

**FOOD SOVEREIGNTY AND THE CITY: URBAN AGRARIANISM AND
AGROECOLOGY IN CANADA AND BRAZIL**

by

Evan Bowness

B.A., University of Manitoba, 2010

M.A., University of Manitoba, 2013

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The following individuals certify that they have read, and recommend to the Faculty of Graduate and Postdoctoral Studies for acceptance, the dissertation entitled:

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in Resource Management and Environmental Studies

Examining Committee:

Dr. Hannah Wittman, Institute for Resources, Environment and Sustainability & Faculty of
Land and Food Systems,
The University of British Columbia
Supervisor

Dr. Rob VanWynsberghe, Department of Educational Studies, Faculty of Education,
The University of British Columbia
Supervisory Committee Member

Dr. Will Valley, Faculty of Land and Food Systems,
The University of British Columbia
Supervisory Committee Member

Dr. Emily Huddart Kennedy, Department of Sociology, Faculty of Arts,
The University of British Columbia
University Examiner

Dr. Charles Menzies, Department of Anthropology, Faculty of Arts,
The University of British Columbia
University Examiner

Dr. Alastair Iles, Department of Environmental Science, Policy & Management,
University of California, Berkeley
External Examiner

Abstract

Given the confluence of accelerating urbanization and social and ecological crises that pose profound global sustainability challenges, the “urban” has attracted attention from food systems scholars and social movement actors, including those engaged with the global food sovereignty movement. This dissertation examines the role of urban agriculture and urban agroecology in the food sovereignty movement through fieldwork in Canada and Brazil. Drawing on interdisciplinary literature on food systems sustainability, relational sociology, and urban political ecology, and using community-based and visual ethnography methodologies, the dissertation contributes three substantive chapters to food sovereignty studies.

First, I develop a “sites, stakes, and scales” framework for analyzing urban food sovereignty social movement politics. Using a radical relational approach, this framing moves beyond locating the urban as a geographic “site” where food sovereignty struggles happen by also asking: What is “at stake” for both urban and rural people? And, how does connecting stakes and sites expand or constrain the possibilities for rescaling social mobilization, networks and collective action frames to pursue change at other socio-spatial “scales”? Next, I introduce the concept of urban agrarianism, defined as an urban ethic of care for foodlands and, by extension, a relational responsibility to exercise solidarity with those who cultivate and harvest food. Urban agrarians in Metro Vancouver mobilize at different scales: Within the city, on the periphery of the city, beyond the city, and against the very concept of property upon which the city is founded. Finally, through a community-based visual ethnography in southern Brazil, I explore how mobilization

strategies and collective action frames in the urban agroecology movement span the urban/rural divide.

The overall dissertation findings suggest that urban people involved in urban agriculture and urban agroecology can contribute to realizing goals advanced by the food sovereignty movement, such as defending food lands and provider livelihoods through social movement relations across different scales. The findings challenge common understandings of urban people as passive food consumers, depicting them instead as potential agrarian citizens, and present a path forward for research that situates urban agriculture and urban agroecology in the context of wider social and political relations.

Lay Summary

In the mid-1990s, an international social movement brought concerns of rural, small-scale food producers of the Global South to the world stage. This “food sovereignty” movement aims to build democratically controlled, sustainable, and just food systems, free from constraints imposed through the profit motivations of transnational agri-foods and resource development corporations. While campaigns for food sovereignty have primarily highlighted the voices of rural producers, they have more recently started to take on an urban character. Questions have emerged about the role that urban agriculture—growing food in cities—might play in transitions towards more sustainable and just food systems. This dissertation examines this question through research in Canada and Brazil and finds that people and organizations involved in urban agriculture play important roles in the food sovereignty movement through building relations and networks of activism and change both within the city and through linkages that connect the city and the country.

Preface

This dissertation is my original scholarly work. I designed the research approach, collected and analyzed the data (for the Brazilian fieldwork, with support from field and research assistants) and wrote the text of each chapter. I received critical feedback from my committee, collaborators, and mentors, some of whom are credited as co-authors in the resulting manuscripts prepared for publication in peer-reviewed journals.

I carried out the conceptual development of Chapter 2 and wrote the chapter in its entirety, with Hannah Wittman participating as a co-author through critical constructive feedback and ongoing dialogue during the writing process. The theoretical foundations of Chapter 2 were initially developed in a conference presentation I co-authored with Dr. Annette Desmarais in 2016 as part of the International Rural Sociological Association's Congress in Toronto at a session entitled "Can food sovereignty be institutionalized? Negotiating the intersection of grassroots struggles and public policies for food system Transformation."

Chapter 3 has been published in the *Journal of Peasant Studies*. I led the conceptual development, collected and analyzed the data, and wrote the article, which was revised through extensive critical and constructive feedback from Hannah Wittman. The reference details are: Bowness, E., & Wittman, H. (2020). Bringing the City to the Country? Responsibility, Privilege and Urban Agrarianism in Metro Vancouver. *The Journal of Peasant Studies*. <https://doi.org/https://doi.org/10.1080/03066150.2020.1803842>. This work was presented as the keynote address during the 2020 Vancouver Urban Farming Forum and was featured in the Association of American Geographer's "Geographies of Food and Agriculture Specialty Group" spring 2021 newsletter, which included a series of photos (Bowness, 2021).

I led the conceptual development of Chapter 4, and I led the data collection and analysis, with support from field assistants Carlos Pontalti and Fernando do Espírito Santo. The chapter has been revised through engagement with an authorship team which I led. The resulting manuscript will incorporate contributions from co-authors Fernando do Espírito Santo, Erika Sagae, Ademir Cazella and Hannah Wittman. Dr. Cazella, Professor of Rural Development at the Federal University of Santa Catarina, Brazil was my academic host during my fieldwork in Brazil. Erika Sagae is a representative of the community partner organization the Centre for the Study and Promotion of Group Agriculture (CEPAGRO). This chapter also resulted in a multimedia website, www.VisualAgroecology.com (see Appendix 1), which was co-authored by Fernando do Espírito Santo.

A portion of the empirical data analyzed in Chapter 4 also appears in a peer-reviewed book manuscript: James, D. & Bowness, E. (forthcoming). *Growing and Eating Sustainably: Agroecology in Practice*, Fernwood Publishing. This work is based on fieldwork conducted for this dissertation as well as other related projects in partnership with CEPAGRO. Authors contributed equally.

Ethics approval was provided for this project by UBC's Behavioural Research Ethics Board (BREB Number H16-02726).

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Dedication

To agrarians, agroecologists, and their allies.

Chapter 1: Introduction

This dissertation research was conducted amidst a global backdrop of rising public concern over ecological sustainability and social equity problems in the food system. These problems are some of the most pressing of our time, and include soil and resource depletion, pollution from agrochemical inputs, pest resistance to controls, increasing severity of adverse climate events, dwindling smallholder rights and livelihoods, and persistent threats to public health and social justice in both cities and the countryside. The global food sovereignty movement is among the collective and grassroots responses to these challenges, which since the mid 1990s has brought together diverse voices and organizations from across the world in issuing public declarations calling for change (Windfuhr & Jonsén, 2005; Wittman et al., 2010). The resulting policy and social movement initiatives have inspired new discourses and frameworks for upholding rights of nature and food providers¹ and shared responsibilities among the movement's participants to protect the long-term health of the land in building regenerative food systems (Wittman, 2009a).

1.1 Food Sovereignty in the Urban Century?

The world's human population is more than half urban, with UN estimating 55% of the world lives in cities and projecting that by 2050 that proportion will increase to 68% (UN, 2018). Cities also harbour disproportionate political, cultural, and economic power and are major drivers of environmental problems globally, generating 80% of global GDP and releasing 70% of energy-related greenhouse gas emissions (Seto et al., 2017). Given the projections for urban population growth and the fact that very few people are resource providers, with only 608

¹ I opt for the language of 'food providers' rather than 'food producers,' in line with critique of the latter term's association with industrial productivism.

million farms feeding a global population of 8 billion (Lowder et al., 2021), and given the “urban bias” of cities holding a disproportionate concentration of capital and locus of power in shaping the direction of environmental change and human history, it is urgent to assess *the urban* as part of the transition to food system sustainability. This being the case, much is still unknown about the role that cities and urban actors could play for the prospects of sustainability transitions in food systems. As such, this dissertation examines the place of the urban within the broader context of agricultural transitions and the food sovereignty movement in particular, an emerging and critical area of research (García-Sempere et al., 2018).

1.2 Research Question

While the original focus of the global food sovereignty movement was oriented around the recognition of the rights and responsibilities of small-scale and primarily rural farmers, Indigenous peoples, and fishing communities in the Global South, as it extended its reach, new questions have emerged about how these rights and responsibilities apply in urban contexts (Alkon & Mares, 2012; Alonso-Fradejas et al., 2015, p. 436; Block et al., 2012; Edelman et al., 2014, p. 919). As part of this emerging conversation, my dissertation addresses the following central research question: *What is the role of urban actors in the global food sovereignty movement? And more specifically, how do actors involved with urban agriculture and urban agroecology construct “agrarian citizenship,” a concept representing a collective identity of the food sovereignty movement formed through shared rights and responsibilities?* In addressing these questions, throughout the dissertation, the following research gaps are identified and filled with new conceptual and methodological tools: How to conceptualize urban relations as part of a growing focus for food sovereignty scholarship; how to theorize key food sovereignty concepts

as applied to the urban scale; and, how to ensure that food sovereignty scholarship situates the urban within a wider social context.

1.3 Theoretical Framework: Rights, Responsibilities and Food Sovereignty

The main proposition advanced in this dissertation is this: Urban agriculture and agroecology, as a source and outcome of *urban agrarianism*, a new concept developed in this dissertation (see Chapter 3), supports urban mobilization in the food sovereignty movement through the construction of agrarian citizenship in urban contexts. As structures of social relations, urban agriculture and urban agroecology can provide an enabling context for urban actors to scale their mobilization strategies to repair ruptures in urban-rural socio-ecological metabolism (“metabolic rifts”). Therefore, the conceptual landscape of this dissertation includes the food sovereignty movement, metabolic rifts, and agrarian citizenship.

1.3.1 The Food Sovereignty Movement

In the 1990s, a global social movement condemning industrial agriculture emerged in reaction to some of the more devastating livelihood impacts unfolding on smallholders in the Global South. Defending the rights of peoples to define their own food systems, the *food sovereignty social movement* started with mobilizations by, alongside, and for the world’s peasant farmers (Edelman, 2014; Windfuhr & Jonsén, 2005; Wittman et al., 2010). In 1993, *La Vía Campesina* (LVC), a transnational social movement organization representing farmers, fisherfolk and Indigenous peoples was founded in part as a reaction to food and agriculture policies brought on by the Uruguay round of GATT negotiations (Desmarais, 2007, p. 7). LVC amplified the concept of food sovereignty at the World Food Summit in November of 1996 when global leaders met in

Rome to discuss ways of reducing undernourishment and to increase global food supply. Food sovereignty has evolved significantly since it first appeared on the world stage. Through several global meetings, events, colloquia and forums, a strong social movement contingent, including LVC, has adapted the concept to make it more flexible, to be more inclusive of different voices and a diversity of perspectives. The 2007 Forum for Food Sovereignty resulted in the Nyéléni Declaration (Nyéléni, 2007a) and a synthesis report (Nyéléni, 2007b) which defined the six pillars of food sovereignty: Focuses on food for people; values food providers; localizes food systems; puts control locally; builds knowledge and skills; and works with nature. These pillars support a vision of a sustainable and just food system, which Roman-Alcala calls “aspirational food sovereignty” (2016). This vision and set of goals for the food sovereignty movement, the source for its emergence, efforts to enact it, and the outcome of those efforts, represent four interrelated phenomena that have attracted academic interest, especially over the past ten years. For the purposes of this dissertation, the food sovereignty movement’s goals that appear discursively in urban contexts—such as advocating for farmer autonomy, local food systems, the valorization of local cultures and knowledges, a transition to food systems based on agroecology and decolonization—form the basis for mobilization strategies for urban participation in the food sovereignty movement.

1.3.2 Metabolic Rifts

This dissertation draws on the concept of the *metabolic rift*. A cornerstone in environmental sociology (Foster, 1999; see also Moore, 2000), the metabolic rift framing was first advanced in Karl Marx’s third volume of *Kapital* (1894/1967) to refer to a gap between resource production and consumption, widened by urbanization and intensified by industrialization, that drives

worsening environmental and social problems. Marx used the concept to call attention to an essentially unsustainable agricultural relationship between the city and the country under industrial capitalism. Marx noted that cities are in constant energy exchange with their surroundings, drawing nutrients, calories, minerals, fiber, and other materials from the earth. Industrialization and the growth of cities intensified a disconnection between urban consumption of resources for reproducing human activity and the harm caused beyond city limits.

The metabolic rift expresses itself in different ways, but the most common use of the term, the ecological rift, captures the open-loop nutrient transfer from rural soil into food commodities, eventually ending not by replenishing the soil but in the urban bio-waste system. A second, social rift,² represented by dispossession, has been driven between the majority of the world's people and the land, which started with land enclosures and dispossession and progressed through the commodification of labour. Third, an individual rift is now faced by urban folks who no longer contribute directly to their own social metabolism and are alienated from the food production process. Schneider and McMichael (2010) argue that urbanization and industrialization have also driven a knowledge rift in that urban consumers no longer possess the practical skills or literacy (Cullen et al., 2015) required to feed themselves or care for the land that sustains them, and further an epistemic rift has evolved overtime as a result of the separation between urban consumption and rural production that has eroded the capacity for people, especially those in urban spaces, to imagine or envision an alternative food system working in balance with nature.

² The concepts of social, individual, knowledge and epistemic rifts draw from McClintock (2010) and Schneider & McMichael (2010).

The metabolic rift has been used to theorize the emergence of the food sovereignty movement as a collective effort to close the ontological and material distance created by the contemporary industrial food system (Schneider & McMichael, 2010; Wittman, 2009b). For the purposes of this dissertation, urban actors are both contributors to, and are subject to, the problems associated with metabolic rifts, through a loss of skills, knowledge, relations, and capacity for new epistemological imaginaries that separate the city from the country, but also are potential agents to close these rifts.

1.3.3 Agrarian Citizenship

The vision of a transformed food system held by the food sovereignty movement, and placement of social movement mobilization as a key pathway towards it, is based on a shared notion of *agrarian citizenship* (Wittman, 2009a), the collective identity of the food sovereignty movement. Citizenship, a set of rights and responsibilities most often associated with the state, is closely related to sovereignty; however, in this case the state is not the sovereign actor conferring rights and responsibilities upon a national citizenry. Instead, it is a social movement that confers rights, and with them a collective moral responsibility to democracy, equality and ecological justice and stewardship over the land (Wittman, 2009a). Agrarian citizenship thus is “a concept that links agricultural practice to environmental and social sustainability” and “key component of the theoretical framework of food sovereignty” in that it “encompasses the *rights* of nature and humans to collectively produce food for community sustenance, alongside a mutual *responsibility* to uphold the future productivity of the land” (Wittman et al., 2010, p. 102), as well as the well-being of the land and the people who steward it. As a global political subject, the food sovereignty movement has responded to growing metabolic rifts to advance protection for

food producing lands and the farmers and fisherfolk who steward them. This has taken the form of demonstrations at global summits and land occupations that take movement participants beyond their immediate scale of experience to participate in activism and new market relations. Through the construction of a compelling collective action frame, epitomized in historic documents such as the declaration of Nyélénié (2007a), people and institutions on either (and both) sides of the rural/urban divide have been mobilized to act on a collective responsibility to protect the rights of nature and food providers.

1.4 Urban Agriculture and Agroecology

While most of the world's food providers are rural, recently the academic study of food sovereignty turned to the urban context where the majority of the world lives. In a thematic issue of *Third World Quarterly*, Alonso-Fradejas and others wrote:

Food sovereignty's original social base is located in the peasantry of the global South [sic] and the small-scale, family farm sector of the global North.

Because it is one of the few broad political platforms today globally contesting neoliberal capitalism, food sovereignty has spread across food system struggles to urban and peri-urban areas of the global North, where students, socially conscious consumers, farm and food workers and food justice advocates have embraced it as a banner for social justice and food system transformation (Alonso-Fradejas et al., 2015, p. 436).

Similarly, Phil McMichael (2014) suggests that the current phase of the food sovereignty movement “operates on both rural and urban fronts, separately and together, connecting food providers, workers, eaters and various activist organizations” (194-5). And in a special issue on

food sovereignty in the *Journal of Peasant Studies*, Edelman and colleagues pose the following question:

What do[es] the growing material and strategic importance of urban agriculture mean for the construction of food sovereignty? (Edelman et al., 2014, p. 919).

These quotes signal an *urban question turn* for food sovereignty scholarship. In particular, the emerging literature engaging with urban food sovereignty in urban places emphasis *urban agriculture* (Alkon & Mares, 2012; Block et al., 2012; Davila & Dyball, 2015; Laidlaw & Magee, 2015). This body of interdisciplinary research documents how urban farmers and organizers of urban agricultural programs and projects are often driven by a market orientation – to produce food for sale and support farmer livelihoods – but many also embrace “social missions” that extend beyond the market, such as a commitment to supporting food justice and food security (Dimitri et al., 2016). On this last point, while urban agriculture is often touted as holding potential to address food security challenges, constraints, especially around available land and suitability for the range of diverse foods needed by the human diet (i.e., grains and proteins), pose a limitation to increasing food security (Badami & Ramankutty, 2015; Martellozzo et al., 2014). As such, this dissertation research does not address questions around the economic viability of urban agriculture or whether it can help “feed the planet;” instead, my focus is on its potential to interact with agrarian citizenship, the collective political identity behind the food sovereignty movement and its associated ethos of commitment to the land and food providers, and the rights and responsibilities that go along with it.

Urban agriculture and urban agroecology is the focus for this dissertation primarily because of their position in relation to the metabolic rift (McClintock, 2010). As the metabolic rift has been useful in accounting for the food sovereignty movement as a reaction or

countermovement spurred by negative effects of modern industrial capitalism (Schneider & McMichael, 2010; Wittman, 2009b), McClintock (2010) argues that urban food cultivation can close the ecological rift through *recycling* nutrients consumed in urban environments for reuse in food production, the social rift through the decommodification of land and labour, and the individual rift by de-alienating people from the food production process. Further, urban agriculture may factor in bridging the knowledge and epistemic rifts as well by fostering critical food/food system literacy (Widener & Karides, 2014; Yamashita & Robinson, 2016). As such, the metabolic rift, along with agrarian citizenship, are theoretical concepts that can help fill the urban gap in the academic theorizing of food sovereignty. Specifically, this dissertation explores how agrarian citizenship, as a discourse politicizing land stewardship and defense of farmer livelihoods, mediates the relationship between urban agriculture and the food sovereignty movement. This gives rise to a number of questions, such as: What is the nature of connections that tie urban actors to food sovereignty mobilization? This will be a focus in Chapter 2 of the dissertation. How do urban agriculture participants claim responsibility as part of agrarian citizenship in urban places? This question is addressed in Chapter 3. And, how does social movement mobilization connect urban agroecology to wider food sovereignty goals? This is the question addressed in Chapter 4.

1.5 Methodological Approach

This dissertation project consists of two separate case studies (Chapters 3 and 4), constructed through original qualitative empirical fieldwork in two research sites that draw, in each case, on community-engaged research and visual ethnographic methods. These case studies are conducted to examine how an analytical framework (developed in Chapter 2) might be used for food

sovereignty research that focus on urban contexts. Vancouver and its neighbouring city were chosen as the region's rich agricultural soil, relatively strong urban agriculture community, colonial history, municipal food policy and land politics make for an ideal location to study the dynamics of agrarian citizenship and the metabolic rift (McClintock et al., 2021; Mendes et al., 2008; Newman et al., 2015; Valley & Wittman, 2019; Walker, 2016). This is complementary to Florianópolis, in the South of Brazil, where urban agriculture takes place in the context of broader agroecology movements and networks (Costa et al., 2017; Lerrer & Medeiros, 2014; Rover, 2011; Wittman & Blesh, 2015). Southern Brazil is an especially important place to study emerging issues in agroecology and food sovereignty given its history of agrarian movements such as the MST and significant agroecological networks such as Rede Ecovida (see Chapter 4 for more details on the specific context of the research site). Both regions are highly urbanized.

This dissertation is based on fieldwork that took place between 2017 and 2019 in Metro Vancouver and Santa Catarina, Brazil, described in greater detail in Chapters 3 and 4 respectively. Fieldwork in both sites depended on community relationships formed by as part of long-term engagement among members of the research team. The BC field sites were selected through connections of the supervisory team and through my extended network in BC, through the Vancouver Food Policy Council (on which I serve as a member) and through connections to the Vancouver Urban Farming Society. The fieldwork in BC included interviews conducted with 34 people who had a connection to urban food cultivation. The analysis was not an example of community-based research as it was not a research project collectively designed with a community partner. It did, however, develop into a collaboration with a community partner, the Vancouver Urban Farming Society, who was a joint applicant on a successful funding proposal supporting the Vancouver Urban Farming Forum in January 2020, where the results of the

research were shared during the keynote. As a key finding of Chapter 3 focused on the theme of privilege, we also hosted a workshop on privilege in the urban agriculture community during the event. While this chapter did not involve an explicit visual component (which was much more central to the empirical work as part of Chapter 4, see the following section), the research was featured in the Association of American Geographer's "Geographies of Food and Agriculture Specialty Group" spring 2021 newsletter, which included a series of photos (Bowness, 2021).

The analysis in both chapters relies on interpretation of ethnographic data obtained through participant observation and interviews. This allowed for identification of areas in which the analysis and fieldwork could contribute to both advancing the scholarship of food sovereignty and the mandates of community partners (for instance, sharing photographs taken during participant observation for use on social media by the community organizers I was working with). I drew upon interviews, fieldnotes during visits to urban farms and events, dialogue with community partners, and reflection and engagement with an interdisciplinary literature on food sovereignty and food systems.

