a call to social action" (Parsons et al., 2013, p. 169; Parsons & Boydell, 2012). For example, Parsons and co-authors (2013) evaluated a multimedia arts exhibit aimed at increasing awareness of health inequities experienced among the homeless population in Toronto, Canada. Through post-visit interviews with a range of stakeholders, including decision-makers, the authors found that participants felt the exhibit made the subject matter relevant to them and helped to subtly shift visitors' perceptions of the homeless community. This form of KT may be an important incremental step to mobilizing action.

190 **Conclusion** 191 There is *potential* to connect qualitative research with public health agendas, as showcased in 192 193 Hitchings and Latham's special issue on exercise and environment. In this commentary, however, I have argued that doing so requires an equity lens—or we risk perpetuating social 194 inequalities in physical activity participation. I demonstrated that rather than dismissing critique 195 in connecting qualitative research with public health, we can benefit from embracing critique and 196 critical praxis as integral and mutually reinforcing components of affecting change. If not, we 197 198 may foreclose potential new evidence for health equity solutions. Principles of knowledge translation and creative methodologies are avenues that geographers can engage further to move 199 qualitative evidence into action. 200 201 References 202 Andrews, G., & Evans, J. (2008). Understanding the reproduction of health care: towards 203 geographies in health care work. *Progress in Human Geography*, 2(6), 759-780. 204 Andrews, G., Evans, J., Dunn, J. R., & Masuda, J. R. (2012). Arguments in health geography: On 205 206 sub-disciplinary progress, observation, translation. Geography Compass, 6, 351-383. Andrews, G., Hall, E., Evans, B., & Colls, R. (2012). Moving beyond walkability: On the 207 potential of health geography. Social Science & Medicine, 75(11), 1925-1932. 208 209 Author, forthcoming. Azevedo, M. R., Pavin Araújo, C. L., Fossati Reichert, F., Vinholes Siqueira, F., Cozzensa da 210 Silva, M., & Curi Hallal, P. (2007). Gender differences in leisure-time physical activity. 211 212 *International Journal of Public Health*, 52, 8-15.

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