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Relational Approaches to Community-Based Health Promotion Across Scales of Practice

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Abstract

In this article, we describe a personalized approach to meeting individual and community health needs that foregrounds relational learning. This article analyzes how relational approaches to learning expand participants' objectives and result in more enduring learning. We report on mixed methods data from interviews, focus groups, surveys, and goal setting and monitoring. Analyses reveal that relationships de confianza served as a central tool in supporting participants' agency to enact change across scales of practice to promote the health of themselves, their families, and their communities.

Keywords

Relational agency; community engaged research; CHAT; obesity; community support; agency; community health; preventative medicine; obesity prevention; community learning; shared problem solving; community health education

Introduction

Inequalities in the economic, environmental, political, institutional and social conditions in which "people are born, live, work and age" are disproportionately linked to the burden of disease experienced by marginalized social groups (Wilkinson & Marmot, 2003). The context of a person's life can determine the risk of exposure, degree of susceptibility, and the outcome of a disease—regardless of whether it is infectious, genetic, metabolic, malignant,

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or degenerative (Cockerham, 2016). Social determinants are associated with an increased risk of chronic diseases, including cardiovascular disease, Type 2 diabetes, stroke, cancers, pulmonary diseases, kidney disease, and many other ailments (Phelan, Link, & Tehranifar, 2010). People born into marginalized social groups with lower socioeconomic resources and opportunities are more likely to be born small and then to experience rapid catch-up growth leading to overweight and obesity (Cho & Suh, 2016).

Investigating obesity with a focus on the social determinants of health draws attention to the complex and pressing issues of equity in public health. Since 1980, the obesity rate has doubled in 73 countries and increased in 113 others. The global medical community cites obesity as a leading cause of global morbidity and mortality (Reilly & Kelly, 2010). The prevalence of childhood obesity has reached historic and sustained elevations: in 2015–2016, the prevalence of obesity in the United States was 18.5% in youth (Hales, Carroll, Fryar, Ogden, 2017). Childhood obesity disproportionately affects children from non-dominant racial groups: in the United States, 25.8 percent of Latino children are obese, 22.0 percent of African American children are obese, and 14.1 percent of White children are obese (Hales, Carroll, Fryar, Ogden, 2017). This points to the complicated relationship between obesity and environmental and social factors. Lack of infrastructure, such as sidewalks, availability of supermarkets selling fresh food, and access to parks, as well as societal factors, such as institutional racism, immigration, historical and contemporary inequities in medical access, and labor conditions (all of which contribute to toxic stress) can adversely affect the health of an individual, a family, and a community. As such, promoting health equity necessarily involves creating structures and opportunities that address access to health related practices across multiple scales (e.g. environmental, social, temporal).

In 2005, the WHO established the Commission on Social Determinants of Health to address the social causes of illness, health inequities, and premature deaths. Since this call, there has been attention given to better understanding the causes of health inequity. However, prevention programs, interventions, and treatments overwhelmingly remain homogenous and overly individualistic, falling short of addressing the context of health disparities across multiple scales of practice. The need for health resources to address the environmental and social context of individuals and their communities has been both highlighted and heightened by the COVID-19 pandemic, which has disproportionately affected Latinx, Black, and indigenous communities (CDC, 2020). The COVID-19 pandemic has underscored the pressing need for personalized and contextualized approaches to health promotion that is coordinated across multiple scales of practice.

In this article, we describe a relational approach to promoting health across scales of practice. In the context of preventing obesity in Latinx communities, we analyze how relational approaches to health promotion acknowledge and address the contextual factors that influence health outcomes. The program described was designed to be culturally relevant and responsive to participants. The structures of delivery included built-in opportunities for participants to decide what content and format best met their needs. This responsive structure gave rise to relationships *de confianza*, characterized by relationships of trust and mutual commitment, and relational agency, characterized by collaborative work towards change. In this article, we look at the ways that relational learning supports

sustainable change across scales of practice, asking the question: How do relationships support participants in achieving desired health outcomes that are sustainable across scales of practice? To answer this question, we report on data from interviews, focus groups, surveys, and goal setting and monitoring. We argue that facilitating relational approaches to learning promotes equity and sustains positive health outcomes.