The Brazilian fieldwork for this dissertation was conducted as part of a community-based research collaboration involving fieldwork primarily located with a non-profit organization and research partner, the Centre for the Promotion and Study of Group Agriculture (CEPAGRO) in Florianópolis, Brazil. The dissertation research was only a small component of a co-designed community engagement program, which also included several related projects and joint funding proposals that resulted in video outputs and conference presentations. This included successful submissions to the SSHRC Partnership Engage Grant program, the UBC Partnership Recognition Fund and the SSHRC Storytellers competition. This fieldwork took place over the course of three research trips: March-April 2017, September 2017-May 2018, and September 2018-May

2019. Data collection included participant observation at CEPAGRO's headquarters and during events, as well as through site visits to urban and rural agroecological spaces and video recorded interviews with 43 people. Photography and videography conducted as part of this research follows the protocols for participant consent established by the UBC's Behavioural Research Ethics Board.

1.5.1 Visual Ethnography

Primarily for the Brazilian field work, this project employs a community-based visual ethnography. This involved a multi-pronged research approach that simultaneously provides a research method, a knowledge mobilization tool and a process for relationship building with the community partner (Bowness, 2019). The methodology draws on Sarah Pink's visual ethnography (Pink, 2003, 2007; Pink & Morgan, 2013). Pink considers ethnography as "a process of creating and representing knowledge (about society, culture, and individuals) that is based on ethnographers' own experiences" (2007, p.22). She positions visuals of various kinds (especially photos and videos), as playing a number of different roles in the ethnographic research process. My approach to visual ethnography, which was used in Chapter 4, combines the use of traditional ethnographic techniques, such as participant observation and in-depth interviews, with the production of documentary-style videos and multimedia websites to communicate research results and support community partners. This allowed the research team to access rich and in-depth knowledge of the agroecology movement in both Canada and Brazil through a "short-term ethnographic" process (Pink & Morgan, 2013). Pink and Morgan (2013) describe short-term ethnography as involving high-intensity research exchanges with participants, captured with photographic details, and an ongoing theoretical-data collection

dialogue throughout the research process. Video-recording interviews is an especially high-intensity way to collect data, and I maintained ongoing contact with participants following interviews and throughout editing (as renewed confirmation of consent to participate is especially important when participants agree to waive their right to anonymity in research reporting). Participant observation during site visits was also enhanced by capturing footage and taking photographs to supplement fieldnotes.

This approach was encouraged and supported through the UBC Public Scholars Initiative and led to public-facing research outputs, including a SSHRC Storytellers video (with the prize money awarded distributed in full to the Brazilian community partner) and a multimedia website, www.VisualAgroecology.com (see Chapter 4 and Appendix 1). All the photos in this dissertation were taken by me.

1.6 Positionality

I am an urban settler from Winnipeg, MB, and a cis-gendered man and person of colour from a middle-class background. My class privilege as an undergraduate and master's student provided opportunities that have implications for the development and progression of this study. First, I was able to take on a significant non-paid role as a community organizer in Winnipeg's urban agriculture community as the co-founder of a non-profit organization, Sustainable South Osborne. As my direct needs were met (by living rent-free at my mother's home with disposable income through scholarships and part-time work), this afforded me the space to dedicate significant time and energy to reflect on questions about urban food systems, sustainability, and social movements.

Second, my class privilege also offered an opportunity to travel to Brazil before entering the PhD program. This introduced me to the research context for the Brazilian fieldwork, although I am not Brazilian, nor did I have any significant ties to Brazil before the study began. Being a non-white passing man also granted me a sense of personal security during the fieldwork in Brazil not shared by my colleagues who are white and/or women. These unearned privileges helped me create meaningful relationships with members of the community-partner organization in Brazil. Through my privileged affiliation with a well-resourced research team located in a globally recognized research university in Canada, I was able to support our partnership by developing grant proposals to fund shared research activities and to provide stipends for local field and research assistants in Brazil. Despite a relationship built on the mutual intentions of collaboration and reciprocity, the social distance between me as a well-funded graduate student from the Global North and the community meant that throughout the fieldwork I was constantly reminded of my social locations and relative privileges.

1.7 Structure of the dissertation

In this introductory chapter, I have outlined the conceptual and methodological approaches used, presented my overall research objectives and questions and present context about the research sites. Chapter 1 is then followed by three substantive chapters, each written as stand-alone academic journal articles.

Chapter 2 is a theoretical intervention that makes two contributions to the conceptualization of food sovereignty. First, inspired by scholars and movements working in the field(s) of Indigenous food sovereignty and relational sociology, and specifically the epistemological perspective of radical relationism proposed by Christopher Powell (2013),

Chapter 2 proposes a three-part “sites, stakes, and scales” relational framework for understanding where and why food sovereignty struggles happen. Radical relationalism is a social ontology that considers relations as the primary unit of analysis and all other elements of social reality as derivatives of those relations. Second, the sites, stakes, and scales framework is applied to illustrate the contexts, processes, and mechanisms through which food sovereignty mobilization occurs in urban spaces, drawing on examples from food sovereignty mobilizations in Canada and Brazil.

Chapter 3 advances the conceptual development of “urban agrarianism,” a novel concept in food sovereignty scholarship, and is based on original fieldwork in Metro Vancouver (Bowness & Wittman, 2020). In theorizing agrarian citizenship in urban contexts and identifying the role urban agrarianism plays in the food sovereignty movement, Chapter 3 is based on analysis of interviews with 34 participants in the urban agriculture movement in Vancouver and Richmond between December 2017 and April 2019.

Chapter 4 emerges from a visual ethnography of urban agroecology in Santa Catarina, Brazil. The main research question addressed is: What are the mobilization strategies deployed by people in the urban agroecology movement building more sustainable and just food systems from the city? This question was addressed through qualitative fieldwork including participant observation and interviews with 43 people, supplemented by photography, videography, and site and event visits. The main argument is that urban agroecology contributes to the food sovereignty movement so far as the strategies for social mobilization are based on a theory of change that explicitly connects problems both in the city and the countryside.

The final concluding chapter, Chapter 5, summarizes the contributions to the literature made by the three substantive chapters, as well as the limitations of the findings, and outlines areas for future research.

Chapter 2: Sites, Stakes, and Scales: Theorizing the Urbanization of the Global Food Sovereignty Movement

2.1 Chapter Summary

The global food sovereignty movement emerged in the 1990s as a transnational challenge to the corporate food regime. While historically rural in its orientation, the movement explicitly prioritizes engagement with urban people and places. This paper examines and extends the application of relational perspectives to a growing tendency in the food sovereignty movement and scholarship to focus on the urban. Adopting a radical relational perspective on mechanisms for food sovereignty mobilization, we present a “sites, stakes, and scales” framework for analyzing the urbanization of food sovereignty. This framing moves beyond locating the urban as a geographic “site” where food sovereignty struggles happen by also asking: What is “at stake” for both urban and rural people? How does connecting stakes and sites expand or constrain the possibilities for rescaling social mobilization, networks, and collective action frames to pursue change at other socio-spatial “scales”? We apply this framework to two cases studies in Brazil and Canada and argue that a radical relational approach presents methodological advances for the study of food sovereignty.

2.2 The Global Food Sovereignty Movement: A constellation of struggles

The 1990s saw the rise of the global food sovereignty movement which poses a sustained collective resistance to the future expansion of industrial agriculture and neoliberal food

relations. Defined as the right of peoples to define their own food systems and grounded in agroecological approaches to food provision, the discourse of food sovereignty emerged through mobilizations by and alongside the world's peasant and Indigenous food providers.³ The framework of food sovereignty has evolved significantly since first appearing on the world stage. At gatherings, colloquia and forums, a strong social movement contingent, including *La Vía Campesina* (LVC)⁴, has adapted the concept to make it more flexible, to be more inclusive of different voices and a diversity of perspectives, and to advocate for social transformation in the name of equity and long-term viability of the food system. This diversity has made the concept of food sovereignty difficult to define, which is very well stated by Elizabeth Mpofu, speaking as the General Coordinator of LVC:

[S]ome academics and analysts were concerned that La Vía Campesina seems to have a new and different definition of Food Sovereignty after every meeting and forum. [...] We are not trying to create the perfect definition, for a dictionary or for a history book. We are trying to build a movement to change the food system, and the world. [...] To understand what Food Sovereignty is for La Vía Campesina, yes it is a vision of the food system we are fighting for, but, above all, it is a banner of struggle, an ever-evolving banner of struggle (Wittman et al., 2010, p. 7).

³ Edelman (2014) traces the term to the Mexican state program PRONOL in the 1980s. However, a genealogy of the term, in the Foucauldian sense, would locate the historical roots of contemporary food sovereignty discourse in social movement mobilizations.

⁴ While LVC is a key agent of food sovereignty construction (see Desmarais, 2007), it is important to note that there have been several other important actors in this process, including the International Planning Committee for Food Sovereignty and the Independent Food Aid Network.

As one of the founders of the Landless Rural Workers Movement (MST) in Brazil, João Pedro Stédile, along with Horacio Martins de Carvalho, argued, food sovereignty “is a principle and an ethical lifestyle that does not correlate with an academic definition but arises from a collective, participatory process”(McMichael, 2015, p. 9). As such, we find it useful to think of food sovereignty as a process and theory of change that emerges through social mobilization and is expressed by collective action in pursuit of realizing demands for social change. It is brought to life through an ongoing ‘constellation of struggles’ over land and food between actors, especially social movements and states, to create a world characterized by food security, dignified rural livelihoods, greater social equity and a more sustainable relationship to the land, and towards social transformation for a more ecologically regenerative and socially just world (Wittman, 2009a, 2009b).

We make two further refinements to this conceptualization of food sovereignty. First, inspired by scholars and movements working in the field(s) of Indigenous food sovereignty and relational sociology, and specifically the epistemological perspective of radical relationism proposed by Christopher Powell (2013), we propose a three-part ‘sites, stakes, and scales’ relational framework for understanding where and why food sovereignty struggles happen. Radical relationalism is a social ontology that considers relations as the primary unit of analysis and all other elements of social reality as derivatives of those relations. Second, we apply the sites, stakes, and scales framework to illustrate the contexts, processes, and mechanisms through which food sovereignty mobilization occurs in urban spaces, drawing on examples from food sovereignty mobilizations in Canada and Brazil.

2.2.1 The Urbanization of Food Sovereignty

The struggle for food sovereignty has primarily been framed from the food provider's point of view—and has focused largely on the struggles of rural food providers at that. Only recently has the focus in food sovereignty scholarship turned to the urban context, where the majority of the world currently lives. As Alonso-Fradejas and others state:

Food sovereignty's original social base is located in the peasantry of the global South [sic] and the small-scale, family farm sector of the global North. Because it is one of the few broad political platforms today globally contesting neoliberal capitalism, food sovereignty has spread across food system struggles to urban and peri-urban areas of the global North, where students, socially conscious consumers, farm and food workers and food justice advocates have embraced it as a banner for social justice and food system transformation (Alonso-Fradejas et al., 2015, p. 436).

This 'urban turn' for food sovereignty pivots on the globalization of the food sovereignty movement and a rising urban consciousness of sustainability challenges in the agri-food system. An emerging food sovereignty scholarship has started to explore the resulting expressions of urban food sovereignty or food sovereignty in urban areas, such as food justice and food (in)security activism in the city (Alkon & Mares, 2012; Block et al., 2012), urban food literacy and education for food sovereignty (Davila & Dyball, 2015), the definition of urban food sovereignty rights (Siebert, 2019), new urban food provisioning strategies as a form of food sovereignty (Laidlaw & Magee, 2015) and expanding food sovereignty to include non-producing urban people (Sippel & Larder, 2019; Thiemann & Roman-Alcalá, 2019). We refer to these shifts – towards an increase in urban engagement with the politics of food sovereignty and an

increased focus on urban issues by food sovereignty scholars – as the *urbanization of food sovereignty*. First, we discuss general features of the urbanization of food sovereignty, raising the centrality of relations. Then, we advance the theoretical conceptualization of relations through the sociological perspective of radical relationism (Powell, 2013), which informs the development of a sites, stakes, and scales framework for advancing urban food sovereignty scholarship. Finally, we illustrate this framework through case studies of urban food sovereignty mobilizations in Metro Vancouver (Bowness & Wittman, 2020) and Florianópolis, Brazil (Bowness et al., 2018, 2019).

García-Sempere and colleagues (2018, p. 390) suggest that urbanization trends are pointing towards an “urban transition to food sovereignty.” They draw on the concept of the metabolic rift to “decipher key aspects involved in building food sovereignty in urban spaces (390). The metabolic rift refers to the modern separation between where food comes from and where it is consumed; between people, the land and each other (Bezner-Kerr et al., 2019; Carolan, 2009; Clapp, 2015; Schneider & McMichael, 2010; Wittman, 2009b). The rift manifests as problems such as ecological degradation, food insecurity, social marginalization and an epistemic chasm where urban people are detached from the skills and knowledge required to provide for their own self-sufficiency (McClintock, 2010; Schneider & McMichael, 2010). Rooted in Marxist thinking about nature/society interrelations, the metabolic rift refers to a break in the social metabolism (material and energy exchange) between people and the environment (Moore, 2000). A key flow in this metabolism is the creation of people through making and eating food. As capitalism expanded, people moved to cities, and agriculture industrialized. This transformation created a rural-urban dichotomy by disrupting closed loop systems, and therefore, a necessity to heal a ruptured social metabolism between the city and the country. García-

Sempere and colleagues (2018) argue, “as a result [of rural-urban migration and disconnection between urban people and the source of their food], in order for city dwellers to work toward developing just, sustainable food systems, they will have to become aware of processes occurring in rural areas and direct their strategies *toward establishing relationships* with the rural areas in their region” (6, emphasis added). In a localized world, cities near to their supportive ecosystem surroundings is a potential recipe for sustainable human-nature relations, as suggested by the model for a city-regional food system (Vaarst et al., 2018). But, in a globalized world, where several regions are unable to provide for their swelling urban populations, this approach may only work where population size is proportionate to nearby fertile lands and waterways. As such, the relationships between people in dynamics of equity and solidarity, between geographic scales of urban and rural, and more broadly within the context of wider natural systems, form the basis of what García-Sempere and coauthors see as a necessary shift towards radical democracy in agri-food systems. In particular, this transition builds “alliances among nearby urban and rural municipalities, as well as with broader territorial levels” (6).

2.2.2 The Relational Turn in Food Sovereignty

Discussions about urban/rural connections are situated within a growing trend in food sovereignty scholarship towards an analytic focus on *relations*. While some of this work centres gender relations (Turner et al., 2020), solidarity between local movements (Calvário et al., 2019), and transnational social movements (Martínez-Torres & Rosset, 2010), others build specifically on concepts from the subfield of relational sociology (see for example, Figueroa, 2015; Henderson, 2016; Iles & Montenegro De Wit, 2015; Schiavoni, 2016; Shattuck et al., 2015; Sippel & Larder, 2019). Many Indigenous food sovereignty scholars and movements also use a

relational approach to analyze Indigenous struggles for territorial sovereignty and the resurgence of Indigenous food systems (Coté, 2016; Daigle, 2017; Morrison, 2011; Robin, 2019). These analyses include relations between, *inter alia*, social movements, the state, growers, eaters, agribusiness corporations, activists, land, ecosystems, human and non-human kin, and Indigenous communities. Methodological proposals in this vein call food sovereignty scholars to be more attuned to the conceptualization of relations themselves. For example, Schiavoni (2016) proposed relations as one of the elements in her three-part HRI (historical, relational, interactive) framework for analyzing the construction of food sovereignty. She foregrounds the processual nature of food sovereignty construction by stating that a historical lens is necessary, a common dimension of relational perspectives, and treats food sovereignty as relationally constructed in reference to other concepts, such as food security. Food sovereignty from this perspective is a relational composite of concepts, such as the six pillars of food sovereignty (Nyéléni, 2007a). These properties make the construction of food sovereignty relational (the “R” in HRI). Finally, this process of relational construction happens through interaction between different actors, especially social movements, and the state.

The relational aspects of food sovereignty take a more central role in Indigenous food sovereignty scholarship in particular. Michele Daigle is among the contributors to a

rise of food sovereignty scholarship that centers the voices and legal traditions of Indigenous peoples, and that is based on long-term, reflexive and reciprocal *relationship building* (LaDuke 1999, 2007; Coté 2010, 2016; Morrison 2011; Gupta 2015; Kamal et al. 2015) (Daigle, 2017, p. 3, emphasis added)

These scholars, activists and organizers are part of what Charlotte Coté calls “indigenizing food sovereignty” which “moves beyond a rights-based discourse by emphasizing the cultural

responsibilities and relationships Indigenous peoples have with their environment and the efforts being made by Indigenous communities to restore these relationships through the revitalization of Indigenous foods and ecological knowledge systems as they assert control over their own foods and practices” (Coté, 2016, p. 1). As such, Indigenous food sovereignty scholarship is grounded in relationships, but not only between humans. In the words of Tabitha Robin:

Indigenous food sovereignty embodies a caring quality that extends to the land, water, and each other. [Indigenous food sovereignty] embraces an awareness of the intimate connection between people and all of creation” (Robin, 2019, p. 92).

Similarly, as Dawn Morrison states, food is sacred “as it is expressed in spiritual protocols that continue to be observed in relationship to the land, water, plants, animals, and people that provide our communities with food” (Morrison & Wittman, 2017, p. 134).

A clear theme in this body of work is the prioritization of relationality in both food sovereignty as a topic of inquiry and as an approach to research and learning about the world. This also appears as a thread in work discussing themes related to urban Indigenous food sovereignty. For instance, in the context of inner-city Winnipeg, Cidro, Adekunle, Peters and Martens (now Robin) (2015) examine how cultural foods for urban Indigenous peoples represent a pathway to Indigenous food sovereignty by relating to food as ceremony and as part of a relationship with the land. Similarly, Johnnie Manson (2019) demonstrates how on Vancouver Island, the logics that govern Indigenous people’s food trading and sharing practices are shaped by relations that cross urban and rural spatial scales. These analyses place relations at the centre of questions about the nature of food sovereignty, including in the context of urban and Indigenous food sovereignty.

2.2.2.1 Food Sovereignty Across Relational Scales

In addressing the question of “who/what is sovereign in food sovereignty?”, Iles and Montenegro De Wit (2015) argue that “sovereignty is not an extraneously existing object but is a living process, it foregrounds the conscientious building and maintaining of relationships between people, institutions, technologies, ecosystems, and landscapes across multiple scales” (482). First, maintaining these relations requires understanding “scale-as-level,” where units of scale are grouped according to an organizational logic and can be hierarchically arranged (socially or spatially). For example, food sovereignty scholars often draw a distinction between the roles and spheres of action across individual, household, municipal, regional, national, and international governance institutions or corporate actors. Then, a relational approach is used to supplement these delineations and interactions across levels. As Iles and Montenegro (p. 486) state:

Scale-as-relation is more difficult to grasp, as it requires a sharp break from conceiving organizational tiers consisting of bounded, static units. Relational scale is the *spatial and temporal relationship among processes at different levels, as well as the processes connecting elements between levels* (emphasis added).

While calling to attention to the spatial, temporal, and relational aspects of food sovereignty in the context of the Peruvian Potato Park, in practice Iles and Montenegro De Wit’s analysis of relational scale retains three-dimensionality to the scalar structure of sovereignty in and over the park, where recognition of local Indigenous communities and their sovereignty happens through relations with local, regional, national, and supranational organizations, including states. This suggests that sovereign power works, and therefore food sovereignty movements work, across

different ontological scalar orders called ‘levels.’ For example, the efforts of transnational network *La Vía Campesina*, and specifically the women in it, “boomerang” (Keck & Sikkink, 1998) their mobilization “up” and “down” to different levels with assumed ontological existence:

Policies that LVC women determine are put into practice through local collective action and local collective demands. [...] They project this demand to other scales. Meanwhile, each demand returns to each movement and is fought for at that level. LVC is used as a space for struggles, for the recognition of these struggles, and as an empowerment tool through different levels (Brochner, 2014, p. 256).

Here organizations like LVC operate at and across different levels, creating demands that are initially targeted at specific institutional and governance actors (such as municipal or regional governments) but can be redirected at different levels to other actors (for example, to national governments or international governance bodies).

2.2.2.2 Food as Relations

Focusing specifically on the urban dimensions of food sovereignty, some approaches to food sovereignty scholarship consider the urban as a scalar level through which food sovereignty is constructed through relations. Figueroa (2015), focusing on the urban context, states that:

In shifting the theoretical lens from ‘food’ to the social formations and historical trajectories that produce particular experiences of food, a relational, historically and culturally grounded, ‘people-centered’ approach can highlight the social elements that create and/or strengthen resonant, locally inflected political strategies for food sovereignty in urban communities (500).

This perspective shifts from the structure of scalar relations to the *subjectivity* of food sovereignty actors, and urban actors in particular. This methodological individualism decentres food and focuses on individual standpoints to make “explicit the connections between food and other social phenomena” (500). Figueroa’s ‘people-centred’ approach traces relations between people, including urban people, and broader “social processes at varied spatial and temporal scales” (502). As applied to urban Chicago, Figueroa traces people’s experiences of eating, buying, and relating to food to the historical legacy of the commodification of human bodies in the transatlantic slave trade. Taking a people-centred approach to food sovereignty scholarship therefore links individuals, such as urban social movement organizers, eaters, and farmers to broader processes of food sovereignty construction.

2.2.3 Relations as Mechanisms

While this trend in food sovereignty scholarship advances a more concerted focus on relations, the ontological nature of relations remains unrefined. Relations among scales and people’s personal experiences of food as relations as fundamental to the urbanization of food sovereignty can be clarified by a distinction made by Henry Wai-chung Yeung (2019), where relations in the food sovereignty lexicon fall into either “processes” or “mechanisms”:

Whereas *process* is conceived as a contingent change in the sequential series of entities and their relations, *mechanism* serves as a necessary relation to connect an initial causal condition with its particular socio-spatial outcomes in context (Yeung, 2019 p. 226).

Yeung sees relationality as crucial to socio-spatial analyses of power relations in economic geography (2005). In an exchange in *Dialogues in Human Geography*, he argues that economic

geography in particular (but the argument also applies to the social sciences generally) should pursue causal explanations that depend on the “identification and specification of generative mechanisms connecting cause and outcome” (Yeung, 2019, 246). This distinction can therefore be applied to urban relations to food sovereignty. Yeung cautions that mechanisms can be conflated with more general *processes*, which can be pointed to without specificity and detract from making causal inferences. For example, Yeung argues that the *process* of neoliberalization leads to specific outcomes (one being uneven geographical development) in different contexts (such as in China versus the US) through different *mechanisms* (in the Chinese context, he argues it was the Party state, as part of a more general process of global neoliberalization, that caused specific uneven development outcomes in China). Pointing to a more general process of neoliberalism does not explain how neoliberalism works. Instead, he argues,

a mechanism can be derived from a process, but it is a particular kind of process because of its necessary role in connecting change and outcome [...] a mechanism is central to causal explanation because a general and contingent process of change, while integral to this explanation, may not be causal ‘enough’ to explain concrete empirical outcomes (234-246).

The key distinction in this framework, while perhaps different from how policy or social movements may use these terms, is that processes are abstract trends that can only provide a theoretical orientation, or heuristic map, to help identify empirical observations that demonstrate mechanisms, which might work together as part of a causal process, as the necessary relations that cause specific outcomes in a specific context.

Consistent with Yeung’s definition, and as noted above, food sovereignty is often referred to as a set of general *processes*, rather than specific outcomes, through which societies

can be transformed to be able to meet social movement goals for subsequent outcomes such as food security, harmony with natural systems and valorized food providers. General to most food sovereignty theory, processes are generalized as struggles between food producers/providers and land on one side and the neoliberal and colonial state and corporate food regime on the other. The processes involved in the construction of the corporate food regime and the food sovereignty movement's response (social movement resistance, policy building and construction of alternative food systems) can be thought of in Polanyian terms as capital's movement and countermovement (Polanyi, 1944). We can refer to these processes respectively as *accumulation* and *redistribution* processes. On one side, accumulation works through the unfolding churnings of industrial capitalism made up of both mid-range processes and specific instances of the mechanisms of commodification, industrialization, mechanization, urbanization and colonization and others forces of globalization, alienation, rationalization, and dispossession. On the other, redistribution processes are made up of specific *mechanisms* that the food sovereignty theory of change call on as necessary. Both of these processes are meant as heuristics and cannot be defined exhaustively, and there may be tensions within a given process, giving it both accumulation and redistribution characteristics. However, processes on each side are comprised of specific relations, or mechanisms, that in a particular spatio-temporal context facilitate social mobilizations supporting the food sovereignty movement.

In this paper, we aim to explore those mechanisms as an object of study in relation to the urbanization of food sovereignty, and for understanding the processes and outcomes of food sovereignty struggles more generally. We now examine the utility of radical relationism as applied to mechanisms of food sovereignty in urban contexts.

2.2.4 Radical Relationism

As mentioned above, some of the patterns in the growing relational focus in food sovereignty scholarship build on relational sociology. Relational sociology suggests that relations – more than just actors, or structures, or anything else for that matter – are the primary constituents of objects of sociological interest, such as class, inequality, identity, social movements, institutions, power, etc. The implication is that scholarly energy should be directed at understanding relations, over prioritizing states or objects or subjects. In a seminal piece, *A Manifesto for a Relational Sociology*, Mustafa Emirbayer (1997) distinguished this relational view from the “substantialist” view of the social world:

The imageries most often employed in speaking of transactions [or relations] are accordingly those of complex joint activity, in which it makes no sense to envision constituent elements apart from the flows within which they are involved (and vice versa) (289).

Despite the relational turn with more scholars and perspectives explicitly focusing on relations, Christopher Powell cautions that relational sociologists do not all necessarily refer to the same thing when they use the term “relation” (Powell, 2013), and in response proposes the framework of *radical relationism*. Radical in the epistemological rather than political sense, radical relationalism follows a few guiding principles to orient social researchers away from dualist ontologies, starting by treating social relations as the elementary unit of sociological analysis and treating all social phenomena as created through relations. He suggests that relations can be actual (as in, existing social relationships between nodes in a network) or potential (as in relations by virtue of relative positions in a social field). All relations are dynamic, and this means the only way to observe them is to observe change over time. Radical relationism draws

this quality from actor-network theory, following the work of Bruno Latour (2005), and treats humans as only one type of agent in a given network, which can also include other-than-human agents (Powell, 2013, 199). In the context of food sovereignty, this means that in addition to human actors, including collectives, agents of food sovereignty include land, plants, animals, weather, nutrients, and the sun. Radical relationism also aims to avoid dualisms (such as subject/object, individual/social, nature/society) with two implications for food sovereignty scholarship. One is in its treatment of scale (or scope, as in micro-meso-macro) and the other is in its treatment of agency and structure.

First, radical relationalism is based on a flat ontology (or flat monism) of scale which suggests we avoid thinking in terms of nested spheres of directional influence and instead consider scale as interconnected networks of social relations:

The network scale, density, composition, and complexity of a [bundle of relations] do have consequences, of course; only, they do not engender different orders of reality that we may usefully stack in a vertical scheme from smallest to largest [...]. Macro-, meso-, and microlevel figurations from the global capitalist economy down to the physiology of the human body interact in tangled, nonlinear ways without one level determining the others even in the last instance. From this position it is a short step to dispensing altogether with the imagery of vertically stacked orders of aggregation in favor of the imagery of interconnected networks (networks that connect with each other rather than encapsulating one another). In nondimensional network space, scale can be measured in a variety of ways, few of which bear any resemblance to three-dimensional physical space (Powell, 2013, 202).

Second, radical relationism also treats “agency” and “structure” as equally present and important qualities of the same phenomena. Here Powell (2013) argues that “every statement in a structural explanation may be reformulated in agential terms and vice versa” (201). Therefore, while it might make sense to focus on a subject’s agency in one line of argumentation, it could (and for broader applicability or extension of the analysis of particular mechanisms to other contexts, should) be analysed in terms of structures, or patterns of relations, that condition that agency as well. As he argues:

Rather than there being some phenomena that belong to the category of “structure” or “structuration” and other phenomena that belong to the category of “agency,” all phenomena are simultaneously structured and agential. [...] The concepts of “structure” and “agency” do not designate two different types of phenomena but two different ways of accounting for the same phenomena (197).

So, all structural accounts can be seen in agential terms, as Figueroa (2015) does, but they can also be seen in structural terms while considering how agents shape structures, which is more in line with the relational scale of Iles and Montenegro De Wit (2015). Radical relationism takes this one step further and suggests that mechanisms are not instrumentalist in nature, but instead are components of specific pathways that connect agents and structures.

Radical relationism’s treatment of agency is consistent with the theoretical tradition in the philosophy of science called “new materialism,” which parallels theories long developed by Indigenous Studies scholars related to non-human agency. Rosiek et al (2020) for example, raise an important critique of new materialism, which can be applied to Western relational theorizing more generally, where Indigenous scholars have been ignored or downplayed despite having a

clear, and prior, epistemological alignment with theories of relationality. We note this critique here as part of our ongoing commitment to actively avoid “complicity with Indigenous displacement and to solidarity with Indigenous peoples in their struggles against colonialist violence in the academy and beyond” (332).

Both the flat monist approach to scale and Powell’s approach to describing the interaction of structure/agency have implications for how we conduct food sovereignty scholarship committed to the study of relations. Following Iles and Montenegro De Wit (2014), one criticism against scalar arguments that treat phenomena as existing at and across different “levels” is aimed against any suggestion of establishing a hierarchy, which may be better considered from the perspective of a flat ontology (Geels, 2011; see the critique against hierarchy of scale in multi-level perspective, or “MLP,” by Shove & Walker, 2010, and the response by Geels, 2011). This equally applies to the nesting of the urban scale within wider (or “higher”) regional scales, replacing discussion of processes and mechanisms as nested in social-spatial scales through the relations that form mechanisms for social mobilization across multiple sites.

A second critique here can be applied against the people-centred or other agency-prioritizing approaches for two reasons. First, Figueroa’s people-centered approach (2015) downplays agency from other-than-human agents in food sovereignty mechanisms and processes, such as land, ecologies, plants, animals, technology, and spiritual beings in Indigenous cosmologies. People are a crucial element in food sovereignty relations, and de-centering food (conceptualized as a relation) and starting with the standpoint of the subject does help elucidate experiences of struggle and can be useful for mapping out specific mechanisms from ethnographic or phenomenological perspectives. This is especially useful in urban contexts – where Figueroa applies the people-centered approach – given the high density of urban actors,

such as community organizers, eaters, and policy makers, and their relative detachment from land and other other-than-human actors. While it is important to recognize how “the capacity for diverse communities to re-articulate social relations through everyday food practices could provide a potentially powerful pathway not just to food sovereignty, but an alternative to life under capitalism” (498), it is equally important to recognize the structures, partially made up of non-human agents, in which that capacity is embedded, and thereby both constrained made possible.

2.3 Food Sovereignty Mechanisms in Urban Contexts: Sites, Stakes, and Scales

Food sovereignty concepts such as relational scale (Iles & Montenegro De Wit, 2015) and “people-centered” approaches (Figuerola, 2015), focus specifically on relations. We have proposed that we can push this trend of focusing on relations forward by engaging with two questions (and next we will apply the answers to the urban context). First, we asked what exactly are the relations that food sovereignty scholars are studying? We argued that focusing on context-specific socio-ecological *mechanisms* that instigate and advance specific food sovereignty mobilizations in particular sites. Next, we looked to relational sociology in asking how we can conceptualize mechanisms as relations. Here the perspective of radical relationalism suggests that we only treat hierarchical scales and people’s standpoints as heuristic tools in identifying mechanisms that link specific actors, both humans and other-than-humans in specific contexts, to relevant outcomes based on demands set by the food sovereignty movement. It also reminds us to seek both agential and structural explanations for a given food sovereignty struggle. As actors engage in urban mechanisms for food sovereignty mobilization through urban farming networks and markets, developing food sovereignty policies, and coordinating urban

activist politics and events, new potential relations can develop and rescale sites of food sovereignty by enlisting new actors that span the urban and rural divide but are not confined to, and can also reconfigure preexisting and/or hierarchical scales. Bringing these insights from sociological relational theory and critical realisms together, and using them to extend relational thinking in urban food sovereignty scholarship, we propose that a radically relational approach to mechanisms can contribute a useful analytical frame to food sovereignty theorizing through a “sites, stakes, and scales” framework. The following section applies a radically relational sites, stakes, and scales framework to examples food sovereignty struggles drawn from ethnographic fieldwork related to urban food sovereignty in Metro Vancouver, Canada and Florianópolis, Brazil.

2.3.1 Sites, Stakes, and Scales of Food Sovereignty in Metro Vancouver and Florianópolis, Brazil

As with peasant farmers, land access is a major issue for urban farmers (Wekerle & Classens, 2015). While the exclusion from access to land for peasants can be life threatening, urban access in the Global North is more likely to result in a loss of income or community space; however, given land values in urbanized areas, the development pressure can be acute. Although the intensity may be quite different, both rural and urban farmers operate within a struggle for land sovereignty (Jr. et al., 2015; Roman-Alcalá, 2015). Urban farming struggles over land in Metro Vancouver connect networks of urban farmers and community organizers to struggles in the countryside (Bowness & Wittman, 2020). For urban food cultivators, land development pressures make accessing growing space a challenge. In recognizing a shared stake in the struggle against land development, people involved with urban agriculture mobilize not only

against development within particular sites within an urban context, but also rescale mobilizations in defense of food providing lands in the city, on the periphery and in the countryside against residential and industrial development.

On the opposite coast in South America, there is a robust urban agroecology movement in Florianópolis, Brazil, another large metropolitan area where urban actors engage in a range of food sovereignty mobilization activities (Bowness, Sagae & Wittman, 2018; Bowness, James & Lisboa, 2019). Through workshops and events in the city, urban market spaces for agroecological produce, and visits to rural agroecological farms, urban agroecologists and organizers develop a shared sense of solidarity with rural agroecological farmers and Indigenous communities across the broader region of Southern Brazil, to demand policy changes that allow for more sustainable livelihoods for agroecological farmers in the countryside while contributing to urban food security, food literacy, and environmental citizenship.

2.3.1.1 Sites

Studying relations in these contexts could use any number of terms to demarcate the constituent parts “in relation.” We opt to use on the term “site” to describe the places where food sovereignty struggles happen, following Antonio Roman-Alcalá:

Sites of sovereignty are the units of inquiry, encompassing diverse forms of human organisation. [...] I mobilise ‘sites’ to describe spaces of decision making which shape the meaning, possibilities and limits of [food sovereignty], at any scale (Roman-Alcalá, 2016, p. 3).

Building on this, a “site” of food sovereignty is the combination of the social context(s) and relations in which struggles over land and food result in social mobilization. The sites where food sovereignty happens consist of actors, human and other-than-human, including food and redistribution processes that affect the social metabolism.

Sites of food sovereignty are akin to an actor network of actual relations between human and non-human actors involving a setting and context in which food-providing land and humans interact. Land and capital are key actors in a site of food sovereignty struggles as their relation positions processes of accumulation and redistribution in contradiction with one another with implications for social metabolism: Less land is available to produce food, and food producing lands become degraded. In Metro Vancouver and Florianópolis, sites of food sovereignty connect human actors that relate to land through urban development or industrial agriculture, both of which are framed as a threat to sustainable farming and food systems. In Metro Vancouver, these actors include real estate developers and institutions in the property regime, policy actors, members of the urban agriculture community, as well as other organizations, community organizers, rural farmers and the Coast Salish peoples. In Florianópolis, they include large-scale farmers and associated corporate interests, members of the urban agroecology community, community organizations, rural farmers, and a nearby Indigenous Guaraní community. Description of the relevant actors and structures that shape the context of the research sites are described in greater detail in Chapters 3 and 4.

2.3.1.2 Stakes

The second dimension of radically relational food sovereignty struggles is the “stakes” over which the actors mobilize. We use the term “stake” to refer to the material and symbolic benefits

that accrue as the result of particular relations between actors. Material stakes are easier to see (such as property and money), but symbolic benefits such as inclusion, representation and legibility and acceptance by a dominant group can also be at stake. In this paper we focus on material stakes, however this framework could also focus more directly on the symbolic, more representational, or epistemic benefits. The benefits can be lost (or increased) as the relations between the actors change over time. Some actors stand to benefit through redistribution processes (such as urban and small-scale farmers), whereas other actors (such as the developers) stand to benefit through accumulation processes. As accumulation threatens the social metabolism in a given site, the stakes related to that metabolism intensify, as do the relationships between the actors. Tension between accumulation and redistribution processes triggers a mechanism for social mobilization. While each site is different, at a certain point the social movement actors identify the stakes and act through social relations in collective action aimed at redistribution.

The main stake in the Metro Vancouver context is access to food growing lands and the financial value of property, which is among the highest in the world (see Bowness & Wittman, 2020). For urban farmers, their agency is constrained by the structural arrangement of the relations between the actors, and by the entrenchment of capital, and residential development capital in particular. In Santa Catarina, the struggle is primarily defined as one over health, both of farmers and eaters and the Atlantic rainforest ecology which are all threatened by industrial agrochemicals, and pesticides in particular, and over the future of the food system.

2.3.1.3 Scales

The processes surrounding the mobilizations in Metro Vancouver and Florianópolis abound in the food sovereignty literature. Scalar implications include the extent to which the struggles over stakes in particular sites contribute to broader movements advocating for transitioning from industrial farming practices to agroecological ones; disengaging food consumption from global markets; changing understandings of nature and food; claiming universal rights and enacting collective responsibilities; creating new institutions that redistribute property, and preserve and regenerate natural ecologies; and repatriating colonized lands and the infusion of Indigenous values and traditions in order to hospice remaining colonial structure. Each of these redistributive mechanisms are an expression of agency of the actors who stand to lose given their structural position in relation to a process of accumulation. Stakes, as the benefits to be won or lost in a given struggle, are therefore defined through an interaction between agency and structure. It is both simultaneously a choice of given actors and the structural configuration of relations between actors in a site that enables mobilization, and also allows that struggle to shift from the urban to the rural, marking the final aspect of this framework: Scale.

Scale is a frame in which strategies in pursuit of specific goals are carried out (Born & Purcell, 2006; Robbins, 2015). One way that international peasant network LVC has been able to make local demands in global venues is through the process of “diálogo de saberes,” or the exchange of knowledges (Martínez-Torres & Rosset, 2014), which moves local concerns and demands to new wider audiences (or vice versa). In what is often referred to as “scale jumping,” similar to the Boomerang effect observed by Keck and Sikkink (1998), Born and Purcell argue that “[g]roups that are at a disadvantage at one scale can jump scales to pursue their agenda at a different scale in an effort to shift the balance of power in their favor” (2006, p. 198). Scaling

from local to regional/national or global makes food sovereignty struggles what Doreen Massey calls a “politics of place beyond place,” or a politics “which is not only introspectively about the local, but is about the local’s relation beyond” (Massey et al., 2009, p. 415). However, such “scale jumping” implies a nesting of spheres of influence that is challenged by an approach based on radical relationism. The proposal for a flat ontology avoids nesting the urban within the rural and treats scale as a heuristic tool for identifying “actual” and “potential” relations (Powell, 2013). A flat ontological stance can move us away from assuming the existence of powerful structures at specified scalar levels, to looking for actually existing relations between actors in a given site. We can also trace potential relations between actors in similar social locations, which would extend the scope of social mobilization by becoming actual relations. Rather than assuming that processes at higher levels necessarily create specific outcomes at local levels, instead we need to trace the specific relations that change stakes and result in social mobilization. Potential relations not only refer to potential relations between actors in a site, but identifying the stakes involved according to actor positions can span across sites.

The relations change as mobilization succeeds or fails in the struggle between accumulation and redistribution. Through the mechanisms of mobilization, the stakes change, potential relations become actual ones, and this changes the **scale** as the sites becomes reconfigured. As new stakes emerge, urban food sovereignty organizers shift and form new mobilization targets and pursue them through the formation of new relations. This moves us away from the idea of scale as nested in levels and towards a shifting flat ontology that changes as new relations are formed and new social movement goals established. In these sites, scales of urban, peri-urban, rural are not nested spaces within wider rural scales of region, state, and nation, although actors within a given site might identify with those scalar categories as “levels.”

In Metro Vancouver across different scales, organizers involved in urban agriculture shift their mobilization targets around land at different scales (Bowness & Wittman, 2020, Chapter 3). This rescaling includes struggles against residential development of UBC farm in Vancouver, against the development of mansions on protected agricultural land on the peri-urban edge in Richmond, and against energy development projects that threaten farmland beyond the city and Indigenous sovereignty. In Brazil, members of the urban agroecology organization CEPAGRO in Florianópolis see different conceptions of “health” as being at stake (Bowness et al., 2018, 2019). Accumulation of land and profits by industrial agriculture is seen as a direct threat to agroecological farmer and eater health and the health of the land itself and its surrounding ecosystems. As they redefine or expand the definition of the stakes involved in the struggle for food sovereignty, CEPAGRO develops relations with groups such as the MST, related agrarian reform settlement *Assentamento Comuna Amarildo de Souza*, the agroecology network *Rede Ecovida*, the urban food network *Rede Semear*, an urban composting project the Bucket Revolution, and a nearby by Indigenous community Tekoá V’ya. Through these different relations across different scales, CEPAGRO mobilizes in building an agroecological food system, both in the city and the country.

2.4 Conclusion: Radical Relationism Across the Urban-Rural Divide

These two examples demonstrate sites through which urban food sovereignty mobilizations become rescaled to include both urban and rural actors and spaces. By considering both urban and rural actors and tracing processes of accumulation as one of the vectors in transforming the metabolism of a site, social mobilization emerges through urban and rural *relations*.

This paper has engaged with two trends in food sovereignty scholarship towards an increased focus on relations and the urban context. While recent analysis has focused on relations, this paper presents an advance in what these relations are and how they relate to social mobilization. Drawing on Chris Powell's radical relationism, we treat relations as both constituent and determined by both structure and agency in a constant reconfiguration at ontologically monist scales. Through a radical relational perspective, both example sites demonstrate processes that become expressions of urban food sovereignty through specific mechanisms across urban and rural scales. The sites include actors, both human actors such as individuals and collectives, as well as non-human actors such as the land itself. The stakes include ecological health, equity and the financial interests associated with processes of accumulation and the very nature of political power or empowerment. In each site, actors mobilize and form new relations as they rescale the struggle from the urban to mobilizations spanning the urban-rural divide.

Methodologically, what is important in applying this framework is identifying what relations have been enlisted in a site, and specifically understanding how they become rescaled as the definition of stakes and mobilization strategies shift and change with the inclusion of new actors and intensifying accumulation threats to social metabolism. This process first involves identifying the actors in a given site and delineating how that site internalizes accumulation conflicts that threaten food sovereignty. These actors engage in struggles over specific stakes which are defined relationally through the actors involved. The site and the stakes can be reconfigured as new social mobilization targets are rescaled. The change in social mobilization implies fundamentally a change in the relations involved. Food sovereignty scholarship for the analysis of urban contexts therefore does not depend alone on identifying urban food movements

or urban initiatives who declare their commitment to food sovereignty. Instead, it involves focusing specifically on the nature of relations, connects the stakes for urban people to stakes for rural people and traces the changing dynamics of relations in the context of social mobilization.

Chapter 3: Bringing the City to the Country? Responsibility, Privilege and Urban Agrarianism in Metro Vancouver⁵

3.1 Chapter summary

This paper furthers the development of the theory of agrarian citizenship—the bundle of rights and responsibilities underpinning the food sovereignty movement. Through interviews with 34 participants engaged with urban agriculture in Metro Vancouver, Canada, we introduce the concept of urban agrarianism, defined as an urban ethic of care for foodlands and, by extension, a relational responsibility to exercise solidarity with those who cultivate and harvest food. We argue that urban people, especially those with privilege, should recognize impacts associated with their social-ecological metabolism, and mobilize for food sovereignty struggles—including for the repatriation of lands stolen by colonial dispossession.