Medical Interventions to Prevent Obesity

The medical literature delineates the immediate cause of obesity as the energy imbalance between energy intake and energy expenditure. As such, obesity has often been conceptualized as an individual problem due to an inability to regulate this energy balance. Consequently, approaches to addressing weight and weight-related behaviors fail to contextualize the individual within complex social, environmental, and institutional systems. This results in medical approaches that at best, do not sufficiently understand the unique health needs and compositions of individuals and their communities, and at worst, promote deficit ways of relating to people who are classified as obese by medical practitioners.

Many communities do not have consistent access to healthcare, nor to health-related resources (e.g. such as clean drinking water, fresh produce, and safe places to walk, bike, and play) that would most likely be recommended by their doctor. The causes and health impacts of obesity vary from individual to individual and therefore approaches to addressing obesity also need to vary from individual to individual. Clearly, weight-related medical treatments and approaches to promoting health need to be re-imagined so as to address the complexity of health-related practices as well as the social, cultural, and environmental impacts on health.

In the last 20 years there have been over 350 randomized trials conducted with the aim of reducing childhood obesity. Although some have been successful, effect sizes have been modest and results highly varied. A review of this literature raises the possibility that one challenge to implementing behavioral interventions for obesity may be the reliance on methodologies that apply the same intervention content to each participant, regardless of their cultural, historical, and social context.

Although approaches to meeting the concerns of people with obesity need to be personalized, this does not signify that analysis should occur at the individual level. That is, while the health and circumstances vary greatly amongst individuals, understanding individual health requires a contextualized approach that locates the individual within complex ecologies and that can be personalized to the individual desires and circumstances of a person and their family. In this article, we present a culturally relevant approach to addressing public health needs informed by a sociocultural understanding of health-related learning. The program presented in this article effectively supported participants in reducing their body mass index (BMI) (Heerman et al., 2019). While this was an explicit goal of participants, in this article, we analyze the more nuanced ways that participants related to their health-related objectives, drawing attention to the ways that relational learning supports changing practices and the realization of personal and collective objectives. We argue for the

need for approaches that are contextually situated and that foreground relational approaches as a transformative mechanism of learning that is coordinated across scales of practice.

Relational Approaches to Changing Practices

Developing more equitable health interventions, specifically health interventions oriented towards healthy relationships with weight and associated practices, involves focusing on increased agency and personalized objectives. Rather than externally defining participants' objectives, such an approach cultivates an increased capacity to define and achieve individual and collective aims. This focus on agency and personalized goals gives space for cultural differences in relation to health practices and healthcare, individual differences in relation to body type and health ideals, and institutional differences with regards to structural experiences of health inequity. We suggest that personalized learning and new practices are enacted via relational work that strives for collective change. In emphasizing relational learning, we articulate an expanded notion of agency that centers joint problem solving, collaboration, and action. This collaborative notion of agency—relational agency—enhances what any one person could envision or achieve alone. Relational agency has the transformative power to shift individual understanding as well as promote systemic change (Edwards, 2005). From an activity theory perspective, where the collective ecology of activity is considered, the aim of reducing obesity involves shifts in not only individual practices, but also a reorganization of ways of participating across scales of practice. Generating learning that is responsive to challenges across physical, social, and temporal scales requires collaborative work to navigate barriers and leverage strengths. It is thus that relational approaches to learning can result in more meaningful and enduring practices.

The notion of scale-making, conceptualized as ways that learning becomes meaningful over time, and across spatial and social settings, provides an analytic lens by which to consider how learning is made to be consequential, that is how it is meaningful and enduring across scales of practice (Nespor, 2008; Jurow and Shea 2015). Scale-making is an active process through which new social organizations are developed to give rise to new forms of action. In the context of health-related practices, for example, reducing obesity involves not only changing individual eating practices, but also having access to, for example, healthy, fresh food, safe places to walk, and communities of support. Generating enduring learning that can move across scales of practice is not an individual effort (Christens, 2010; Teeters & Jurow, 2018). It involves changing individual practices as well as changing the social and built environment so that there is a place in which new practices can be enacted. That is, the aim of applying learning across scales of practice is not only to support more sustainable practices, but also to 're-mediate' the ecology in which community members live (Cole & Griffin, 1983; Gutiérrez, Morales, & Martinez, 2009).