3.2 Urban Agrarianism and the Struggle for Food Sovereignty

The rural-urban interface is at the forefront of food sovereignty debates, with social movement advocates and scholars calling for stronger relationships between rural and urban communities and regions that cross physical and geopolitical boundaries (García-Sempere et al., 2018; Holt-Giménez, 2018). As such, the role of urban actors in the food sovereignty movement has been receiving increased academic attention – as eaters, food movement participants, policy-influencers and more recently, as urban food providers (Block et al., 2012; Laidlaw & Magee, 2015). As it literally and discursively occupies space in urban food politics, urban agriculture is

⁵ This chapter was published by Taylor & Francis in *The Journal of Peasant Studies* on September 16, 2020, available at <https://www.tandfonline.com/doi/full/10.1080/03066150.2020.1803842>

part of the urban question for food sovereignty and has been theorized by extending the central concepts of the metabolic rift (McClintock, 2010) and agrarian citizenship (Siebert, 2019). The *metabolic rift or rifts* represent a growing ontological space between the city and country, driven by urbanization and industrialization, which manifests as open nutrient loops (pollution and soil depletion), intergenerational dispossession from the land, and alienation as a result of disengaging with the process of creating human sustenance. Social-ecological metabolism here refers to the transformation of nature into social life under capitalism, including through agriculture. Urban agriculture can potentially close these rifts by recycling nutrients back into the food system and by reconnecting people with land (McClintock, 2010). But more importantly, urban agriculture, as part of a broader urban food politics, is a potential pathway to support the cultivation of *agrarian citizenship* – the bundle of rights and responsibilities underpinning the global food sovereignty movement. Agrarian citizenship refers to the collective *right* to engage with land in a metabolic sense (i.e., for human survival) and the *right* to dignified food provider livelihoods, with an attached collective *responsibility* to contribute to the human right to food by growing and/or harvesting food in a way that is ecologically and socially just (Wittman, 2009a, 2009b). Agrarian citizenship thus goes beyond the assertion of state-legitimated property rights to foreground cultural and place-based rights to access land for the cultivation of food and medicine.

Food sovereignty's most-cited definition is anchored in a rights discourse: "the *right* of peoples to healthy and culturally appropriate food produced through ecologically sound and sustainable methods, and their *right* to define their own food and agriculture systems" (Nyéléni, 2007a, emphasis added). Recently, the agrarian citizenship concept has been extended to the urban sphere through claims for the "right to the city" (Siebert, 2019). Lacking in this discussion,

however, is a deeper engagement with the concept of *responsibility* with respect to the links between urban agriculture (and urban people more generally) and agrarian citizenship. This paper extends the theorization of agrarian citizenship through the relational conceptualization of responsibility to engage in political mobilization for food sovereignty. First, from the perspective of urban political ecology, we examine Marx's metabolic rift as it applies to urban agriculture. Then, within the dialogue on food sovereignty, we outline the role of agrarian citizenship, paying special attention to the under-theorized concept of responsibility. We also explore how both the capacity and obligation to participate in that mobilization is mediated by privilege, defined here as material and symbolic benefits attributed to some social groups and categories of people at the expense of others. We invigorate this discussion by introducing a relational definition of responsibility, fleshed out through interviews about four land struggles with "urban agrarians" in Metro Vancouver.

Urban agrarianism is defined here to encompass an urban ethic of care for foodlands, with an associated responsibility to exercise solidarity with those who cultivate and harvest food. Urban agrarians, or people living in cities who identify as urban and are concerned with foodlands and food providers, practice a defining ethical orientation, expressed as a "concern" with sustainability, social, racial and ecological justice, and the physical and mental well-being of food providers, which include both eaters and workers as well as farmers. Urban agrarianism starts with recognition of problems caused by the metabolic rift and questions about who is responsible for closing it. This consciousness aspect of urban agrarianism can be referred to as critical food systems literacy (Rose & Lourival, 2019), and possession of this form of political knowledge itself is a form of privilege and bestows a responsibility to share it with others. Following social psychological processes of participation in social movements (see for example,

Garrison, 1992; Klandermans, 1997), this recognition can spur activity on a spectrum ranging from individual to collective in its orientation: From 1) internal thoughts (such as ruminating about the potential environmental and health problems associated with applying pesticides to food crops), to 2) expressions of those thoughts (sharing concerns with others, which also exists along a spectrum from passing mention to political formation), to 3) actions to address those concerns. These actions range from being atomized (such as purchasing organic food at the grocery store) to collective (such as participating in community-supported agriculture or organizing for a political campaign in defence of the rights of migrant farm workers).

Defined relationally (Martens, 2018; Massey, 2004), all eaters have a responsibility to the land and to food providers. While urban agrarians recognize this responsibility, what varies is the degree to which they act collectively and mobilize by claiming rights (to food, land and culture) to uphold these responsibilities. In line with social movement theories and drawing on concepts of the metabolic rift and agrarian citizenship, we suggest that recognition of a collective responsibility to foodlands and providers is a mechanism that can shift individual actions taken by people living in cities, based on their concerns for land and food providers, towards collective action and mobilization—in other words, towards participation in the food sovereignty movement. However, some social groups have greater resources to mobilize, and this difference reflects *privilege*, defined as the benefits (in the form of time, resources, connections, authority, status) that accrue to some social groups and categories of people and not others. Urban agrarians, for example, occupy different social positions in the city, which creates an unequal distribution of power and opportunity. However, it is important to note that “urban people” cannot be seen as a homogenous population and not all urban agrarians are privileged. Those with privilege have a greater responsibility to act individually – for example, by purchasing

sustainable food – and, more importantly, collectively – for example, by mobilizing to redistribute access to healthy and sustainable food (the right to food); to act in defence of food provider livelihoods (the right to dignified work); and to advocate use of sustainable growing/harvesting methods (the right to a healthy environment).

A central proposition of the food sovereignty movement is that peasants have a right to “use” land to grow food sustainably. In bringing the food sovereignty framework to urban places, this could erroneously extend to the perception that all urban people also have a right to use land for food, both in cities and by extension, in rural food-growing regions. We problematize this and suggest instead that urban people have a *responsibility* to the land, but that not all urban people have the same right to it. This is particularly true of settler-colonial contexts, where urban and non-Indigenous people continue to benefit from the dispossession and commodification of Indigenous land.

To explore the connection between land and food, privilege, and responsibility, we interviewed thirty-four leaders and organizers involved with urban agriculture in Vancouver and Richmond, British Columbia (BC), where soaring land values, costs of living, and a history of Indigenous displacement create constrained possibilities for change aligned with food sovereignty. The study participants were drawn from a community of people including urban farmers, branches of various levels of government, and advocacy, networking, and educational organizations such as the Vancouver Urban Farming Society, Vancouver Urban Farming Society, Vancouver Food Policy Council, Richmond Food Security Society, UBC Farm and FarmFolk CityFolk. The participants all self-identify as “food activists” in that they are taking specific and intentional actions to change the food system; in other words, we classify them as urban agrarians who hold concerns about foodlands and food providers and also act on those

concerns. Some of the participants are engaged in individual actions, turning to stewardship over an individual garden plot, while others are engaged in political campaigns (for example, to protect nearby farmland).

3.3 The Country in the City: Urban Agriculture and the Metabolic Rift

This paper adopts an urban political ecology perspective. Urban political ecologists problematize the distinction between nature and society, pointing out that there is no “nature” untouched by social activity; rather, society is derived from metabolic transformations of socio-ecological relationships (Heynen et al., 2006). As such, a key tenant of urban political ecology is the co-constitution of the “urban” and “rural” through social and ecological *metabolism*, placing the city and the country in co-constituting yet unequal positions. This framing has been described as the *metabolic rift*, a concept that has become central to theoretical debates on food sovereignty (Bezner-Kerr et al., 2019; Schneider & McMichael, 2010; Wittman, 2009b). Originating in the work of Karl Marx’s third volume of *Capital* (Marx, 1967) and elevated to a cornerstone in environmental sociology by John Bellamy Foster (Foster, 1999) and Jason W. Moore (2000), the metabolic rift was originally conceptualized as a rupture in the food cycle between the city and the country caused by industrialization and urbanization, where nutrients grown and harvested in the countryside would be exported to cities, ending up in sewers, landfills and waterways, instead of being returned to the soil as fertilizer. Beyond this “ecological rift” (and its twin problems of soil depletion and pollution), Schneider and McMichael (Schneider & McMichael, 2010) argue this process has also caused a “knowledge rift.” Alongside the calories being exported to cities from the countryside were generations of rural workers who migrated to urban areas, becoming socio-temporally separated from the land and losing contact with their agrarian

roots and once commonly held agricultural skills. As the knowledge rift deepens, it becomes an “epistemic rift,” or a loss of recognition of human dependence on the land and nature, and with it the capacity to imagine possibilities for building sustainable food systems. The knowledge and epistemic rifts, also conceptualized as agricultural “distance” (Clapp, 2014, 2015), hide the damaging externalities of food production – deforestation, soil erosion, pollution – from eaters through complex and obscure processes of commodification, financialization, and globalized trade, which results in and exacerbates a lack of awareness and political knowledge related to food systems.

A few comments are warranted about the use of the metabolic rift as an analytic tool. Moore (2016) identifies a contradiction in metabolic rift thinking, where authors may use the language of the rift – which implies a disruption of the dialectical metabolism connecting society/nature and city/country – despite maintaining, discursively, the very division the analysis seeks to problematize. Relational thinking is therefore a casualty of the rift; the metabolic rift, as a dualistic concept, is in turn an expression of urban modernity. Moore refers to this unreflexive practice as a “dualist practicality” and advocates instead for a shift to a “singular metabolism” that treats the commodification of non-human nature and social vulnerability to ecological conditions as part of the same unfolding process. Our intention in engaging with the notion of responsibility is, if not to dissolve, to reduce this dualism. One way to do so is to mobilize for change in the food system across diverse spatial contexts and to recognize the ways that food systems are embedded in networks of relationships and their corresponding responsibilities. In other words, one way to overcome dualistic thinking is to minimize distance by reconnecting growers and eaters (and the land on which they depend) through relational responsibilities.

Urban agriculture occupies a fertile ground for theorizing about how to close the rift. Often combined in the literature with “peri-urban” agriculture, the practice of growing food and raising animals for food in and around cities and towns is widespread and diverse. “Urban agriculture” as a term encompasses initiatives ranging from home gardening at private residences, to publicly managed community gardens, to large-scale commercial hydroponic farms. While some argue that urban and rural agriculture are different (Mougeot, 2003, p. 1), in many ways they are not – both involve relations of land, labour, and photosynthesis in the context of urbanization, globalization, and commodification (and, in many regions of the world, colonization) of land. As a growing social activity in the Global North, urban agriculture is surrounded by claims of increasing food security⁶ (Siegener et al., 2018); these claims are tempered by a recognition of the constraints of physical space available within cities for growing given current technology (Badami & Ramankutty, 2015).

Despite its limited scalability, much of the discussion around urban agriculture includes praise for its “multifunctional” benefits beyond growing food (Lovell, 2010; Valley & Wittman, 2019). Perhaps most common in the discussion about urban agriculture is its purported positive social and community effects. In a study of urban grower and farmer motivations, Dimitri et al. (2016) document diverse “social missions,” including education, community-building, and food justice. In this respect, urban agriculture has a political function. Urban agriculture is often a vehicle for land tenancy/use struggles (Jacobs, 2017; Roman-Alcalá, 2015), and visible participation in urban agriculture initiatives has been argued to empower urban people in their

⁶ It is important to note that urban agriculture is decidedly unable to make any contribution to increasing grain crop yields, so the majority of academic studies of urban agriculture focus on vegetable and fruit growing.

civic engagement in the food system (McIvor & Hale, 2015), drawing attention from political ecologists and sociologists (Davidson, 2017, p. 72).

Urban agriculture has also been examined through the lens of the *metabolic rift* (McClintock, 2010). For example, bountiful urban agriculture sites can lessen the extraction of nutrients from rural soils, and urban composting initiatives can recycle nutrients back into the food system (Bahers & Giacchè, 2018). This begins to close the classic conception of the metabolic rift as “ecological rift.” But two other rifts happen in tandem with the open nutrient loop that relate to urbanization and the commodification of land and food (McClintock, 2010). McClintock describes a “social rift” that arises as the countryside is enclosed, displacing subsistence farmers who relocate to cities primarily to fill urban factories as wage labourers (Araghi, 1995). Following the trajectory of enclosure and commodification, urban agriculture historically appeared to lessen the negative impacts of unbridled markets and scarcity by providing a necessary food source to the exploited urban poor. For example, several Western states celebrated urban Victory Gardens during times of economic crisis and World War (Mok et al., 2014). Similarly, as urbanization takes people out of the fields and into the city, each displaced farmer-turned-worker may experience an individual rift (McClintock, 2010), also called “knowledge” and “epistemic” rifts (Schneider & McMichael, 2010), in the form of alienation from their own metabolic relationship with nature. Generations of urban proletarianization thus reduces city-dwellers’ capacity for self-sufficiency, or for envisioning self-sufficiency, through food provisioning.

While urban agriculture provides an opportunity for de-alienation and some minimal levels of protection against further enclosure through occupying physical space, a question remains as to whether the concentration of urban attention inward may bottleneck or block “scale

jumping” or “rescaling” for wider food sovereignty mobilization. Immediate urban concerns related to the food system, such as overcoming constrained access to urban land or working around regulations that hinder growing food, can redirect resources (both material and discursive) from more distant problems in the countryside, such as urban encroachment into rural agricultural zones or the dispossession of Indigenous peoples from traditional territories and foodlands, and therefore can pose a threat to the development of agrarian citizenship in urban places.

3.4 Agrarian Citizenship, Relational Responsibility and Urban Privilege

While citizenship is often evoked in the Westphalian sense, referring to the conferring of rights and imposition (through a social contract) of responsibilities by a nation state, agrarian citizenship also operates outside of, and in relation to, the state (Wittman, 2009a, 2009b). As such, it engages with and expands the horizon of citizenship by incorporating a rights discourse (in terms of the right to access and provide food) alongside a set of responsibilities (to ensure the long-term viability of a particular food system by supporting, in turn, rights to livelihoods for food providers and the ecosystems that they depend on), beyond what is explicitly enshrined in national constitutions. For example, emblematic of the food sovereignty movement, the transnational peasant organization *La Via Campesina* (LVC) advocates for agroecological transitions, the creation of alternative market relations, and political action towards food system transformation (2009b). LVC reframes who has the *right* to make decisions affecting the food system within market relationships or in a given geopolitical territory from the state to the food sovereignty movement. And, as a part of that movement, the LVC has taken on a collective *responsibility* to act in defence of food, foodlands and food providers. In challenging powerful

institutions, such as nation-states and multinational corporations, agrarian citizens identify industrial capitalism as the force behind the metabolic rift, and in response radicalize a new collective political subjectivity – the food sovereignty movement – responsible for building just and sustainable food systems. Agrarian citizens thus exercise responsibility to ensure both regional and global food security and the ongoing cultural, ecological, and socio-economic resilience of their communities.

Scholars have increasingly placed *relations* at the center food sovereignty theorizing (Iles & Montenegro De Wit, 2015; Schiavoni, 2015 see also, Chapter 2). Drawing on Indigenous ways of knowing (Daigle, 2017; Martens, 2018) and the insights of geographer Doreen Massey (2004), we aim to focus here on the relational aspects of responsibility as an integral component of agrarian citizenship. In opposition to a Westphalian conception of responsibility – understood in terms of agency and actions (what people directly do or fail to do) – responsibility seen relationally stems from *who and what we are*. A relational perspective considers responsibility as an unfolding process that results from *identity*—who people are, and who/what places are. Thought of relationally, identity is not an essentialized object entirely of one’s own making but is created through an embodiment of material and social relations with diverse human and non-human others that extend across both time and space. Individuals and collective agents embody – that is, are comprised of and are (re-)molded by – those relations. As such, responsibility extends beyond the here and now; the present is borne of the past, and the passage of time shapes identities, and therefore responsibilities. This applies to the urban as space and urban people, who are made and identify as urban through relations, including metabolic relations with nature beyond the city. Below we unpack relationality, identity, and embodiment as they relate to privilege: How cities occupy a privileged place within the social and ecological metabolism (as

embodiments of the countryside), and how privilege is unequally distributed among residents in urban settings.

In political terms, cities are privileged over the countryside through an “urban bias” (Lipton, 1977), with developed states allocating more resources to cities in “a parasitic relationship” between urban and rural (Kelly-Reif & Wing, 2016, p. 350). Urban dwellers do not necessarily, on a per capita basis, carry more responsibility than rural peoples for harms caused to others (human and non-human) in sustaining their metabolism. However, cities are places where class privilege, nature transformed into commodities and flows of capital concentrate. With respect to food in particular, since no viable technology currently exists to allow urban settlements to internally provide the requirements for their own sustenance, people in human settlements at all scales are brought into their relational and metabolic responsibility for the impacts of growing, harvesting and eating beyond urban physical boundaries. So, while of course not entirely due to urban people and cities, global environmental harm is largely and increasingly tied to urban demands, especially with respect to the massive ecological footprints of the urbanized Global North (Rees, 1992).⁷

What does this mean for theorizing the responsibility component of agrarian citizenship? Urban political ecology already offers a historically and spatially relational perspective, as the metabolic rift orients us to processes of enclosure, commodification, industrialization, and urbanization and how they have shaped cities and the landscapes on which cities depend. As an embodiment of those processes, a relational definition of responsibility positions cities and urban

⁷ Inequality between cities also creates differential responsibility at the global scale, where northern cities embody more of the world’s wealth and therefore share more of the global responsibility for closing the rift; however, this discussion is beyond the scope of this paper other than to note that Vancouver in particular is a global city embodying a relatively large proportion of global wealth and therefore responsibility.

people as holding responsibility for causing metabolic rifts in the food system, and similarly positions urban people as responsible for closing them. And, if we take the urban and rural as mutually constitutive and bound together in a metabolic symbiosis, harms that result from the metabolic rift (such as Indigenous dispossession, the erosion of rural livelihoods and ecosystem degradation) are not “rural” or “urban” issues separately. If a responsible actor is one that does no harm to itself or others, cities and urban people also have a responsibility – alongside other agrarian citizens – to engage in political activity guided by principles of ecological and social justice aimed at building just and sustainable food systems.

But while cities and those who live in them should be responsible for closing the rift, not all urban people are equally responsible. As conceptually opposite from social marginalization, *privilege* has become a core topic in critical race and feminist thought, broadly defined as a beneficial resource, symbolic or material, available to some but not others, where access or exclusion is determined by one’s class, race, gender, ability, sexuality or other identity category, or the intersections therein (Crenshaw, 1991). Privilege therefore is a product of the relations that shape peoples’ identities across time and space, and given the distribution of privilege in cities, urban people have an explicit responsibility to mobilize for food sovereignty in two senses: First, urban dwellers, due to their spatiotemporal location and supporting infrastructure, have disproportionately accumulated the benefits of the metabolic exchange between humans and nature. Second, by virtue of the unequal distribution of opportunity (and capacity to act), some *particular social groups within cities* have disproportionately accumulated the benefits of the metabolic exchange.

3.5 Metro Vancouver's Urban Agrarians

The agrarianism that emerged in the 19th century was a cultural philosophy prevalent in Europe and the United States that valorized the self-sufficiency, self-reliance and simplicity associated with rural life (Carlisle, 2013). Today, a “new” agrarianism has emerged across Europe and North America, exemplified by support for groups that aim to protect farms from encroaching urban sprawl as well as support for community farming and sustainable agriculture (Wittman et al., 2017). This new agrarianism has a distinctly urban dimension. Hints can be found in urban local food initiatives, policies, and markets: Urban composting programs recycle food waste into community and school gardens; eaters seek food labelled as local, ethical, and responsible; urban food policy councils put food planning on the agenda for urban governance; screenings of documentaries and other public events in urban contexts explore overuse of pesticides and their impacts on surrounding ecosystems. This much is clear: The urban consciousness is increasingly attuned to the contemporary ecological, social and health dimensions of food.

While agrarian citizenship is a feature of collective subjectivities and social movements, such as *La Vía Campesina*, that act on their responsibilities to the land by mobilizing rights discourses, urban agrarianism is also expressed at the individual level. Urban agrarianism falls along a continuum of concern and action that ranges from individual subjectivity (e.g., “I buy organic food,” “I tend to my garden” to collective subjectivity (“We are responsible for land and for food providers”). The urban agrarians interviewed for this project used collective (we) statements, but more often expressed individual (I/me) statements in describing their relationship to food providing lands and responsibility for protecting them. Further, urban agrarianism covers different degrees of radicalism, marking a difference between urban agriculture as a nascent

movement and the well-articulated agrarian movements of the Global South, a tension captured by one urban agrarian:

You know, [urban agriculture is] kind of like a surface food movement. [...].

It's more like a hobby movement [...]. I mean there is a movement, but it's not as radical as I would hope it would be (2018).

Urban agrarianism is therefore conceptualized here as a prerequisite for agrarian citizenship in cities. The argument we advance is that recognition of collective responsibility among urban agrarians is a necessary condition for the development of agrarian citizenship and thus for sustained mobilization in the food sovereignty movement. As such, urban agrarianism, in its individual and collective expressions of responsibility, prefigures collective action as an urban contribution to the food sovereignty movement.

Examples of urban agrarianism are found throughout British Columbia's Lower Mainland, in rural, urban, and peri-urban areas. With a growing season from March to November, this region hosts some of the province's best agricultural land, population, and markets (Fraser Valley Regional District, 2017), making it something of an agricultural paradise. Rich soils surround the banks of the Fraser River, bordered by mountains to the north and east, the Pacific Ocean to the west and the United States to the south. Two cities in the area offer useful sites for exploring the emergence and function of urban agrarianism: Vancouver and Richmond. Emblematic of Canada's so-called multicultural society, 43% of Vancouver's 631,486 residents, and 60% of Richmond's 198,309 people in 2016 were immigrants (Statistics Canada, 2017). Vancouver sits on a land base of 115 km² (Statistics Canada, 2017), with a median total income of CAD \$79,930 per year – one percent below the national average (Statistics Canada, 2016). This stands in stark contrast to residential land value, which, for

detached homes, is around triple the national average in east Vancouver and in Richmond and is five times the national average in Vancouver's western neighborhoods (Association, 2018; Vancouver, 2018). With the cost of living among the highest in the world, Vancouver was named the most unaffordable city in Canada by *The Economist* (The Economist, 2017).