This systemic change can only happen through collective work. Relational agency focuses on "joint action and the impact on those who engage in it between and across systems" (Edwards, 2005, p. 174). Joint work opens possibilities for expansive learning that could not be imagined at the individual level. Only through collaborative activity are individuals able to resist inequitable configurations and make space for new practices.

Relational agency involves working with others to understand diverse motives, resulting in expanded interpretations of the world and its possibilities and increased capacity for action. Designing for individual and social change within a group context necessitates a design structure that gives space to attending to not only the object of activity, the *how*, but also the object motive, the *why*. Edwards (2005, p. 9) defines relational agency as:

> "a capacity to work with others to expand the object that you are working on by bringing to bear the sense-making of others and to draw on the resources they offer when responding to that sense-making. It involves joint interpretation of the object, including some contestation and aligning one's responses with those of others in responding to that interpretation. It therefore involves both drawing on the resources of others and being a resource for others."

Sharing individual motives within the context of health and obesity is deeply personal work. The work of then drawing on the motives of others to generate collective motives aligning them with activity is deeply relational work. We draw on the notion of relationships de confianza, defined as mutual trust, respect, and commitment, to understand the culturally specific nature of engaging in this vulnerable work (Teeters & Jurow, 2018; Fitts & McClure, 2015). Relationships de confianza involve developing a mutual confidence via engaged listening and shared problem solving. This sense of camaraderie can provide affirmation of perspectives that are not consistently heard in a broader context, which supports an increased sense of agency (Trinidad Galván, 2005). The validation of individual experiences supports a call to action that is grounded in a deep commitment to one another (Fitts & McClure, 2015). In this article, we analyze how relationships de confianza support the rise of relational agency, focusing on the ways in which relational practices support learning across scales of practice.

Methods

Salud con la Familia

The goal of our research and programming was to adapt an existing program to improve agency with the intent of generating more sustainable change in health practices for childhood obesity prevention. We adapted a previously tested and efficacious childhood obesity program called *Salud con la Familia* (Healthier Families). *Salud con la Familia* was a multi-level family-based program implemented in community Parks and Recreation centers in the United States. In a randomized controlled trial of 106 parent–preschool child pairs, *Salud con la Familia* demonstrated reduction in pediatric obesity in a non-dominant and low-income population (Barkin et al, 2012). The program focused on the parent–child pair and consisted of 12 weekly group sessions that taught principles of healthy child development (diet, physical activity, sleep, media use and engaged parenting). The program described in this article, called **Co**mpetency-based **A**pproaches to **C**ommunity **H**ealth (COACH), iterated upon *Salud con la Familia* via a community-based co-design process. The COACH pilot and co-design underwent four cycles of design, where analysis and iteration were embedded and dialogic in each stage: (1) community interviews and conceptualization, (2) pilot testing, (3) co-design, and (4) pilot iteration. This process helped us refine our curricular and

pedagogical approaches that we report on in this paper (Teeters et al., 2018, Heerman et al., 2018).

Participants

Given our goal of mitigating health disparities, our recruitment engaged participants from lower socio-economic communities who identified as Latino/a and who spoke Spanish. Building on the assumption that improving health involves not just individuals and families, but also their support systems, we drew upon existing social networks as a key recruitment strategy. Participants voluntarily joined with the expressed interest of improving the health outcomes of themselves and their families. The members of our research team had diverse cultural and ethnic backgrounds (Puerto Rican, White, Dominican, Mexican), as well as diverse professional expertise (pediatrician, community organizer, learning sciences researcher, educator, pastor). The facilitator was a female, native Spanish speaker from Puerto Rico. Interviews, pilot sessions and focus groups were conducted in Spanish. This study was approved by the Institutional Review Board.