In 2016, the Vancouver Urban Farming Society published a census taking stock of the extent of food grown in the city (Crowe et al., 2017) that listed 13 farms as generating \$746,000 CAD in revenue from food sales within the city centre – a fivefold increase in sales since 2010. In contrast, Richmond has 211 working farms within the city limits (City of Richmond, n.d.-a). Both cities have a food policy council; formed in 2004, Vancouver's was one of the first in Canada. Similarly, both cities have mandatory residential kitchen and yard waste pick-up and composting facilities and municipally supported community-garden networks. Lastly, of note is Vancouver's proposal to become the world's "Greenest City" by 2020 (City of Vancouver 2012), with an action plan containing multiple references to creating a more sustainable food system, among them calls for enhanced urban agriculture in the city.

We want to highlight three points that are crucial to understanding the politics of urban agriculture in this region. First, British Columbia's entire geopolitical history is one of violent land appropriation. Metro Vancouver is situated on Coast Salish land, including the traditional territory of the xʷməθkʷəy̓əm (Musqueam), səɫɪlwətaʔɪ (Tseil-Waututh), and Skwxwú7mesh (Squamish) First Nations, containing dozens of Indigenous groups, spanning both western Canada and the United States. In BC, this land is predominantly unceded – it was settled despite not meeting the requirement enshrined in the Royal Proclamation of 1763 for the Crown to negotiate treaties with Indigenous Peoples, and was not part of the 11 Treaties signed in other parts of Canada. Second, Metro Vancouver has a distinctly "agriburban" character (Newman et

al., 2015). Early agricultural settlers have, over the past century, witnessed urban sprawl swallow the land around them at an alarming rate. To prevent further sprawl, in the 1970s the BC government enacted the Agricultural Land Reserve (ALR) to protect about 4.6 million hectares of farmland in British Columbia (Provincial Agricultural Land Commission, 2014).v Lastly, all urban and peri-urban space in Metro Vancouver is commodified, and as property it commands incredibly high monetary value. Current residents are increasingly feeling pressure as communities gentrify, costs of living go up, and profits from housing development led to speculation in farmland prices. It is in this context of contested land that we explore the relationship between privilege, responsibility, and urban agrarianism as a potential precursor for agrarian citizenship and collective mobilization for land and food sovereignty.

3.5.1 Methods and Approach

In theorizing agrarian citizenship in urban contexts and identifying the role urban agrarianism plays in the food sovereignty movement, we interviewed thirty-four leaders in the urban agriculture movement in Vancouver and Richmond (henceforth referred to as “urban agrarians”) between December 2017 and April 2019. The interviews were contextualized by document analysis. They were identified online and through key informants, and included farmers, social movement organizers and educators, policy experts, nutritionists, and gardeners.⁸ While not representative of all members of the regions food movement, the participants all self-identified as progressive “food activists” in that they wanted to change the food system to increase sustainability and equity. As one urban agrarian stated:

⁸ The names of interviewees have been omitted to protect the identity of the participants and the organisations with which they are affiliated, as per university ethics guidelines.

I come from a background, or like a paradigm of ecological sustainability concerns. I've long been an environmentalist and an activist in the sort of more, I guess, general environmentalism. When I came to the intersection of food and ecological activism through urban farming, that was relieving for me; I found a place where I could kind of focus my energy and put my time and my effort and some of my skillset to see some sort of tangible change (2017).

Some of them are engaged in individual actions, turning to stewardship over an individual garden plot, others engaged in political campaigns to protect nearby farmland. Participants talked about their visions of a sustainable food system, and the struggles and barriers they see along the pathways available to realizing this vision. Drawing on the interviews, we argue that, owing to their relational responsibility, urban people, especially those with privilege, should recognize the harms caused in the process of their social and ecological metabolism, and mobilize for land and food sovereignty, including for the repatriation of stolen lands lost to colonial dispossession.

3.5.2 Urban Agriculture and Agrarianism, Part 1: Literacy and Visibility

Urban agriculture represents an important area for studying urban agrarianism and therefore for theorizing agrarian citizenship in urban areas. This section addresses its twin functions of cultivating food literacy and raising the visibility of food systems issues in urban environments in reducing the knowledge and epistemic rifts.

A fundamental condition for the possibility of citizenship is knowledge and education (Marshall, 1950, p. 25). In the case of agrarian citizenship, urban agriculture can be thought of as a source of food literacy: Learning about where food comes from, as well as necessary food-growing skills (Powell & Wittman 2017; Widener & Karides, 2014). People in cities are

increasingly detached from nature (Lin et al., 2018), and participants variously described how joining a community garden, visiting an urban farm, or attending a food-growing workshop leads to a sense of appreciation of nature, land and food that is otherwise inaccessible to urban residents. As one urban agrarian noted, urban agriculture

has an education component and I think that's probably the main thing that's going to happen [with growing food] in the city. If you're able to educate people about what they consume and where their food comes from and how their food grows and what the environmental impacts of what they eat are, that's a big one (2017).

The act of growing food makes possible a broader understanding of the labour and price differences between conventional and ecologically-grown foods, an understanding of the role healthy ecosystems play in growing food, and also a sense of empathy with rural farmer struggles, especially related to land access – a major challenge for agriculture in urban and rural places alike. However, the pathway from an urban garden to “critical food system literacy” (Rose & Lourival, 2019) that recognizes inequities and ecological harm upstream from the point of consumption has its limits, owing to dramatic differences in growing experiences. As one participant emphasized: “I don't think someone's experience growing food in a community garden plot allows them to understand what it would be like to be a precariously employed migrant farmer” (2018). That said, the food literacy contribution of urban agriculture is complemented by the role urban agriculture plays by, in one participant's words, bringing “food production to the front of the mind” (2018). In this way, urban agriculture – in front yards, on rooftops, in community orchards, in public parks – gives issues related to food and agriculture more visibility. As such, the practice of urban agriculture contributes to closing the knowledge

and individual rifts through enriching food literacy, bringing to light problems in the food system as a reminder of urban responsibility to respond to those problems. As this community farm organizer notes:

So, for anyone who hadn't thought about [farmer livelihood struggles or agriculture's dependence on petrochemicals], but then interacts with an urban farm and – just gains the greater understanding of those issues. I think that once you know that stuff you can't unknow it (2018).

3.5.3 Urban Agriculture and Agrarianism, Part 2: Responsibility, Privilege and Mobilization

Urban agriculture, and the food system visibility and literacy it brings with it, is embedded within a regional network of organizations with a range of mandates and goals who variously engage with growing food alongside other areas of focus, such as climate change, affordable housing, conservation, and urban greening. Through this extended network, urban people in the region come to growing spaces to connect with others and nature, and in the process raise the profile for the urgency of food systems challenges alongside other social issues, and therefore serve as a conduit for mobilizing urban people into food systems struggles.

However, it is also important to recognize that not everyone engaged in these networks are equally positioned to engage in social activism. Many of the people in Metro Vancouver who grow food fall into one of three categories: 1) Those privileged enough to have the time and energy to spend time growing food, not out of necessity but for enjoyment; 2) those struggling to earn a living by selling food to those with privilege; or 3) those who have been “responsibilized”

to feed themselves in the face of poverty or social marginalization. As one urban agrarian pointed out,

class [causes] the inaccessibility of some of the food...and it's a luxury to say "I'm a small-scale farmer. I'm from upper middle-class white family so I can take these risks" and be like, "I'm going to be a farmer and be a farm apprentice and only make \$500 a month." That's something that I can do because of my background, class, race (2018).

Then there is the additional division between those with the privilege of having access to land to grow food and those who do not, albeit access to land is usually precarious and must be maintained through ongoing efforts. Further, those who have access to land might not have the privilege to engage in political activism as it may endanger their tenure. As such, urban agriculture as an activity is imbued with privilege, exclusion, and inequity. Therefore, the responsibility to engage in social mobilization does not fall on the shoulders of all urban agrarians equally, as many experience economic marginalization and other constraints as a major limitation to wider political engagement. As one urban food justice organizer notes,

We need to acknowledge that a lot of us live a life of privilege – that we have transportation, we have language, we have the economic means to go a Farmers Market. Time is an issue for a lot of people, and sometimes just the grocery store on the way home is the reasonable solution until finances, time and life situations change (2018).

Urban agrarians recognize an unequal distribution of power resulting from class position and race in particular, with several respondents noting white privilege and the “whiteness” of the

urban food movement in BC – something that has increasingly been the topic of ongoing discussions among food activists in the region (Gibb & Wittman, 2013; Ostenso et al., 2020; Weiler, 2014).

Further, urban agriculture can serve to demobilize urban agrarians from more distant food sovereignty struggles. This results from directing responsibility inward (rather than outward) in a number of ways. First, urban agrarians feel responsibility for specific food-growing spaces, claiming responsibility to steward urban sites to the neglect of other food providing lands. Second, urban growers frequently arrive at food-growing as a result of health concerns, and claim responsibility for health by growing healthy food for themselves, their families, and immediate communities – but rarely as a general concern for wider communities. Just as with community-supported agriculture (CSA) that connects eaters to rural farmers, urban eaters who purchase through urban CSAs claim some responsibility to support their urban farmers. In these examples, claims of responsibility are largely individualized and market oriented.

To explore these dynamics, we analyze four different land struggles connected to urban agriculture discussed by interviewees: 1) in Vancouver, 2) in/around Richmond, 3) beyond Metro Vancouver and 4) territorial struggles for Indigenous food sovereignty. These are meant not as representative cases, but as examples raised by interview participants that together trace a narrative about urban people acting on their responsibility to mobilize for food sovereignty.

3.5.4 Access to Land for Urban Agriculture in Vancouver

Secure and long-term land access is a major challenge for people engaged in urban agriculture, especially in the context of land speculation. Competition for use of urban space is visible in the tenuous leasing arrangements for urban farmers. As one urban farmer who rents space on

residential and commercial land lamented, “in the urban agriculture scene, we’re also susceptible to developers who can just come at any moment. For example, two of our lots got sold last year” (2018). Urban agriculture sites are typically on short-term leases, often signed when land is awaiting residential or commercial development. Decommissioned gas stations and vacant lots destined for mixed-use residential developments host temporary community gardens, like those managed by the social enterprise Community Garden Builders, formerly Shifting Growth (Gold, 2017). Community members gain access to temporary garden space and development corporations receive tax breaks by converting the property from a commercial land class to a garden or public park class. The gardeners who participate are contractually obligated to vacate the premise within 30 days of notice from the property owner (ibid). As one peri-urban farmer and community-organizer stated,

there are a lot of perks for developers to sit on land, or at least while it’s being remediated, [and] for them to put an urban farm on that space while they wait. Yet the city doesn’t consider property tax breaks or anything like that for residential people who want to increase food production in their environment (2018).

Sharing land access through collectives or cooperatives where resources are pooled to secure growing space, especially where solo farming is prohibitively expensive, is one way that some urban farming initiatives have adapted to the challenging circumstances faced by people looking to grow food in the city. For one farming collective, sharing land purchased as a group of farmers was “an entry point”:

It was something that was accessible. It did cost us a fair amount. It cost us a year’s worth of profit, essentially. But it’s not like trying to buy land in this

province and being a young farmer with next to no capital and trying to be entering that way (2018).

Urban farming has adopted a range of solutions to limited land access and the impossibility of purchasing land to grow food as part of their struggle to obtain land access. For instance, in Vancouver, *Inner City Farms* operates a network of garden sites in front and back yards on land leased or bartered from homeowners and local businesses (Inner City Farms, 2015), and *Sole Food Street Farms*, which has an organizational commitment to hire economically disadvantaged residents of Vancouver's core urban neighbourhoods, leases large tracts of land and physically relocates its entire operation, which includes an orchard with fruit trees in individual plastic bins, to new sites as necessary (Sole Food Street Farms, 2016).

3.5.4.1 The Responsibility to Mobilize for Land in Vancouver

While there is public support for maintaining green space in Vancouver, the story is usually the same when it comes to land access conflicts between urban agriculture and property development: The gardens are relocated, often to a less desirable location, or simply destroyed. One notable exception is the Save the UBC Farm campaign, where in 2008, a student-led struggle successfully opposed the relocation of a 24-hectare teaching and growing space when the area, located on the University of British Columbia's (UBC) main campus in Vancouver, was slated for condo development (UBC Farm, n.d.). The proposal was to move the farm to another, much smaller site with lower quality soil. The conflict between the farm and the University centred around the question as to how the farm served the interests of UBC as opposed to broader community concerns about green space and foodlands preservation. A student club, Friends of the Farm promoted "Save the Farm" awareness-raising events and demonstrations,

coordinated speeches at food security events and garnered support from researchers, the surrounding residential community who had been purchasing their produce, regional Indigenous representatives, and a wide range of public figures (Bomford, 2011). In the midst of a municipal election, candidates made pledges to support the farm. Press conferences were held, and a petition collected over 16,000 signatures. The mobilization culminated in a 2000-person march from the student union building down to the farm in April of 2009. Ultimately, the campaign in defence of farmland inside the city was successful through bringing together a coalition of community interests, with urban people variously related to the farm claiming responsibility to save it. However, stories like this one tell us very little about urban responsibility for spaces and ways of thinking that are more ontologically and epistemically distant. As one urban agrarian pointed out,

there's such a rural/urban divide in my mind, there is such a binary, when in reality it's really not [like that]. Land is land, and farmland is incredibly difficult to attain anywhere in the Lower Mainland (2018).

3.5.5 Land Struggles in and Around Richmond

In Richmond, the suburban city most adjacent to the city of Vancouver, another land struggle in defence of farmland is underway, sharing urban and rural characteristics. As one representative of a food justice organization stated,

[We] will continue to support urban agriculture; we think that it's really important to have local food being grown in the best soil in Canada right here in Richmond. And we need to preserve as much farmland as we can to be able to do that (2018).

This quote comes from a discussion of the Agriculture Land Reserve (ALR), the unique land zoning policy that politicizes and mobilizes action for land struggles in Metro Vancouver. The ALR contains about 39% of the City of Richmond's land (City of Richmond, n.d.-a) and is an important reference for encouraging urban people to care about agricultural land. As one community organizer noted,

In British Columbia, we've got the ALR, and we managed to get a sufficient number of people who understand the concept of the ALR. It's still really difficult to hang on to it. But enough people understand that there is wide support for it conceptually. So just having that gets people to think about farmland (2018).

The ALR is a province-wide zoning instrument in BC that restricts use and building on prime agricultural land. One example of an urban struggle over ALR land is the story of the Garden City Lands, a 55-hectare tract of ALR land located just a few blocks from Richmond's urban centre (City of Richmond, n.d.-b; Newman et al., 2015). These lands, as a small portion of the broader traditional territory of the Musqueam Nation, was transferred to the federal Canada Lands Company in 2005 who held the land in trust for Musqueam as a joint owner. In 2008, the City of Richmond offered to buy some of the land and agreed in an MOU with Musqueam that it would submit to the BC Agricultural Land Commission to withdraw the land from the ALR so it could be developed for residential, commercial, and industrial uses to the benefit of all parties. Two attempts at withdrawing the land from the ALR failed after attracting significant pushback from the urban community, including the Save Garden City Lands Coalition which put forward substantial documentation protesting the application to rezone the land. In 2009 the City of Richmond purchased the entire tract for \$59.2 million, with no clear intention for the land, but

under the assumption that it would remain in the ALR. Musqueam and the Canada Lands Company split the proceeds of the sale. Part of this land is now being used for a farm school at Kwantlen Polytechnic University, with the rest designated as a protected wetland and public park. Following the sale of the land in 2009, the Musqueam Nation submitted a legal claim in 2010 to the BC Supreme Court arguing that the pre-existing MOU, which “was based on the removal of the Lands from the ALR” was ignored, and that as such the transaction was made under duress, resulting in a financial loss. Their claim on this land remains open at the time of writing and demands all of the land be returned to the Band along with “other relief as [the] Honourable Court deems *just*” (Supreme Court of British Columbia, 2010). In an article publishing responses to the question “Are settling Native land claims and preserving the Agricultural Land Reserve mutually exclusive goals?” Ernie Campbell, then-chief of Musqueam, responded:

“We didn’t put it [the Garden City Lands] in the Agricultural Land Reserve,” Campbell said. “They put it there without any consultation with us, the same thing they do with creating parks – when they create parks in our traditional territories, and they say, because of the parks, we have no access to them” (In Pablo, 2008).

The Garden City Lands illustrate the multi-faceted conflict(s) between Indigenous sovereignty, residential and industrial development, and European agrarian values expressed in this instance as “farmland preservation,” noting that this area’s history of farming is very new in the region’s biocultural history, at only a little over a century old (Newman et al., 2015, p. 104). Yet another driver is financialization of the land, expressed most visibly as some landowners in Richmond’s ALR began to build “mega mansions” (giant dwellings reaching 20,000 square feet). The

commonly held concern was that these houses were being built under the assumption that the land that they are constructed on will later be withdrawn from the ALR. This has driven the value of the property up considerably, making it inaccessible to farmers that want to utilize it for food growing, including urban farmers.

3.5.5.1 The Responsibility to Mobilize for Land in Richmond

In a public hearing on a municipal by-law amendment to restrict house sizes in Richmond to 400 m² in November 2018, an organizer for the social movement FarmWatch wrote a submission explaining that non-farmers will mobilize collectively to save farmland in the interests of the food security of future generations (Gillanders, 2018). FarmWatch has been a vocal opponent of housing development in the area through social media (Wood 2017). As a member of a food justice organization noted,

We are a part of FarmWatch and are keeping an eye on these giant houses that are being built on farmland and of course the land is not being farmed because nobody can afford it anymore. So, we do advocate for *the preservation of the lands that we have*, and we'll continue to do that (2018, emphasis added).

Urban agriculture plays a role here, as another peri-urban farmer highlighted: “We’re having a major battle in Richmond... it’s all the urban agriculture people who are the most vocal in terms of stopping the big houses” (2018). However, where land tenure is precarious for urban farmers relying on year-to-year leases or bartering arrangements, public demonstrations in defence of land are not always possible for fear of retaliation by landowners. This makes relatively anonymized social media networks very useful, as farmer activists can air their grievances without exposing their identities as contrarians or radicals in opposition to “private property.” A

number of participants mentioned that the tenuous leasing arrangements can limit urban agriculture participants from publicly protesting, with one land-owning farmer remarking:

The people who want to farm don't protest anything publicly because they're trying to lease from [urban and peri-urban home and landowners]. So, it's up to the urban population, the urban non-farmers that are concerned, to get the message across, and that's sort of what it's all about right now. But once we get the legislation changed then hopefully young people will be free to lease the land and not be afraid of losing the lease if they say something (2018).

The Richmond Zoning Amendment Bylaw 9965, which came into effect in February 2019, now restricts housing footprints on ALR parcels to 400 m² and is smaller than the province-wide regulations of 500 m². With this policy victory, which owes itself largely to the campaigning of farmland preservation advocates (including urban farmers) as well as urban homeowners who reject “mega mansions,” the loss of farmland to mansions in the ALR may slow down for the time being – perhaps giving activists time to redirect attention to farmland defence elsewhere.

3.5.6 Responsibilities to Mobilize Beyond Metro Vancouver

The Farmland Defence League of BC, another social movement network involving many urban agrarians in Metro Vancouver, has played a significant role in marshalling urban people to protest against the hydro-development project known as Site C, which some agronomists have estimated will flood or otherwise impact 12,000 hectares in the Peace River Valley in northeastern BC (Holm, 2014)—an area over twice the size of all ALR land in Richmond. Not only is this prime agricultural land, it is also critical habitat for traditionally significant animal and fish species on which Indigenous peoples in the community depend. Whereas the Save UBC

Farm and FarmWatch campaigns address issues that are spatially and temporally immediate to urban dwellers in Vancouver and Richmond, a further epistemic gap confronts participants on issues that are geographically more distant, such as Site C, over 1000 km from Richmond. As a peri-urban farmer and respondent noted,

Participant: That's the problem with Site C, it's so far away that we don't get the same support for trying to save farmland up north[-eastern BC]...people just don't get that...But we can see [Richmond's mansions], and people look at them and they hate them.

Evan: So how do you get people to care about issues that are less immediately visible?

Participant: The only way, I think, is we're going to [need to] watch the price of food go up. By that time, it'll be too late for Site C, but it may get the message across (2018).

This speaks to the key challenge of “jumping scales” in overcoming social and epistemic rifts. Scale jumping in this context refers to the rescaling of the area for which urban agrarians feel responsible, and the area over which they believe they hold agency capable of affecting change – from the local and urban to the extra-local and rural. Whether or not urban agrarianism translates into politicized action, therefore, varies based on a number of factors, including the perceived immediacy of the concern and proportionately scaled social networks that provide a mobilization function. And while the effectiveness of urban agrarianism can translate to mobilization at

different scales under some circumstances, these land (as in property) struggles all happen within the context of not only a historical process of land commodification, but also a colonial project of dispossession. On this front, the historic passage of Bill 41 in late 2019 legislates the United Nations Declaration on the Rights of Indigenous Peoples into British Columbia law and puts the ALR – as a mechanism institutionalizing dispossession in the form of farmland protection – on notice.