Study Participants—117 parent-child pairs were randomized to either the intervention group or the control group. All participants identified as Latino/a. Average parent age was 32.5 (SD 6.0) years and 95% of parents were mothers. Average child age at baseline was 4.2 (SD 0.8) years and 58% of children were girls. At baseline, 55% of children were normal weight, 25% of children were overweight, and 20% of children were obese. The average household size was 5 (SD 1.3) members. At baseline, 44% of participants were married, 47% were living with their partner, 27% were employed full time, 65% stayed at home full time, 23% had <8th grade education and 25% had some high school. The average acculturation of participants was very low at 4.9 (SD 2.0) based on the Brief Acculturation Scale for Hispanic (BASH) with a scale from 4 to 20, with lower scores indicating lower acculturation (Noris, Ford, & Bova, 1996). This low acculturation scale indicates a need for programming that does not assume the cultural norms of the dominant culture, but rather methods that leverage the cultural assets of this group.

Program Design and Content

The COACH program was designed as a staged-intensity intervention, where parent-child pairs received 15 weeks of an “intensive” weekly group-based program followed by 3 months of a “maintenance” phase consisting of coaching phone calls twice a month.

During the 15-week intensive phase, parent-child pairs attended weekly group sessions focused on skill-building in the areas of 1) healthy fruits/vegetables, 2) healthy snacks, 3) sugary drinks, 4) physical activity, 5) sleep, 6) healthy media use, and 7) engaged parenting. Each module lasted 60-90 minutes and was led by a trained facilitator with experience in community health. The curricular components that we developed during the initial community co-design process facilitated a personalized approach within a group setting included 1) individual assessment of health practices, 2) the development of individualized learning plans with the facilitator, 3) digital reflection and self-monitoring tools, and 4) giving participants choices about which of learning targets to spend extra time during sessions.

Immediately after the intensive phase ended, the maintenance phase ensued, during which participants received twice-monthly support phone calls, for 3 months that reinforced the core messages from the intensive phase. During these calls, the assigned health facilitator engaged in practices such as reflective listening and shared problem solving to provide on-going support and networking. Calls lasted for approximately 20-30 minutes and were conducted in Spanish.

Adaptive Content—A unique feature of the COACH program is the capacity to deliver adaptive content that promotes both collective learning as well as achievement of personalized health goals. The curriculum consisted of two curricular components that facilitated this process: “Zoom-Ins” and “Intercessions.” Each week participants selected learning objectives that they would like to spend more time on. Participants selected learning objectives, and associated activities, after reviewing individual and collective goals. We called these participant driven interactions “zoom-ins.” They were often hands-on practical learning applications coupled with shared problem-solving discussions. In addition, during the intensive phase we facilitated 4 “intercessions.” These intercessions were sessions where health coaches and participants could determine how best to structure the time. They allowed for additional content to be delivered, but they most often took the shape of revisiting motives and engaging in shared problem-solving. These intercessions gave participants an extended opportunity to check-in with each other and the facilitator and to develop specific strategies for achieving their individual and collective health goals.

Data Sources

The primary data sources for our study include: 1) parent self-report of goals met during the program and reasons why they were met or not-met; 2) parent self-report of perceived competency in 7 health practices measured serially throughout the intervention; 3) focus groups conducted after the intervention was complete, 4) interviews conducted after the intervention was complete with the health coaches who delivered the intervention, and 5) written self-reflections of facilitators obtained immediately after each intervention session (for both the adult and child portion of the intervention). Demographic characteristics were also collected at baseline by participant self-report. Surveys, interviews, and focus groups were conducted by guided-administration (due to varying levels of literacy) in Spanish by native Spanish-speaking research assistants. Seven focus groups were conducted at local community centers with 43 total attendees. Responses were audiotaped, transcribed, and translated into English. Two coders independently coded the transcripts using a hierarchical coding scheme that was generated inductively. Both theme saturation and consensus between the coders were achieved.