3.5.7 Reciprocity, Responsibility, and Indigenous Food Sovereignty

Between 2008 and 2015, the Truth and Reconciliation Commission (TRC) of Canada brought long overdue attention in the public sphere to many of the violent legacies wrought by the state colonization program inflicted upon the original inhabitants of Turtle Island (now North America) including loss of territory, language, and culture through forced assimilation (Truth and Reconciliation Commission of Canada, 2015). It is now commonplace to acknowledge Canada's First Peoples and traditional territory at any formal gathering, as one of the central harms of colonization included the relocation of Indigenous peoples to reserves and the privatization of ancestral – and in the case of British Columbia, unceded – lands. For example, the City of Vancouver officially voted to recognize that it “was founded on the traditional territories of the Musqueam, Squamish and Tsleil-Waututh First Nations and that these territories were never ceded through treaty, war or surrender” (City of Vancouver, 2014). Yet, Indigenous people have still been fighting for their lands in the colonial BC court system for over a century, with unsettled land claims worth hundreds of millions of dollars. As such, urban and peri-urban agriculture alike in Metro Vancouver are part of an ongoing occupation of sovereign Nations. As one urban agrarian who grows vegetables for sale in Vancouver uncomfortably acknowledged:

These are homeowners' lands. But really this is unceded territory. It's a territory piece, I think. Then there is this weird piece that exists for us in the city, having private ownership over land and then us trying to use that space in more of a sharing-economy sort of way (2018).

Concepts of responsibility and relationality are not new to the BC context, where the Working Group on Indigenous Food Sovereignty (WGIFS) has been actively working to decolonize the food system, taking "Responsibility and Relationships" as the title of a recent project towards this end (Morrison & Brynne, 2017). Land occupies a central role in colonizing processes, and considering land as property amenable to private ownership runs against an Indigenous land ethic, which Dawn Morrison, coordinator of the WGIFS, states

does not view the land and food system, or any part thereof, as a commodity to be bought and sold in the market economy, nor do we view it as a "resource" or "product" to be exploited for external means. Based on values of interdependency, respect, reciprocity, and ecological and cultural integrity, an Indigenous land ethic views humans as a part of nature and not separate or dominant over it (Morrison, 2015).

This raises a challenge for urban agrarians with respect to their responsibilities as actors who take part in the ongoing occupation of stolen lands (Kepkiewicz & Dale, 2018).

Healthy land (and access to and care for it) is central to Indigenous ontologies, and Indigenous sovereignty struggles play out in the different ways that communities assert their rights and responsibilities over land. In land-based communities, this includes the right to grow and gather traditional foods in traditional territory, which often means access to uncontaminated,

non-urban ecological spaces. But there are reasons that Indigenous communities may see a benefit to urban lands as places where Indigenous culture and intergenerational learning and relationships can grow and be maintained, especially for urban Indigenous residents. Some community-based initiatives at UBC Farm – such as the Tu’wusht Garden Project, Tal A’xin: Maya in Exile Garden, and x^wçicəsəm, an Indigenous Health Research and Education Garden that hosts the Culturally-Relevant Urban Wellness (CRUW) Program – provide modest examples.

While falling undeniably short of returning legal sovereignty to dispossessed First Nations, urban agriculture initiatives on colonized land can potentially offer a space to cultivate limited forms of decolonization, as actions of political formation aimed at the dismantling of colonial structures. It can also provide space for Indigenization, or the centering and valuing of Indigenous peoples, worldviews, and cultures. In the context of urban agriculture in Metro Vancouver, decolonization and Indigenization must work relationally, between urban Indigenous peoples and traditional territories, both urban and distant, and between urban Indigenous and settler members of the broader food movement. For example, urban agriculture sites run by, for and with Indigenous peoples can foster Indigenous food and cultural traditions and relations. This happens in the context of traditional naming of spaces (as in the case of the x^wçicəsəm garden at UBC Farm, a Musqueam name gifted to the space that means “The place where we grow”) and by creating Indigenous food systems in cities through traditional harvesting, trading, and gathering traditional foods in parks and urban green spaces (Manson, 2019). These examples are land-based, grassroots, and organized around enacting a relational responsibility to remediate the harm caused to ecosystems by cities, and provide spaces where relationships to the land and living things can be re-established and nurtured. Further, these spaces can also serve as

opportunities to build urban non-Indigenous allyship alongside food system literacy in urban gardens organized by Indigenous communities.

It is clear that Indigenous people feel and act on relational responsibility. In the words of Cree scholar Tabitha Robin Martens,

I believe that our people are paving the way, fighting the good fight towards making other people accountable to our collective need for clean water, soil, food, and air; but there is much work to do. Access to clean water, soil, food and air is our need and our right. We have a right to practice our culture. Moreover, we have a responsibility to practice our culture. We have a responsibility to protect the land. When we harvest, we do so as a responsibility. When we stand up for the loss of traditional lands, for the contamination of water, for the high rates of diabetes and cancer that are tied to our food systems, we do so because we have made a deal with creation. For every gift given, we offer back. We ensure the future of our food systems through careful and sustainable practices; through harmony with our surroundings. We have been born into that responsibility. It is part of who we are (Martens, 2018).

But the TRC has also charged settlers with the responsibility to act in a number of ways, including a commitment to respecting the broad rights provisions that would be enshrined through the TRC's recommendation to adopt the United Nations Declaration of the Rights of Indigenous Peoples. Canada finally did this in 2016, almost a decade after it was adopted by the General Assembly of the United Nations and which, while passed into law in British Columbia in 2019, remains legally non-binding at the national level. This extends to settler responsibility to

respect, but to also protect, traditional food systems, traditional foodlands and ecological systems that provide for traditional foods.

While urban agrarians can demonstrate care for land and food providers about land and food providers, recognition alone is insufficient. The TRC calls for “awareness of the past, acknowledgement of the harm that has been inflicted” but also “atonement for the causes, and action to change behaviour” (Truth and Reconciliation Commission, 2015, pp. 6–7)—anything less perpetuates colonial injustice. Further, if that action does not support decolonization, it risks making a “spectacle” out of reconciliation (Daigle, 2019). As such, Canada’s ongoing colonial history problematizes any settler claim for the “right” to use agricultural land, and therefore confers responsibility for urban settlers to mobilize in defense of not just land and food sovereignty, but also for Indigenous food sovereignty and decolonization. Decolonization in this context is decidedly not a metaphor (Tuck & Yang, 2012) but refers to the repatriation of Indigenous lands and respect for Indigenous self-determination and governance.

3.6 Conclusion

Closing the metabolic rift requires the enactment of sustainable *and just* food systems: food systems that recycle nutrients, are not based on dispossession, and that connect providers and eaters. For example, the work of Rachel Bezner Kerr and colleagues (2019) in Malawi examines how closing the metabolic rift through agroecology requires intersectional attention to not only agroecological growing methods, but also to class inequities and gender inequality. To fulfill their obligations as agrarian citizens and reduce injustices in the food system, privileged urban people must act on their responsibilities for closing the rift and mobilizing for food sovereignty. The food sovereignty movement and its efforts to close the rift, while originating in transnational

organizations representing mostly agrarian movements from the Global South, has spread to Canada (Desmarais & Wittman, 2014), with distinct expressions across rural and urban contexts. The National Farmers Union of Canada, a founding member of *La Vía Campesina*, is a key global actor in advancing the food sovereignty discourse in Canada, but remains primarily engaged with rural populations. Other national food organizations, such as Food Secure Canada, have worked primarily with urban actors and organizations to embrace the language of food sovereignty in their policy work for sustainable and just food systems (Desmarais & Wittman, 2014). Increasingly, important and challenging conversations are happening in food sovereignty organizations about the colonial project that defines Canada's history, seeking to support Indigenous food sovereignty and to decolonize mainstream food systems and historically settler-led projects for food systems change. This already-emerging dialogue is a critical opportunity for questions of responsibility and privilege to inform the vision for food sovereignty in the Canadian context, which is now – but not without shortcomings – taking place in organizations like Food Secure Canada's Indigenous Circle and the National Farmers Union's Indigenous Solidarity Working Group. But there remains a long way to go in recognizing limits to the current approaches to settler-Indigenous alliance-building in the context of Canadian agriculture and food systems – both urban and rural. This analysis suggests some ways forward in thinking about how urban food politics, through the concepts of responsibility and privilege, could interface with these collective subjectivities and feed agrarian citizenship in the food sovereignty movement.

As a global movement, food sovereignty was always only possible through the interconnections between urban and rural in the articulation of a vision for social change. As noted by Paul Nicholson, *La Vía Campesina* organizer:

Food sovereignty was not designed as a concept only for farmers, but for people — this is why we call it peoples’ food sovereignty [...]. We’re talking about identifying allies, developing alliances with many movements of fisher folk, women, environmentalists and consumer associations, finding cohesion, gaining legitimacy, being aware of co-optation processes, the need to strengthen the urban-rural dialogue... (in Wittman et al., 2010, p. 7).

Urban social movement actors, policy allies, urban and rural food providers and a general concerned public are all contributors to this movement, and urban participation is key. But beyond that, widespread urban responsibility for radical food system change is also key to advancing the food sovereignty movement, especially among those privileged enough to have the capacity to act.

To summarize, the following thoughts can be drawn through the lens of urban political ecology about the roles urban agriculture and urban people can play in food sovereignty mobilization. Urban food growers in Metro Vancouver claim responsibility over “their” space – and under threat of dispossession, many urban agrarians are involved in an ongoing fight to protect future access to farmland, especially in Richmond. In some circumstances, urban agriculture sites also can provide a space for decolonization and Indigenization initiatives for those who spend time there. It may be unreasonable to expect urban agriculture to go beyond this in terms of advancing food sovereignty goals, but under some conditions it has. In the Save UBC Farm campaign, thousands of people claimed responsibility for an urban farm with a mandate for food literacy, forming relationships with farmers, policymakers, and Indigenous representatives in the process that extended long past the initial farmland preservation challenge. The FarmWatch campaign was comprised of a network of urban activists claiming responsibility over

foodlands on in and on the periphery of Richmond, and those involved in that fight are now beginning to turn their attention to land in the Peace River Valley under threat by the Site C hydroelectric dam development proposal. The Site C campaign is a case where farmers, foodies and First Nations have come together in a foodlands protection struggle that acknowledges Indigenous land and food sovereignty (Morrison & Wittman, 2017). In these land struggles, settler urban agrarians with different forms of privilege have acted on their responsibility to foodlands and, by extension, to food providers. Often, the urban agrarians who contribute to these mobilization efforts have roots in networks connected to urban agriculture, and as such, urban agriculture offers something of a gateway to food sovereignty mobilization. Yet urban agrarians have limited time and energy, and the pervasiveness of other urban problems (for example, poverty and homelessness), the challenge of scale-jumping from defence of urban to rural lands, and the abundance of opportunities for the privileged to participate in the food movement through the market, can be forces of demobilisation from larger food sovereignty struggles.

The trajectory of our argument started with the proposition that metabolic rifts have caused the impetus for the food sovereignty movement, which is framed by the rights and responsibilities encompassed in agrarian citizenship. While attention has been given more widely to the rights side of agrarian citizenship, the responsibility aspect has been less developed, and yet is crucial to realizing food sovereignty's goals for sustainable and just food systems, especially given the role cities have played in driving the metabolic rift. This means that urban people have a responsibility to mobilize collectively in social movements that defend the practice of growing/harvesting food sustainably beyond city limits, rather than only advocating for individual-level behaviour change through the market or through isolated urban agriculture

activities. Urban agriculture plays a role through literacy and visibility functions and keeps food issues salient in cities and to remind urban people of this responsibility, but it also directs urban energy inwards (towards the city) as urban agrarians struggle to meet the demands of running urban farms and securing access to urban land suitable for growing. Mobilization for protection of foodlands is one way that we link urban agriculture to ways that urban people claim and act on their responsibilities. These mobilizations like the Save UBC Farm campaign, FarmWatch, and other organizations in the BC context such as the Young Agrarians, the Foodlands Cooperative of BC, FarmFolk CityFolk, and the Working Group on Indigenous Food Sovereignty, have food sovereignty mandates to direct urban energy into land struggles. But as these struggles are over property, they operate within a context of settler colonialism and its history of dispossession. Even when urban mobilizations for food sovereignty are able to jump scales from the local to more distant in defense of land beyond the city, they do nothing to repatriate lands stolen in colonial conquest. The urban agriculture movement in Metro Vancouver contains all of the elements of a food sovereignty struggle (Schiavoni, 2016) – a *historical* context of colonization, *relationality* between peoples and the land, and the *interaction* between diverse actors – but can the urbanization of agrarian citizenship in this place advance food sovereignty goals for creating sustainable *and just* food systems?

Agrarian citizenship is a feature of collective subjectivities, such as LVC, the MST and in Canada, groups such as the NFU. And while some urban agrarians act as part of collectives (such as food policy councils and social movement organizations), we have examined individual acknowledgement or recognition of relational responsibility as a prefigurative mechanism for participation in or exclusion from these collectives. We argue that recognizing responsibility, coupled with sufficient privilege, should lead to collective mobilization for food sovereignty. But

just as relational responsibility and privilege exist among individuals, they also exist among collective subjectivities. This raises the need to examine these dynamics at the level of collectivities and the ways in which collective responsibility and collective urban privilege can inform rights-based social mobilization and discourses as part of social movement coalitions and institutional strategies for food systems change. These rights include Indigenous rights, and the strategies include (non-metaphorical) decolonization, which requires the repatriation of stolen lands. Urban people are therefore responsible for maintaining the health of surrounding foodlands, and food sovereignty mobilization will depend on urban recognition of responsibilities and commitments to act collectively and in solidarity with food providers—especially for those with the privilege to do so. But, owing to the process of colonization, urban people also have a responsibility to atone for colonial harms caused in the metabolism of cities (i.e., the violent state-sanctioned processes used to enclose traditional territories). This responsibility means honouring promises enshrined in state commitments to Indigenous people and reframing and redistributing ownership rights to use lands for the continued supply of food to cities. This starts with urban peoples’ responsibilities to show up for struggles for Indigenous self-determination. Here, a shift to prioritizing Indigenous rights above the right to “use” land to provide food for urban dwellers is necessary. There must be truth before reconciliation, and there can be no food sovereignty without decolonization.

Chapter 4: Avoiding the Urban Trap? Urban agrarianism in Southern Brazil

4.1 Chapter summary

Given accelerating urbanization and the multiple social and ecological crises that pose profound global sustainability challenges, the “urban” has attracted attention from food systems scholars, including a proliferation of research on urban agriculture and more recently emerging work on “urban agroecology.” Drawing on visual ethnographic fieldwork in Florianópolis, Brazil, this paper addresses the following research question: What mobilization strategies do people in the urban agroecology movement use for building more sustainable and just food systems, and how do those strategies build relations between the city and the country? First, by repositioning urban agroecology in dialogue with food sovereignty and its roots in social mobilization, this paper illustrates how urban agroecology is constructed through social movement relations that extend beyond the city. Second, we argue that the directionality, focus and target of those relations matter for realizing goals of the food sovereignty movement. Through the concept of the “urban trap,” we caution against urban agriculture – both practice and scholarship – directed within the city primarily for the benefit of urban people and argue for a deeper engagement with an urban political agroecology praxis that is situated in relation to wider, including rural, agroecological struggles.

4.2 Introduction

As a source of environmental problems and potential for political change, cities – which now contain 55% of the world’s people (World Bank, 2019) – have assumed a prominent place in discussions of agroecological transitions and food sovereignty (García-Sempere et al., 2018;

Siebert, 2019; Tornaghi & Dehaene, 2020). One area in particular experiencing increased interest is “urban agroecology” (Altieri & Nicholls, 2018; Egerer & Cohen, 2020b), which refers to growing food in and around cities using agroecological practices. While it is doubtful that production associated with urban agriculture as it is currently practiced can significantly contribute to global food security in any meaningful sense (Badami & Ramankutty, 2015), urban agriculture does have the potential to serve multifunctional benefits beyond measuring or quantifying harvest yields (Valley & Wittman, 2019), such as increasing food literacy and creating social connectedness.

This paper engages with the literature on the social and political dimensions of urban agroecology (Anderson, 2017; Bowness et al., 2020; Tornaghi & Dehaene, 2020), and the potential that urban agroecological practices, networks, and movements hold for driving social change. In particular, we note, and challenge, the tendency of urban agriculture scholarship and practice to focus on urban scale to the exclusion of rural politics, a tendency we refer to as “*the urban trap*.” We do this to reprioritize the role of agrarian social movement mobilization in the praxis of urban agroecology, a key element in the theory of change rooted in food sovereignty and urban agrarianism (Bowness & Wittman, 2020). Urban agrarianism conceptually represents an urban political subject that mobilizes for food sovereignty both in the city and the countryside. Through fieldwork with an agroecological non-profit organization based in the city of Florianópolis, Brazil, we demonstrate how the collective subjectivity of urban agrarianism overcomes the potential limitations of the urban trap by engaging urban people in the wider food sovereignty movement and its struggles for agrarian reform, decolonization, and the transition to ecological growing methods.

This paper is organized in 3 sections. First, we conduct a brief review of the literature on urban agriculture research and identify a potential pitfall that we call the “urban trap.” Next, we outline the context and research approach, which involved participant observation, interviews, and community-based visual ethnography. We then conduct an analysis of the collective action frames (Benford & Snow, 2000) demonstrated by members of the agroecological organization CEPAGRO and their extended network, which are grouped into three framing strategies: Occupy, educate, and network (as verbs). These framing functions serve to direct urban to rural social mobilization from participants in the urban agroecology movement. Our analysis then points to how urban agroecology praxis can overcome the urban trap through a rescaling to create frames that mobilize for food sovereignty across the urban / rural divide.

4.2.1 Agroecology in the City

Agroecology, as a “science, movement and practice” (Wezel et al., 2009), aims to foster and maintain emancipatory food systems that respect natural ecosystems, enhance worker livelihoods, and value diverse knowledges and cultures. A common conception of agroecology treats it as a combination of farming practices such as planting diverse crops together, avoiding chemical inputs and building a habitat for beneficial insects and wildlife. As a science or way of knowing, agroecology is transdisciplinary and action-oriented, and prioritizes the historical and contemporary lived experiences of farmers and traditional knowledge-keepers (Méndez et al., 2013). With its roots in agrarian mobilization in the Global South, agroecology as a social movement is made up of farmers and activists who demand land reform (Rosset & Martínez-Torres, 2012), gender equality (Bezner-Kerr et al., 2019) and climate justice (Claeys & Pugley, 2017).

This last element, agroecology as a movement or movements, is the focus of this paper. As a social movement, agroecology is closely aligned with food sovereignty, the right to define local food systems in accordance with local customs, ecological sustainability, and social justice (Wittman et al., 2010). Originating with international peasant mobilizations in the mid-1990s against free trade agreements that bolstered the globalization of the corporate food regime, food sovereignty is a global social movement struggle over sustainable food systems. This movement works through transnational networking and political activism in support of agroecology through organizations such as *La Vía Campesina* and its member organizations (Desmarais, 2007). It is not uncommon for scholars to speak of “agroecology movements” or “the agroecology movement” when referring to these same dynamics of collective organizations mobilizing against unequal power relations with states and corporate actors, in defense of democratic food policies, and in building stronger relationships between growers, workers, and eaters in agricultural systems based on agroecological principles.

A defining feature of a social movement is a collective intention to incur or resist social change in response to a perceived social injustice. Social movements act on this intention by adopting strategies and specific tactics devised to bring about change. This aspect of social movements is often referred to as a “theory of change” and the action is often referred to as social mobilization, which in its most visible form takes shape with hundreds, thousands, or in the case of the recent global climate demonstrations, hundreds of thousands of people taking to the streets.

One way to define how social movements organize and mobilize is to adopt a collective action frames approach (Benford & Snow, 2000; Snow et al., 1986). With roots in social constructionism, framing refers to the interactive processes that create and maintain meaning and

the impetus to act for members of a social movement (Goffman, 1974; Merton, 1995). Collective action frames refer to a set of discursive resources that define the intended change, advanced socially on behalf of some specific or generalized collectivities. A frame lets participants know what is at issue, who is and will be affected, and how to bring about a better world. In other words, a frame designates a collective actor, an agent of change, and serves as a call to action for mobilization. For example, the global food sovereignty movement's theory of change is organized around collective social mobilization against the corporate food regime. Emerging in the 1990s, the emblematic defining actor of the movement, *La Vía Campesina* and their member organizations have engaged in social struggle and local to global campaigns for social transformation. These campaigns have targeted the “corporate food regime,” a cluster of dominant agri-food corporations and supportive states underpinning the industrial food system (Campbell, 2009). This regime supports their delivery of “food from nowhere,” or indistinguishable food commodities through green revolution technologies and global trade relations.

An alternative to “food from nowhere” produced by the corporate food regime is agroecological food, which is food grown by farmers who use agroecological practices and participate in agroecological social networks. Agroecological food therefore is more “place-based” in that it often has a territorial dimension and therefore contrasts with “food from nowhere.” While questions remain about whether agroecological farming can scale up to include larger farms (Altieri & Rosset, 1996; Titttonell et al., 2020) or if it can scale out across larger regions through policy and economic supports for small farmers (Khadse et al., 2017; Mier y Teran et al., 2018), agroecological practice is not geographically limited to rural spaces. Urban

farms, community gardens, urban composting programs, peri-urban orchards and green rooftops can all bring agroecological practices to the city.

Beyond growing food in the city, urban agroecology also provides a set of symbolic resources, or repertoires of mobilization, that can be used to diagnose social problems, explain the possibility for response through collective mobilization and call urban people to action (Benford & Snow, 2000). The concept of urban agrarianism contributes to understanding the relationships between urban agriculture, urban agroecology, political urban agroecology, and the wider food sovereignty movement (Bowness and Wittman, 2020). At first, urban agrarianism appears as a contradiction in terms. In contemporary terms, agrarianism refers to a set of values that emerged in reaction and opposition to urbanization and the decline of rural viability as the basis for social organization in American society (Danbom, 1991). Historically, agrarianism encodes values and visions of "rural life," which has changed over the centuries. This concept goes back to the 18th century in the Lockean concept of property, where agriculture was seen as a means of mixing labour with the land, making it ownable in the creation of private property, which also served as the basis for so-called civilization's prosperity (Wood, 1984). A subsequent wave of agrarianism emerged in the mid 20th century, which "broadcast a message of moral and environmental crisis" (Carlisle, 2013).

Agrarianism is related to citizenship, whereby new agrarians believed that the "cultivation of the land leads to cultivation of character, which in turn produces individuals capable of being responsible citizens" (Fiskio, 2012, p. 302). This joining of agrarianism and citizenship, or agrarian citizenship," is a feature of food sovereignty where working the land comes with a series of rights and responsibilities (Wittman, 2009a). Responsibility in this sense is a responsibility to uphold the health of the land and those who are stewards of it.