Analytic Approach

In this article, we present our process of engaging Spanish-speaking mothers in a personalized intervention aimed at supporting families in achieving self-defined goals, resulting in improved health for the parent and child. Our research question asked how do relationships support participants in achieving desired health outcomes that are sustainable across scales of practice? To pursue this question, we examined how relationships support participants in achieving their desired health outcomes. Our analysis focuses on the ways

participants identified motives and activities and how a relational emphasis generated changes across physical, social, and temporal scales of practice.

Our focus on the way that relationships facilitate sustained learning was encouraged via our pilot work, which emphasized the relational component of learning new practices. For example, when testing digital self-monitoring tools, we sent participants a phone based survey asking: 'How do you and your family feel about _____(e.g. preparing healthy meals, developing activity routines, choosing healthy foods)?' The intent of this question was to identify areas where additional tools could serve to catalyze new learning (Vygotsky, 1978). The response options to this question were (1) We are starting to understand; (2) We can do it with help; (3) We can do it without help; and (4) We can do it and we can help other families. We intended this to be a scale. However, when participants responded, over half selected both (2) and (4), indicating that needing more support and supporting others were not mutually exclusive. Rather, they were complementary. This response highlighted that participants perceived the process of health behavior change as collective. Supporting their community was part of their learning process and an integral tool for increasing agency.

This preliminary work informed a focus on a systemic coding process that deductively drew on relational agency and inductively attended to the relational quality of learning. Deductive themes focused on relational agency (e.g. objectives, motives) (Edwards, 2011) and inductive themes that emerged from the data included relational codes such as trust, shared problem solving, and listening as well as codes on facilitators and barriers that specified environmental, social, and temporal contexts. When analyzed together, the data revealed the ways that trusting relationships enhanced relational agency and supported scale-making, resulting in enduring community-based learning.

Organizing for Health Equity via Relationships de Confianza

In analyzing how relationships de confianza advanced health equity, we look at the ways that relationships were cultivated and used as a pedagogical tool. We analyzed how participants shared and made sense of their motives for participation. We found that in the COACH sessions, the facilitator supported participants in cultivating relationships de confianza, which supported a collective sense of agency that allowed for participants learning to move across scales of practice. Relational agency was enacted as participants expanded on narrow goals to articulate a shared motive of generating social supports for enacting healthy practices. Upon defining this shared motive, the activity of learning was then able to be aligned with participants' motives, and relationships de confianza became a central pedagogical tool by which participants generated healthy practices across scales. We argue that the personalized approach to this health promotion program facilitated participants in working together to generate sustainable learning.

Collectively Defining Health and Healthy Supports

Participants enrolled in the COACH sessions with broadly shared goals of improving the health of themselves and their families. Achieving this outcome, however, involved developing a more granular and specific notion of health and understanding participants' motives for wanting to improve their health outcomes. Understanding the motives of

participants is critical in developing appropriate activities that could support the objective. The work of understanding one's own as well as others' motives is deeply personal work. While naming an objective is one activity, unpacking the motives behind it and understanding the ways that objectives and motives are intertwined with cultural messages, familial messages, and which are authentic to one's self is complicated and intimate work.

As participants initially engaged in discussions, the motives that they shared were generally articulated around broad concepts, such as being healthier so as to be a better mother, improving the health of one's family, supporting children to be healthier, reducing children's risk of disease. These motives, while accurate and important, are not specific enough to tailor learning activities. It is thus that the relational work of making space for listening, story-telling, and shared problem solving was critical in the work of refining the individual and collective motives for participants.

In the space of the COACH sessions, the caring and trusting relationships that participants established facilitated deep and vulnerable conversations relating to immigration, family, culture, and resources (Dryness, 2007). As participants discussed immigration, a common thread was woven amongst participants: leaving home with the hope to give their children better opportunities, brighter futures, and '*a better life.'* However, their aim of giving their children a better life had been met with financial, temporal, environmental, and cultural challenges. As participants engaged in vulnerably sharing their stories and challenges, they responded to each other via affirming one another's experiences, offering advice, and engaging in shared problem solving. Participants discussed how many of their health struggles were a result of not having a support network: "*we go through difficult situations and we don't have our family nearby*." Without the support of extended family, parents shared how fast-food, TV, and digital technology became practices to help parents cope with the stressors of work and multiple children to care for. Participants articulated that without a support network, *"you can't make different choices because economically it affects you*." Parents shared that their concept of a healthier family was one that "*spends more time together*." Via the activity of sharing stories and listening to those of others, participants recognized a common theme in the desire to engage in healthier practices: that of social connectivity.