Recently with the rise of the food movement, agrarianism has extended into urban places and is being adopted by urban people (Bowness & Wittman, 2020). Among prominent new-agrarian thinkers, Wendell Berry suggested that urban consumers have a moral responsibility and that “eating is an agricultural act” (Berry, 1992, p. 274). But while consumption is part of urban agrarianism, urban agrarianism is more than about only consumption. Urban agrarianism is a precursor for social mobilization, and urban agriculture can feed that mobilization. As Edelman and colleagues argue:

This potential is reflected in the fact that the urban and peri-urban-based food initiatives are important sources of political momentum in food sovereignty advocacy, given that such advocacy is motivated not only by an idea of *solidarity with farmers in the distant countryside but also by immediate concerns* around public health, access to healthy and affordable foods, dismantling racialized food systems, and the culture and lifestyle of food producers, food sellers, restaurant owners and consumers (2014, p. 919 emphasis added).

Urban agrarianism therefore directs relationships of solidarity in two directions: Between the city and the countryside, and within the city. First, while food sovereignty and agroecological movements have historically focused their attention to the protection of lands outside the city, as its name implies, urban agrarianism attends to urban food-providing lands, contributing to mobilizations for creating a new urbanism. As such, forms of urban agriculture that adopt agroecological practices and social movement relations have the potential to motivate urban people to respond to the social and environmental damage caused by industrial agriculture. But at the same time, urban agrarian activism reflects urban concern for *rural* food lands and people.

Examples of urban agrarianism therefore include not just urban agricultural initiatives but also food and nutrition security councils, CSA networks (urban eaters who support farmers), educational and social programming, and wider agroecological social movement campaigns in support of land occupations and struggles for Indigenous sovereignty, all of which draw on an urban imaginary that relates and can relate to land, water, and soil as the living basis of social metabolism. Urban agriculture, or growing food (and composting) in and around the city, therefore represents a rich space for exploring how urban consumers can be transformed into agents of the food sovereignty movement. However, we argue that there is a catch, or at least, potential to get stuck within the “city limits.”

4.3 Agroecology and the Urban Trap

This paper takes Born and Purcell’s concept of the “local trap” as a point of departure:

The local trap refers to the tendency of food activists and researchers to assume something inherent about the local scale. The local is assumed to be desirable; it is preferred a priori to larger scales. What is desired varies and can include ecological sustainability, social justice, democracy, better nutrition, and food security, freshness, and quality. For example, the local trap assumes that a local-scale food system will be inherently more socially just than a national-scale or global-scale food system (Born & Purcell, 2006, p. 195).

Born and Purcell argue that the focus on the local scale in food systems planning presents three related problems: 1) The local is not always more environmentally sustainable than other scales (food produced locally might be more carbon intensive, or produced with a greater incidence of pesticides, than food produced at greater efficiency of scale but farther away) 2) this assumption

conflates scale with a desired outcome (and as a result, efforts to create better food systems focus on localization instead of specific outcomes around greater sustainability and social justice) and 3) assuming the local is desirable obscures other scalar options that might be more effective for achieving a desired outcome (such as implementing policies that impact a greater number of jurisdictions, such as the national or supranational level). However, as Born and Purcell argue, the tendency to hold the local scale as inherently more sustainable and just in food systems research is widespread.

Theoretically, an analogous problem can result in urban agriculture research that focuses closely on the urban scale, which could spread to a definition of urban agroecology primarily in terms of the application of agroecological principles and practices in urban settings (see for example, Altieri & Nicholls, 2018; see also case studies in Egerer & Cohen, 2020a; and Tornaghi & Dehaene, 2021). This narrower view of urban agroecology as “production” in or on the outskirts of cities is one expression of the urban trap, in that the focus is on urban soil quality, urban water management and urban agrobiodiversity and other material, rather than political and relational, practices at the urban scale. Many of the arguments applied to agroecology as a rural farming practice are advanced here, including arguments that “self-sufficiency in terms of vegetables could potentially be achieved at the level of a community or city if such UA farms were re-designed and managed using agroecological principles” (Altieri & Nicholls, 2018, p. 58).

We caution that urban agroecological research and activism should aim to avoid the urban trap for at least two reasons. The first is the potential that focusing on the urban scale can serve to reproduce inequities exacerbated by neoliberalism. As incisively critiqued by Julie Guthman and Patricia Allen (Allen & Guthman, 2006; Guthman, 2008), despite discourses of

ecological sustainability and social justice, alternative food movements often fail to undermine inequities across lines of race, class, and gender . This applies also to urban food cultivation, which can serve as part of the rollback of the welfare state whereby urban people are increasingly responsabilized for their own self-sufficiency in the wake of a weakening social safety net (McClintock, 2014; Weissman, 2015). Similarly, an accompanying neoliberal trend in food movements is that the privileged can look to the market for provision of local and healthy food inaccessible to the socially marginalized (Johnston & Baumann, 2015).

This individualization and orientation towards the market that can accompany the urban trap points to another issue. Despite an emerging strand in the literature with an explicit focus on the political dimensions of urban agroecology (Resler & Hagolani-Albov, 2020; Tornaghi & Dehaene, 2020), social mobilization, and urban-to-rural mobilization for food sovereignty in particular, is under-prioritized as a means for social transformation in both the practice and scholarship of urban agriculture (Bowness et al., 2020; Bowness & Wittman, 2020). One concerted effort to politicize urban agriculture research is primarily found in the recent work primarily by Chiara Tornaghi and Michiel Dehaene and their construction of the concept of “agroecological urbanism.” They argue for a broader conception of urban agroecology as

not simply an agroecology-informed urban agriculture. It is rather *a way of conceiving of a city*, its functions, zoning, green infrastructure, and governance, within an agroecological perspective which mark the main rationale for the politics of space, and of the social processes of production and reproduction within the city: it is a model *for sustainable urbanisation*. The agroecological city would be a place where food production is rooted within the community with neighbourhood production sites (Dehaene et al., 2016 P.

175, emphasis added)

Tornaghi (2016) treats urban agriculture as a social practice that presents an opportunity for the construction of new urban rights. These rights include: The right to grow in urban contexts, to access urban land, to healthy urban metabolism (to recycle nutrients), to share and trade food, and to live in urban environments that enable food sustainability. Her proposal for establishing these new urban rights is through “three interlinked and complementary strategies, aimed at paving the way for a more thorough discussion within the urban food movement” (793). Here, the emerging concept of agroecological urbanism adopts a broadening to include rural struggles:

The second strategy for a politics of empowerment is a call for a more deliberate, substantial and strategic alliance between urban and agrarian food sovereignty and justice movements (795).

However, the focus is not explicitly on urban to rural mobilization, although she notes that while the increasing importance of urban and peri-urban food production and movements (Edelman et al. 2014:919) has been recognised within agrarian studies and food sovereignty literature, more could be done to link and coordinate debates and strategies on the ground.” (795)

Recent conceptions of urban agroecology have started to prioritize the linkages between urban and rural through radical politics. In the first interdisciplinary edited volume dedicated to urban agroecology (Egerer & Cohen, 2020b), Bowness and colleagues (2020) argue for taking a critical perspective that examines social and power relations in different context of urban agroecological research – in the literal field between research participants and their networks, between members of the research team during fieldwork, and between fields of knowledge. This includes a specific

focus on how urban people mobilize in response to social injustices beyond the city, which is a cornerstone in the concept of urban agrarianism (Bowness & Wittman, 2020). As Tornaghi & Dehaene argue,

the way urban-rural links have been conceptualized so far in most agroecological and food systems literature is largely reformist (occasionally progressive), and that an agroecology-informed food system transformation needs radical approaches able to see and engage with the challenge of ongoing neoliberal urbanisms and urbanizations” (2019, p. 2).

In line with this statement, we argue that this prioritization of radical urban to rural mobilization is critical for urban agroecological movements’ success in developing more sustainable and just food systems, and this remains a gap in the literature.

4.4 Research Question and Methodology

The main research question addressed in this paper is: What mobilization strategies do people in the urban agroecology movement use for building more sustainable and just food systems, and do those strategies build relations between the city and the country? In answering this question, this project employs a visual ethnographic account of urban agroecology from Southern Brazil. Sarah Pink has been an influential voice in interdisciplinary visual methodologies and especially so in developing visual ethnography as a methodology in its own right (Pink, 2007). She considers ethnography as “a process of creating and representing knowledge (about society, culture, and individuals) that is based on ethnographers’ own experiences” (2007, p. 22), and positions visuals of various kinds, especially photos, videos, and hyperlinked media, as playing a number of different roles in the ethnographic research process. Our approach to video

ethnography combines the use of traditional ethnographic techniques such as participatory observation and qualitative interviews in the production of documentary-style videos to communicate research results and support community partners. This allowed access to rich and in-depth knowledge of the agroecology movement in Brazil.

Pink and Morgan (2013) describe visual ethnography as involving high-intensity research exchanges with participants, captured with photographic detail, and an ongoing theoretical-data collection dialogue throughout a longer ethnographic research process. Video-recorded interviews are especially high-intensity data collection moments, and the team maintained ongoing contact with participants following interviews and throughout editing (as renewed confirmation of consent to participate is especially important when participants agree to waive their right to anonymity in research reporting). Participant observation site visits were enhanced by capturing footage and taking photographs to supplement fieldnotes. This visual fieldwork was continuously contextualized within the broader literature on agroecology.

Between November 2017 and April 2018, the research team including Evan Bowness and two CEPAGRO interns, Fernando Espírito do Santo and Carlos Pontalti, conducted qualitative video-recorded interviews and filmed events and workshops with partner organization CEPAGRO, an agroecological NGO in Florianópolis, Brazil. The team started by selecting members of CEPAGRO for interviews, and then extended invitations to participate through CEPAGRO's network to community organizers, municipal civil servants engaged with urban agriculture, farmers, and educators. The final participant list included 31 people who lived in the city of Florianópolis, 8 who lived nearby in neighbouring municipalities, and 4 interviews with participants at an agroecology festival in the neighbouring state of Rio Grande do Sul. Respondents consisted of urban farmers and growers, urban social movement subjects,

politicians, government officials, educators, representatives from rural social movement organizations, students, researchers, botany specialists, and food industry workers.

The resulting vignettes (short visual stories using the video-recorded interviews and footage) illustrate participant observation experiences and have been threaded together as an interactive narrative compiled from notes, video clips and photographs (Nash, 2014). A visual representation of the themes, expressed as a photo and video gallery that serves as a basis for the visual analysis conducted for this paper, can be accessed at www.AgroecologicaVisual.com or www.VisualAgroecology.com in both Portuguese and English. The research team launched the website on July 25, 2021, as part the global “People’s Counter-Mobilization to Transform Corporate Food Systems” organized by the Civil Society and Indigenous Peoples’ Mechanism for relations with the UN Committee on World Food Security. This platform serves as a transdisciplinary form of knowledge mobilization and window into ethnographic elements not captured in written text. Threads from each video are connected via reflections, photos, and written quotes that, when assembled, are different from traditional documentary films in that the pieces are connected through non-linear links, disrupting the flow of the narrative, and making the watching experience responsive to interconnections between elements. The stories reflect key themes from the interviews that together represent elements of a “collective action frame” (see next section). Other factors, such as the quality of the footage, the reflections of filmmakers, gender inclusivity, as well as considerations about the relationship and commitment to the partner organization, also played a role in the construction of the videos. Links to specific pages of the website are included throughout to provide illustrations.

Participants discussed a number of ways in which urban agroecology connects the city and the countryside, draws links between urban people and rural food providers, and increases

food security, biodiversity and awareness about problems in the food system. The video recorded interviews were treated as data in the same way that an ethnographer would examine interview data and participant observation field notes to find emerging themes and make connections with issues in the social context around the participants.

4.4.1 Agroecology in Florianópolis

Brazil offers a rich context for urban agrarian questions given its agrarian and colonial roots and position as a global agricultural commodity powerhouse with 85% of the population living in cities (UN, 2018). An illustrative place to explore the tensions between the rural and urban elements of urban agrarianism is in southern Brazil, the birthplace of important actors in the food sovereignty movement. Nestled in a rare strip of remaining Atlantic rainforest, the densely populated coastal capital of Florianópolis spills off the continent and onto the tropical island of Santa Catarina. The island portion of the city's 675.4 km² is mostly uninhabited, hilly, and dense forest, with scattered, residential neighborhoods connected by highway and a downtown core near the bridge to the continent. It boasts among the highest standards of living in Brazil, with income levels 50% above the national average and relatively low rates of violent crime. It is also bordered by dozens of beaches, making it a popular tourist destination with a population of roughly a half million residents that swells to nearly double during the high season.

The nature of the city has changed dramatically over the past 50 years, as have the eating patterns of the people who live there (see "Florianópolis' Changing Foodscape"

<https://www.visualagroecology.com/semear>). Rapid growth and real estate speculation have led the region's Indigenous peoples, settled fishing communities and small-scale family farmers to gradually sell their land to developers to make way for condominiums and subdivisions. As one

indication of Florianópolis’ “de-peasantization,” the number of agricultural establishments counted by Brazil’s federal statistics branch declined from 615 in 2006 to 211 in 2017 (IGBE, 2017). Though some areas have been designated as protected ecological reserves, enforcement is lacking. Construction on mangroves, historic archeological sites, sensitive sand dunes and even public areas is commonplace and has plagued the city with traffic congestion, infrastructure overload and pollution. But despite the expansion and exploitation, at least on the island, it is possible to see the roots of an agrarian society in Florianópolis. Sustenance farms coexist with hostels and surf shops, high end restaurants and dance clubs. In addition to the remaining homesteads and working farms, one can find a growing number of community and public gardens in schools, kindergartens, and health centers (such as the PACUCA garden, see www.visualagroecology.com/pacuca), as well as backyard plots, mostly using organic methods. Over the bridge, the economically-disadvantaged neighbourhood of Chico Mendes is home to an innovative urban community composting initiative (Abreu, 2013), the Bucket Revolution (see <https://www.visualagroecology.com/revolucao>). However, not unlike urban agriculture realities in much of the Global North, these urban agriculture experiments remain marginal and starved for resources, despite being situated in an area with an explicit public policy framework supporting urban agriculture and agroecology.

Brazil has several policies and programs designed to support agroecological food production (Costa et al., 2017; Diesel & Dias, 2016; Giraldo & McCune, 2019; Guerra et al., 2017). Elements of an agroecological policy have been part of national dialogue in Brazil since 2003 with the establishment of the *Zero Hunger* program and the approval of the national *Organic Law on Food and Nutrition Security* in 2006. In 2004, urban agriculture was put on the national agenda by members of the now extinguished civil society advisory council on food

security, CONSEA. In 2018, the Ministry of Social Development (now the Ministry of Citizenship) created the “National Program for Urban and Peri-Urban Agriculture” (Ordinance No. 467, 2018). Currently, a bill is being discussed in the National Congress of Brazil to implement a “National Policy for Urban and Peri-Urban Agriculture” (Law 303/19), which would allow urban agriculture on vacant federal lands. At the state level, the creation of laws to support urban agriculture and Food and Nutritional Security plans, such as those in Santa Catarina, establish incentives for the agroecological cultivation of food in urban and peri-urban areas, including support for the commercialization of locally grown food (see *Law 17.533/2018* and the *Food and Nutritional Security Plan of Santa Catarina, 2014-2019*). At the municipal level, in addition to by-laws that indirectly support urban agriculture, such as laws mandating urban composting and the exclusion of pesticides from municipal lands (*Law 10.501, 2019*), Florianópolis put forward two policies that explicitly support urban agroecology. First, the “Municipal Decree of Urban and Peri-urban Agriculture,” created in 2017, established priorities for making urban agroecological food accessible, such as through the establishment of community gardens at public health centres (*Decree 17.688*). It was later renamed by another municipal decree to “*Cultiva Floripa*,” which also created the “*Fórum Cultiva Floripa*” as a space for dialogue with representatives of civil society (*Decree 21.723*). Also in 2017, the City Council passed the “Florianópolis Municipal Policy of Organic Production and Agroecology” (*Law 10.392*), which in its sole paragraph states that:

Agroecological practices should include improving health, leisure, sanitation, cultural enhancement, community interaction, formal and non-formal environmental education, caring for the environment, the social function of land use, job, and income creation, agrotourism, urban improvement of the city

and sustainability, conservation of water resources and springs, respecting the cycles of environmental renewal. [Translation].

At all levels, the process of constructing urban agriculture public policies, much like other food and nutrition related policies in Brazil, happens with participation of civil society, from national urban agriculture collectives (such as the *Coletivo Nacional de Agricultura Urbana*) to municipal networks such as *Rede Semear* (the Seeding Network) in Florianópolis (see www.visualagroecology.com/semear). *Rede Semear* is a network composed of organizations and individuals who have been meeting on the theme of urban agriculture since 2016 in Florianópolis and is made of representatives of the city's waste management company, and the municipal secretaries of health and environment, and the state agricultural extension department. This network hosts an annual event to celebrate the potential for urban agriculture in the city, which in November 2018 had the theme of the “right to the city.” However, in July of 2020, without dialogue with *Rede Semear*, the municipal government altered the urban agriculture decree and instituted the *Cultiva Floripa* (Grow Floripa) program. This new format proposed a new management structure for municipal urban agriculture, which is still to be defined as a “Forum” where civil society would have only an advisory role. And while Florianópolis has public policies about urban agriculture, these policies remain without space in the municipal budget.

4.4.2 The Centre for Promotion and Study of Collective Agriculture (CEPAGRO)

Given the limited scope of state-led initiatives, urban agroecology is highly dependent on NGOs, such as the Centre for the Promotion and Study of Agriculture in Groups (CEPAGRO), one of the central actors in Florianópolis' agroecological movement (see www.visualagroecology.com/cepagro). CEPAGRO has promoted agroecology in the region for

the past 30 years. Their motto during data collection was supporting “agroecology in the city and the countryside,” which was defined by their communications team. CEPAGRO got their start in 1990 when a group of farmers and agronomists got together to experiment with forms of collective organization among family farmers in the state of Santa Catarina. Over the 1990s, the theme of agroecology started to emerge as a centerpiece in their organizing efforts, and by the early 2000s they were working to support agroecological transitions in the countryside, partially through connecting rural farmers with emerging urban markets. A major campaign has been to work with rural farmers to support a transition from heavily chemical-intensive tobacco farming to diversified agroecological farming systems. CEPAGRO provides technical support during farm visits, hosts meetings among farmers, supports the development of marketing channels and mobilizes resources to help farmers adopt new growing practices. In the mid 2000s, CEPAGRO formalized a relationship with the Agrarian Sciences campus of the Federal University of Santa Catarina and started to engage urban constituents more directly through educational programming and establishing new channels for rural producers through agroecological farmers markets and consumer networks. This campus is located in an urban neighbourhood on the island, and from this location they have become more directly embedded in a number of efforts to promote agroecology within the city. CEPAGRO is also at the centre of a large group of organizations and institutions who together form a broader agroecology movement in Santa Catarina. This project treats CEPAGRO as a central node in this network and traces agroecological frames and their urban and rural elements through CEPAGRO’s extended network.

4.5 Agroecological Collective Action Frames: Occupy, Educate, Network

Through an interpretive analysis, we describe and illustrate elements of the collection action frames appearing in interviews with members of the agroecological movement – from CEPAGRO and their extended network of farmers, policy makers, organizers, and activists – in relation to the types of activities described below that take place in both rural and urban spaces. The interviews are analyzed, through reference to fieldnotes, researcher reflections and dialogue with the process of constructing a visual storytelling web-documentary. Collective action frame analysis identifies key features in the language used by participants that serve to unify and mobilize movement actors through three key framing tasks: Diagnostic, prognostic and motivational (Benford & Snow, 2000). In simple terms, social movement participants use a common discourse to diagnose social problems, prescribe social solutions, and call movement participants to action. We describe the diagnostic (problem definition), prognostic (solution definition), and motivational discourse (calls to action) expressed both in interviews and CEPAGROs promotional and education materials.

The way in which problems are defined, and solutions posed – and to whom and how they are aimed to motivate to act – provides insight into the directionality of social movement mobilization within the agroecology movement as urban, rural, or across the urban rural divide. For example, CEPAGRO’s communication materials highlight composting programs, consumer networks, and educational urban gardens as solutions to problems in the food system and call on a broad constituency of social media users, students, and participants in campaigns for social justice.

Three analytical themes emerged as central in our interpretive analysis of the agroecological action frames: *Occupy*, *educate*, and *network* (as verbs). Each represents a

different strategy for mobilization for CEPAGRO and its extended network with the broader agroecological movement, or “repertoires” of social movement action, and each contains different urban and rural elements. The three repertoires together across urban and rural scales fit into a master frame (Benford & Snow, 1992) of the “struggle for land,” positioning the agroecology movement, both its urban and rural participants, against the industrial and corporate food system and with the solution to social and ecological problems in the food system being a transition, or scaling out, of agroecology.

The “occupy” discourse spans different strategies and meanings of reclaiming space, both physical and political-discursive, responding to a perceived need to stop the ontological spread of the conventional food system to make and hold space for agroecology. Participants described various tactics for (re)claiming and inhabiting public spaces, discursive and political representation places, all from the perspective of the various meanings given to the term “occupy,” whether for growing food, public demonstrations, public events, or in agroecological communication to social media sites and WhatsApp groups. While less common, literal occupation is part of the agroecological strategies, both for land and of government offices. For example, as a farmer recounts from the agrarian reform settlement, *Assentamento Comuna Amarildo de Souza* (*Comuna Amarildo*, see www.visualagroecology.com/amarildo):

INCRA [the National Institute of Colonization and Agrarian Reform] promised to provide land [...] INCRA kept saying they would but didn’t, so we had to occupy INCRA. We stayed five days to get everything [...] that was the process of getting this land here. [Translation].