Participating mothers' challenges around healthy practices were often articulated as the result of limited social supports, and they identified a central tool of the COACH sessions as shared problem solving and camaraderie. Participants and the facilitator created an atmosphere where *"we all share our own opinions or we gave each other advice, to one another. And we help each other out with a problem we may be having with one of our children."* This sharing gave context to their individual and collective work. In the focus groups, participants pointed to the importance of working with others in the program to realize change. One participant described the importance of having a group with whom to discuss health challenges and goals, providing an outlet beyond that of her family:

> "This group's offered me support and ways to overcome barriers. It motivates you, to grow as a person and to let you know that it is possible. I was a little sentimental because sometimes, when you face obstacles you need a friend… a

> lot of people have family here to support them and me, well, I have my husband and my children, but we always need someone else to lean on and yes, the group was always an important part of this change, of this process, because this change doesn't come about from one day to the next and I've struggled a lot.

The act of engaged listening and being together in a shared space established a sense of connection and communalism: *"it is nice to come and be able to share and all be together, to be able to tell each other how things are going and how we are doing, what happened to us. You know, the things that we have to improve on*." Sustained and responsive listening provided participants with recognition, validation, and encouragement: *"getting together and learning, sharing, and it's a way of getting encouragement, motivating you and challenging yourself to make those important changes."* This relational work of vulnerably sharing, authentically listening, and collectively problem solving validates individual experiences while situating them within broader systems (Dryness, 2007). The affirmation of experiences that are not always recognized within larger institutional structures can serve as a catalyst for both agency and empowerment (Trinidad Galván). As such, participants recognized the ways that they have experienced social isolation as well as the transformative power of social connection, articulating a shared motive of enhanced social connectivity. It is thus that a main activity of the program became enhancing social connection through engaged listening and shared problem solving. The collective motive of social connection was more specific and actionable than participants' originally expressed motives that were along the lines of 'being healthier' and 'having a healthier family,' allowing for the tailoring of activities. In response, the facilitator foregrounded relational activities of shared problem solving, collective planning, and engaged listening. The ideational tools of the program, such as goal setting and monitoring and healthy strategies for meal preparation, remained the same, however the focus on relational activities supported participants in accessing, implementing and adapting these tools. As such, the adaptive content of the program, the zoom-ins and the intercessions, became oriented around building a community of support. In this way, the relational activities supported the object motive and object of activity, that of enhanced social connectivity, resulting in an outcome of healthier families and communities.

Taking Action Towards Health Equity Across Scales of Practice

The relationships built in the COACH sessions served as the central mediating tool in supporting participants in developing changing practices across physical, social, and temporal scales. The collective work of supporting each other to reconfigure their worlds is an act of resistance and solidarity to inequitable distribution of resources and social attitudes and policies. Our analysis reveals that these relationships de confianza supported relational agency, which generated sustainable learning across scales of practice.

Physical Scales—Some participants lived in food deserts, without close access to fresh, affordable food. At times in the year, cold temperatures and heavy rains promote indoor, sedentary activities and at other times, unbearable heat makes outdoor activities unimaginable. Sidewalks and bike lanes are not available in many of the communities where participants live: "*when I wanted to go out for a walk, there was a lot of traffic. I lived in an area that – I live in an area that has a lot of traffic. So, for me, that is – that is like an*

obstacle to – to do it every day. There are days when the traffic is very heavy and there are days when it is not." This participant continued to share that the city's parks were far from where she lived, requiring multiple buses to access. Another participant echoed the struggles of navigating the barriers imposed by the built infrastructure: *"I think that since I got to this country, it's been like that, because I turned into a sedentary person when I came here. In Mexico I practiced sports, I was always active, walking."*

In response to these challenges, participants generated ideas for *"when it was cold, really cold and we couldn't go to the park"* such as "*singing songs, making dances, cleaning the house."* Together, they generated safe walking routes and identified indoor spaces to engage in physical activity when it becomes too cold to go outside. Participants then collectively made plans to engage in shared physical activities. For example, one participant shared that language was a barrier to enrolling in classes at the local community center, sharing "*I— it's just—I don't speak English. Coming to [the community center to] ask about classes or things like that—that's an obstacle for me.*" Together, participants responded to this challenge. Participants, with the support of the facilitator, went together to the local community center to register for memberships. The community center gave participants a tour of the facilities, familiarizing them with the center and making it clear that they were welcome in this space.

Participating mothers made plans with each other to meet for walks, an activity that then became a family activity and a way to spend time together: "[*my family] comes out with me and – and we all enjoy the evenings together as a family. And we spend more time together as well.*" Not only were immediate family members influenced by this practice, but also members of the local community:

> "I go out for a walk and my neighbor sees me and says, "Are you going for a walk? I'll go with you. And she walks with me. Now there are 5 of us in my neighborhood who go for a walk. My cousin joined us, she's my cousin's wife. We go out as a group in the afternoon when it's not raining and it's not cold. That motivates us, my neighbors who see me going out for a walk they told me, "We want to go walking with you." "Of course, the street is free, let's go." And off we go."

The sense of community supports many of the mothers in feeling safe in walking in their local neighborhoods and the sense of accountability supports the mothers in continuing with this practice of physical activity. Developing networks of social support enabled participants to overcome barriers presented by the physical environment to engage in practices that supported the wellbeing of themselves, their family, and their community.

Social Scales—Challenges regarding navigating a foreign country often invoked a sentiment of despair: "*We came to this country for a better life, a better—I mean, for everything to be different. Everything was worse for me. I mean, it's as if my world was destroyed."* Participants listened to each other, validating each other's experiences. *"Well, often you get frustrated—honestly, you get frustrated—you become demoralized in seeing the situation that you have to face in life. Things that you didn't even anticipate, things that don't come out the way you expect."* Participants shared how "*it's hard to change your bad habits and achieve changes when you are alone."*

In response to the shared struggles, participants made space to care for each other, via engaged listening and validating each other's experiences. This act of engaging in collective care provided a sense of hope and possibility for participants: "*It is nice to come and be able to share and all be together to be able to tell each other how things are going and how we are doing, what happened to us.*"

The COACH sessions were a way of "*getting together and learning, sharing, and getting encouragement, motivating you and challenging yourself to make those important changes*." This support changed participants' relationship to themselves:

> "When I came, I was practically—back then I was a person who—I don't know if I wasn't doing well, I think I was a little depressed. There were days that were nice outside and I would sit on the couch, my daughters would say, "Let's go outside, let's go outside." And I was like, "No, I don't like it. It's boring." When I started coming here, they would talk about exercising, good food and bad food and I was indifferent. But then I started trying it out… and I started feeling better."

The mothers discussed how the collective work within the sessions had a ripple effect across social scales; the support from the session encouraged them to enhance their social support within their family and community, developing networks of shared health and relational practices. Participants talked about how they applied the relational work from the COACH sessions within the context of their families, for example, making an effort to "*eat as a family, to spend more time together.*" To participants, as they made sense of their motives, they realized that health as a family involved social relationships and enhanced connection:

> "*At the mealtime I turn off the television, stop talking on the phone so that we can spend more time together, how was school, how was work. And that is thanks to the program, because before we had the TV on, the tablet on one side, phone talking on the other, eating we did not talk. We did not spend time together as a family. And the thing is that thanks to this we learned this: it is good to share as a family and not have the TV on*."

They also recognized that support for healthier eating practices was not reliant on physical proximity. Participants shared how they started sharing recipes with family in other countries, sending pictures and tips, activating their extended support network.

Temporal Scales—Enacting sustained practices over time is a consistent challenge. It requires not only learning new practices and ways of engaging in the physical and social world, but is also requires changed spaces in which new learning can be applied. Participants in the COACH program talked about how the social supports within the program and in their family and community afforded new ways of engagement. The focus on developing relationships within and outside of the program builds the infrastructure by which to sustain learning. That is, as participating mothers developed new practices, they also built the contexts by which to enact them into the future.

The walking groups are an example of structures that provided mothers with enduring systems of support and accountability. Having others to engage in physical activity required participants to show up. Relationships de confianza are characterized my mutual trust

and support. The accountability that the mothers felt towards others was often stronger than what they felt to themselves. It is thus that the collective activity provided much stronger accountability than any one person could individually cultivate. Similarly, as the mothers shared their learning with their children and families, they developed a sense of responsibility and accountability to sustain behavior changes for the benefit of their family. As one participant described, she realized that the health practices that she cultivated in her family were an "*inheritance to them*," and it was her responsibility that she built an enduring legacy of health.

Discussion

In the program reported on here, we aimed to design a learning experience that was fluid enough to support participants in defining resources to support their agency in accessing and enacting healthy behavior change. The content of the program involved domains such as food preparation, sleep, and physical activity and it was the participants that gave shape to how those were realized. Via relationships de confianza, participants expanded the articulation of their motives to include the generation and fortification of social supports (Edwards, 2005). The personalized approach to this intervention allowed for the relational quality of learning to be foregrounded and enhanced as a key tool that supported scale-making.

The mutual relationships characterized by trust that were cultivated in the COACH sessions provided "individuals with the opportunity to share their experiences and receive validation, which in turn support[ed] people in developing the confidence to act (Dyrness 2007). Action took the form of developing peer walking groups and family practices of walks, sharing of recipes, and limiting digital media to support inter-family connection. Together, participants identified constraints and developed strategies to navigate those barriers. As participants developed meaningful strategies to navigate the built and social environments, they actively participated in the process of scale-making.

Engaging in the process of making new learning meaningful across scales of practice was facilitated by relationships de confianza. Analyzing the ways that relationships de confizana support change across scales of practice helps to expand upon understandings of how relational agency can generate social change. Relational agency (see Edwards 2009; 2011; 2017) provides an analytic lens by which to understand how collective learning generates expanded understandings of the world and its possibilities, creating increased capacity for action. However, the literature on relational agency does not articulate the vulnerable and culturally specific nature of engaging in the intimate work of sharing and negotiating objectives. In this research, we see how relationships de confianza gave rise to relational agency through trust, shared problem solving and engaged listening. These trusting relationships allowed for participants to share the intimate realities of their lives and in turn, generated contextualized structures for learning across environmental and social settings that could endure overtime. As such, we argue that attention to relational agency is insufficient in producing socially and culturally relevant change. There is also a need to attend to the qualitative dimensions of those relationships and the ways that they allow

participants' to engage in the process of re-mediating (Gutiérrez, Morales, & Martinez, 2009) their built environments.

Foregrounding relationships de confianza in the production of enduring learning is critical to promoting equitable social practices, and in this case, health practices. Emphasizing relationships de confianza and allowing them to take shape in culturally and historically relevant ways mitigates the risk that well intended programs reify dominant paradigms of medical and health interventions that have historically served to marginalize non-dominant groups. When participants establish mutual trust, they feel safe sharing the realities of their lives and thus allow for the emerging learning structures to be grounded in the ecology and values of participants. This process promotes health equity by valuing individual and cultural differences, providing valued resources for learning, and revealing and addressing infrastructural inequities.

Conclusion

Relationships de confianza served as a central tool in supporting participants' agency to engage in action across scales of practice to promote the health of themselves, their families, and their communities. Participants collectively expanded the articulation of their motives to include an emphasis on increased social supports. The adaptable nature of the COACH program allowed for the activities of learning to align with the objective of increased social supports, and thus more time was dedicated to shared problem solving and social connectivity. This relational work provided the foundation for the learning in the sessions to then transcend scales of practice, resulting in meaningful, ecologically situated, and sustainable changes.

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