The mobilizations promoted by the *Comuna Amarildo* and the Landless Workers Movement (MST, see www.visualagroecology.com/mst) are used in the literal sense of the “occupation” of

unproductive land or government institutions as a form of action. In the case of CEPAGRO, “occupation” also appears as part of a strategy for collective action, but this is more closely related to their concept of political advocacy (“*incidência política*,” see <https://www.visualagroecology.com/incidencia>), which is central in CEPAGRO’s mission: “To promote Agroecology in an articulated way in a network in rural and urban communities, guaranteeing political advocacy” [Translation]. The political advocacy practiced by CEPAGRO aims to reclaim or inhabit spaces of social representativeness and to influence the development of agroecological public policies. Here we use the term “occupation” to refer to these various tactics. For instance, as a policy maker and former member of CEPAGRO, argues, occupation applies to different spaces:

[...] from the construction of participatory democracy starting from councils, forums, networks, civil society organizations to occupying the space of institutional politics, representative democracy, right? So, this history that was built from organized civil society working in an NGO like CEPAGRO, and from occupying spaces in Councils and Forums, such as the Forum for Combating Pesticides and the Food Security Council, the Organic Production Council, right? These are spaces where society is there to present proposals, to minimize these impacts that we have been talking about [...]. These proposals are being put in place, and they are also spaces for us to denounce when the State does not fulfill its function, right? And to monitor the public policies that are instituted by the State. [Translation].

The occupation of political spaces is a key tactic in the institutionalization of agroecology, as a member of CEPAGRO says: “Twenty years ago, it [Agroecology] was almost nothing. It was

incipient and now she occupies several spaces [...] Through our political advocacy and the strength of our movement's struggle." [Translation].

A second set of strategies fall under an "educate" discourse, which responds to a lack of awareness about environmental problems caused by conventional food systems and a need for more thinking about food, nature and the economy in ways that are aligned with the agroecological worldview (see www.visualagroecology.com/educacao). This discourse contained strategies for how to approach agroecological education (through demonstrative approaches, such as talks and educational events) and experiential approaches (such as educational garden programs and hands-on workshops). The educational strategies referred to by participants include awareness raising, sensitizing, capacity building and training (for agroecological farmers), as well as consumer and public education. Most of these educational activities tend to focus on bringing people closer to, nature as observed by a rural education coordinator for the MST:

[...] we work with children in rural schools for them to understand the relationship of the earthworm to the soil, the living soil, nature as a living element, and the production of food that respects and follows this logic [...].

We have to be able to deepen these practices. [Translation].

This same goal is pursued within cities through urban agriculture. As one educator argued,

I believe that urban people should have a responsibility to the city's soil.

Because what normally happens in the city: the person lives in an apartment.

She arrives with her car on a paved road, enters her garage and goes to her job

... And she doesn't notice the presence of the soil! The idea is to bring to the

discussion of the concept of Urban Agriculture for that too. For people to look

at their living space and realize that the soil is here! Is under the sidewalk. But when does she see this soil? So, we need to develop this relationship for urban people. [Translation].

According to the interviewees, “urban agriculture can broaden people’s view of the city, about the dynamics of production in agricultural processes and the reproduction of life through relationship with the soil.” But this educational frame also led to experiential educational activities that brought urban people out rural agroecological spaces as well, such as through educational events hosted on rural or peri-urban farms and through bringing urban consumers out for farm visits to deepen solidarity across urban and rural scales.

The third “network” discourse critiques the siloed and disparate nature of human communities associated with industrial food systems, and calls for collective action in social networks (see www.visualagroecology.com/rede). The interviews illustrated different types of relations in social networks, including market relations, political relations, organizational relations, and cultural relations. As one CEPAGRO organizer stated:

So, we know that we’re not alone. CEPAGRO isn’t alone, and this wider network that we’re a part of searches for and gives support towards better living conditions for men and women who live in the countryside and grow our food [Translation].

Acting in networks is a key part of CEPAGRO’s theory of change. They form relationships with urban and rural organizers, state institutions, universities, and funding agencies to amplify and rescale the sphere in which they work. This networking discourse is what connects CEPAGRO to other distinct actors in the urban agroecology movement in Florianópolis.

4.6 Urban and Rural Agroecological Framing Elements

The occupy, educate, and network strategies are spatialized—the subjects and objects appearing in them are identified as urban, rural, or as a relation between the city and the country. To illustrate, the www.VisualAgroecology.com website is organized into three sections: Urban, Rural, and City-Country.

The urban section of the website contains a few examples of urban-based food initiatives (see www.visualagroecology.com/urban). These include the *Revolução dos Baldinhos* (Bucket Revolution), a community composting project that was spurred by an outbreak of Leptospirosis caused residents of the Chico Mendes neighbourhood to reduce the accumulation of food scraps which were not being collected by the municipal Capital Improvement Company (COMCAP) and were attracting rats. Community leaders went from door to door to mobilize the community to separate their organics which addressed the problem and created healthy soil for urban gardens in the process. This demonstrates primarily the educate and network elements of the frame. The organizers speak in terms of consciousness raising and sensitizing as processes that bring people into the movement through educational outreach, workshops, and interaction in the community. *Revolução dos Baldinhos* started through a partnership with CEPAGRO and continues to operate in dialogue and collaboration with other organizations and initiatives as part of a larger network.



Photo 1: An urban agroecological garden in Florianópolis

The PACUCA garden, an agroecological community garden in the Campeche Cultural Park located near prime tourism land near the coast in one of the most desirable residential neighbourhoods in the city. This section demonstrates all three elements of the occupy, educate, network frames. For example, some participants argued that urban agriculture plays a role in the agroecological movement in that urban people “occupy” physical urban spaces to construct urban gardens for the benefit of urban people, educating people about agroecology in the city and holding events and visits to the garden site that bring together other organizations, including members of CEPAGRO.

The urban “*Rede Semear*” network is a group of people promoting urban agroecology in the city of Florianópolis. *Rede* means “network” and *Semear* means “to seed.” *Rede Semear* was formed in 2015 to expand the public conversation about urban agriculture in the city. Shortly thereafter, in 2017, the “Municipal Program for Urban Agriculture of Florianópolis” was created by decree, which is currently called “*Cultiva Floripa*” (Grow Floripa). This legislative measure

may have modest impacts on the increase in agroecology in the city and engages people from civil society, the government, and NGOs such as CEPAGRO. This example shows urban agroecology developing through relations that focus inward within the city, although with members who maintain connections to the countryside.



Photo 2: Participants in the 3rd Municipal Urban Agriculture Meeting in Florianópolis watching a dance during an intermission between sessions. The theme of the meeting was “Direto à Cidade” (the Right to the City).

The “rural” section showcases two agrarian reform settlements and primarily demonstrates the occupy frame (see www.visualagroecology.com/rural). CEPAGRO is also connected with struggles for agrarian reform, and sometimes collaborates with the MST, the landless farmers movement, one of the largest agrarian radical social movements in the world, which deploy land occupations as central in their organizational mandate. *Comuna Amarildo* is home to the families who tried to occupy a part of Florianópolis in 2014 (some of the most valuable land in the city), but were eventually displaced to the municipality of *Águas Mornas* (SC), 36 km from

Florianópolis. CEPAGRO helps organize a CSA delivery of products grown at *Comuna Amarildo* to consumers in the city.



Photo 3: An arial drone photo of the *Comuna Amarildo*

CEPAGRO also maintains a connection with rural agroecological farmers by facilitating and supporting participatory organic certification as a member of the internationally known *Rede Ecovida*, the participatory organic certification network that originated in southern Brazil. It became a collective space that sought to establish a common identity within these various initiatives, bringing together rural and urban farmers, consumers, and organizers, as well as representatives of associations, cooperatives and informal groups interested in building agroecological networks. Currently *Rede Ecovida* certifies approximately 3500 agroecological families and 30 NGOs, like CEPAGRO. *Rede Ecovida* demonstrates the educate and network frames.

CEPAGRO has also recently engaged with Indigenous communities. For example, near the *Comuna Amarildo*, the community of Tekoa V'ya was demarcated as an indigenous reserve

for the Guarani people of the region who have been displaced by highway construction. CEPAGRO has recently developed a relationship with Tekoá V'ya to educate urban people about Indigenous struggles in Brazil and about the connections between agroecological and other traditional food systems, and to support their struggle against the ongoing occupation of Indigenous lands.

The “city/country” section (see www.visualagroecology.com/campo-cidade) contains a segment about a CSA program (called the “Responsible Consumer Cells,” or CCR project, see www.visualagroecology.com/celula). A coordinator facilitates this connection by collecting orders from urban people, sharing those with the farmers, and scheduling regular direct deliveries to the city. Eaters participate in meetings and take turns sharing organizational duties, thereby taking some of the “responsibility” for the network. The RCCs started as a research project in the Family Agriculture Commercialization Laboratory at the Federal University of Santa Catarina. This primarily demonstrates the network strategy, as the main function of the CCRs is to create new market channels for rural farmers and make agroecological foods more accessible for urban eaters. CEPAGRO plays a support role in the CCR project. This section also has a page about CEPAGRO, including a longer video with several key members of the organization, as well as subsections that focus specifically on the relationship urban people have to the countryside, agroecological education and network building. This section therefore contains several visual stories about the relationship between urban agroecology and the wider agroecology movement.

4.7 Conclusion: Avoiding the Urban Trap

We propose that urban agroecology that is focused on urbanisms is liable to face a similar problem captured by the concept of the “local trap” (Born & Purcell, 2006). This applies to both the study of urban agroecology and to agroecology movements. This is because urban agroecological movements mobilize collective action frames that can be scaled to be urban, rural or cross-scalar, and both the relations between urban and rural actors and spaces and the analysis of those relations can be hidden or missed when the analytical or mobilizing focus is directed towards the city. This can be seen in the different framing functions which diagnose social problems, specify solutions and call movement participants to action. This is potentially an issue for the prospects of food sovereignty in that some agroecological outcomes might be more appropriately pursued at the urban scale, whereas others may not.

In the urban section of the www.VisualAgroecology.com website, *Rede Semear*, the Bucket Revolution, and local urban gardens such as PACUCA are examples where mobilization can be directed inward toward the city through urban agroecological frames. Examined in isolation, these initiatives can appear as detached from a broader movement and can sever a more holistic and relational view that urban agrarianism prioritizes. However, zooming out to situate urban networks, urban composting programs and urban gardens within a broader network of agroecological initiatives that include organizing for rural food sovereignty, the website captures a broader view of urban agroecology as urban, expressed through urban-rural linkages, and even in mobilization beyond the city.

To summarize, this paper has examined urban agroecology through a community-based visual ethnography with CEPAGRO, an organization headquartered in Florianópolis, Brazil. In line with urban agriculture or urban agroecology thought of primarily as growing practices in the

city (Altieri & Nicholls, 2018), or the more urban focused elements of agroecological urbanism (Deh-Tor, 2017; Tornaghi & Dehaene, 2021), one aspect of CEPAGRO and their efforts to occupy, educate, and network for food sovereignty in the city involves the promotion of agroecological practices within the city. But as we have demonstrated, CEPAGRO equally promotes agroecology in the countryside and plays a role in directing urban mobilization outwards from urban-to-rural. Through collaboration with rural agroecological farmers, organizations, networks, and initiatives, and in building relations between the city and the country, CEPAGRO is at once pursuing agroecological mobilizations strategies both within the city and across the urban/rural divide. A view of urban agroecology that takes these interconnections and broader context into consideration, and which prioritizes opportunities for collective action and social mobilization beyond the city, will position the agroecological movement and scholarship to avoid the urban trap which is necessary for realizing goals for food sovereignty.

Chapter 5: Conclusion

Research on food sovereignty has expanded considerably over the past 10 years. Special issues have been dedicated to the topic in *Third World Quarterly*, *The Journal of Peasant Studies*, *Globalizations* and *Dialogues in Human Geography*, and a number of edited books have been published (Desmarais et al., 2017; Miheusah & Hoover, 2019; Trauger, 2015; Wittman et al., 2010, 2011). These academic discussions have presented a robust definition of food sovereignty as a social movement and framework for food system sustainability and social justice. This dissertation joins this field of research by focusing on urban dimensions of food sovereignty. The overarching question motivating the research conducted here is: What is the role of urban people in the food sovereignty movement? Up to this point, mainstream discussions of dimensions of food system sustainability have primarily embraced market approaches to change – the theory of change being that urban food citizens can make progress on food sovereignty goals by “voting with a fork.” The three substantive chapters of this dissertation finds urban people acting beyond their role as consumers and engaging in social mobilization both within the city and from the city.

5.1 Findings and Contributions

The main contributions of this dissertation are both methodological and theoretical. **Chapter 2** positions the dissertation towards two features in of recent food sovereignty scholarship: A focus on the urban and on relations. This gives rise to a new *sites, stakes, and scales* framework, which together can be used to better analyze the dynamics of the food sovereignty movement. In particular, it can be used to identify specific mechanisms for urban social mobilization. This provides new tools for scholarship and social movements working in the context of new food

systems issues as agricultural technologies are developed, climate patterns change, resource conflicts intensify, and population dynamics shift, and as these trends become new targets of food movements and urban activists. A secondary contribution from this chapter is bringing together threads of relational thinking to advance the conceptual development of food sovereignty scholarship, which has increasingly turned its analytical focus to relations. As part of the relational turn for food sovereignty studies, radical relationism as an ontological framework provides direction for the analysis of urban agroecology and urban food politics as part of the field's use of the concept of the metabolic rift and prioritization of the relations between the city and the country.

The contributions of Chapters 3 and 4 are primarily conceptual. In **Chapter 3**, I present the concept of *urban agrarianism*, defined as an urban ethic of care for foodlands and, by extension, a relational responsibility to exercise solidarity with those who cultivate and harvest food (Bowness & Wittman, 2020). The content of this chapter adds to the conceptual development of agrarian citizenship (Wittman, 2009a), a foundation in food sovereignty theorizing, by focusing specifically on how the constituent element of responsibility applies in urban contexts. Furthermore, agrarian citizenship is analyzed through the lens of privilege, which brings questions of social justice and redistribution into the conversation on food systems transitions, an emerging trend within food sovereignty scholarship and discourse (Bowness et al., 2021; James et al., 2021). In **Chapter 4**, I advance the concept of the *urban trap*, and present a caution for urban agroecological research (which is closely aligned with food sovereignty scholarship) to not focus on the urban to the exclusion of other spatial scales and to prioritize social mobilization as an analytical focus. This perspective complements and extends the already large body of urban agriculture scholarship, and the growing field of urban agroecology, both of

which have demonstrated a tendency to examine urban actors in isolation from the wider metabolic and social networks of which they are a part. By avoiding the urban trap, both food sovereignty scholarship and food movements engaged with urban cultivation can direct their attention to broader food systems issues and therefore be better positioned to contribute to food sovereignty goals.

5.2 Limitations

The overall contributions from this dissertation are that grounding the study of urban agroecology and urban agriculture within the framework of food sovereignty can lead to insights about the potential for urban social mobilization and the prospects for food systems transformation in the urban century. However, there are a few limitations of this research worth noting.

One set of limitations relates to their generalizability. First, the empirical data is drawn from a limited geographic scope from two research sites: Metro Vancouver and Florianópolis, Brazil. While the concepts developed and explored here are illustrative cases that can apply across contexts, food sovereignty is a global social movement, and insights drawn from other place, such as in European, Asian, or African cities, may provide additional insights about how urban mobilization occurs through engagement with other urban food movements as they pursue other targets using different strategies. Another limitation relates to sample size. The qualitative nature of this research is not meant to be generalizable, but to provide context-specific explanation. In-depth interviews and participant observation allowed for a richer engagement with the context and open-ended inquiry that led to topics of inquiry already identified as being of interest in the food sovereignty literature. In addition to being geographically confined, wider

conclusions about the nature of the global food sovereignty movement should be supplemented with quantitative data produced by a greater number of participants through participatory indicators attuned to social movement politics to measure agroecological outcomes of urban mobilization for food sovereignty (Wittman et al., 2020). A participatory quantitative indicator approach to urban food sovereignty has been developed (García-Sempere et al., 2019), which could be refined in application to the study sites examined in this dissertation. While ethnographic engagement with food movements provides explanation behind how and why urban food movements mobilize, developing indicators for monitoring outcomes through a participatory approach led by these movements can help assess the degree to which their efforts are successful by measuring material outcomes and barriers, such as levels of access to agroecological foods, access to growing space, gender equity, food waste diversion and degree of social connectedness (García-Sempere et al., 2019).

Another set of limitations relates to the visual ethnographic approach taken, the interdisciplinary nature of the project and to researcher positionality. The results of each chapter are in large part interpretive in that they rely extensively on the experience of the researcher. Chapter 4 was based on principles of community-based research, and the participant observation and data collection progressed alongside efforts to collaborate and support, and even prioritize, the interests and aims of the community partner organization, CEPAGRO, and members of their extended network. Therefore, other studies might approach the same research topic from different perspectives more aligned with the interests of different community partners. For instance, my experience and approach involved engagement with a range of disciplinary literatures, including the sociology of social movements, political agroecology, human geography, Indigenous studies, critical agrarian studies, and urban political ecology. Sharper

conceptual focus might be drawn from closer engagement with perspectives from other fields of study, such as feminist political ecology or critical race theory, for organizations with more explicit racialized and gendered food justice mandates. As such, while issues of privilege and food justice are raised throughout, a more nuanced exploration of the specific forces of exclusion would call for engagement with other fields of critical scholarship or community partners.

Finally, this dissertation examines the role of urban participation in the food sovereignty movement by primarily examining localized and regional social movement activities. As the food sovereignty movement is a global phenomenon made up of key collective transnational actors such as *La Vía Campesina*, this line of research could be continued taking transnational movements, rather than urban people, as the point of departure. Given the methodological approach taken here, with a focus on community-relations, the analysis in this dissertation does not examine specific global movements. The result is the empirical data can only provide a partial answer to the main research question, which should be complemented through studies that start from the perspective of global movements and their organizers.

5.3 Future research directions

As part of the radical relational ontology presented in **Chapter 2**, relations can be constituted by other-than-human actors. This raises questions about the operationalization of other-than-human relations: What are other actors are key to urban food sovereignty mobilization? Findings here focus on the agents of food sovereignty mobilization, but sharper analytical focus on the actors driving processes of accumulation, such as corporations and investors, and how they feature in food sovereignty collective action frames, warrants further analysis. Furthermore, subsequent research could examine how different types of actors, including oppositional actors, affect the

stakes and scales at which social mobilization takes place. Are there general principles that can be drawn when mobilization involves state actors, privileged actors, informal networks, corporate actors, or other types of actors, or can mobilization patterns be identified that only apply to types of struggles, such as struggles over Indigenous territories or over regulations governing agrochemical use? Chapter 2 applies relational analytical frameworks but could also be further developed through the application of explicitly relational research methods, such as social network analysis and methods informed by Indigenous research methodologies. These methods could be employed to better understand the ways in which potential relations exist and can be transformed into actual relations in the context of urban mobilization for food sovereignty.

As mentioned in the conclusion to **Chapter 3**, since the analysis of urban agrarianism was applied at the level of individuals, this chapter points to an opportunity to examine further the ways in which urban agrarianism is expressed by collectivities. Subsequent research could look at a greater diversity of social collectives, including other organizational forms involved in food politics, such as food policy councils, and other organizations involved in aligned ecological and social justice struggles beyond the food movement. Further, the concept of responsibility can be further developed in the context of food sovereignty scholarship. Following the publication of Chapter 3, I coordinated a working group on the topic of redistribution in the food system, and we pursued a line of inquiry that further explored the concept of responsibility for agroecological and regenerative food systems (Bowness et al., 2021; see also James et al., 2021). This gave rise to questions such as: What accountability and governance structures can provide a counterpoint to urban agrarianism and responsibility among urban food movements? This subsequent line of research calls for transdisciplinary collaboration examining new

frameworks for accountability for risks posed by the corporate food regime, and future research could continue to examine how different forms of responsibility interface with new and emerging forms of urban agrarianism. For instance, as food systems problems intensify and urbanization continues to densify cities, what new responsibility structures might emerge to provide urban agrarians with new mechanisms for holding actors in the corporate food regime responsible for the environmental and social harms and risks posed by the food system?

Chapter 4 argues for a prioritization of urban-rural links in the study of urban agroecology, and particular in examining pathways for urban to rural social mobilization. The resulting analysis presents a path for research that examines urban agroecology within a broader context by pursuing research questions about the types of relations that exist between urban agroecological sites and other efforts towards food systems change. In particular, this line of inquiry lends itself to questions about the nature of alliances between urban food movements and other social movements, including movements against resource extraction, anti-globalization movements, anti-corporatization movements and movements for Indigenous self-determination.

These emerging research directions can also inform subsequent work on urban dimensions of food sovereignty in light of the changing global context and landscape of new food systems challenges. For instance, how will urban social mobilization for food sovereignty change in a post-Covid world which placed food system vulnerability front and centre within the urban consciousness? How will the intensification of the climate crisis, and its associated effects on urbanization and regional shifts in agricultural viability affect urban agroecology and urban agrarianism? And how will emerging agricultural technologies change the urban relationship with and responsibility to food providing lands? The changing global context points to new and important research horizons for urban food sovereignty scholarship.

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Appendices

Appendix A Website – www.VisualAgroecology.com

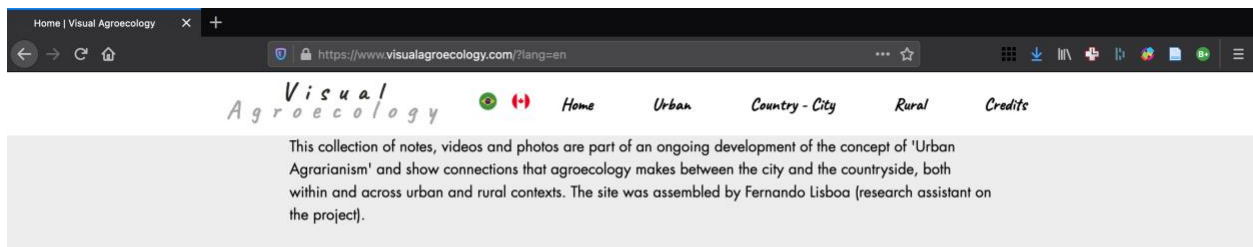
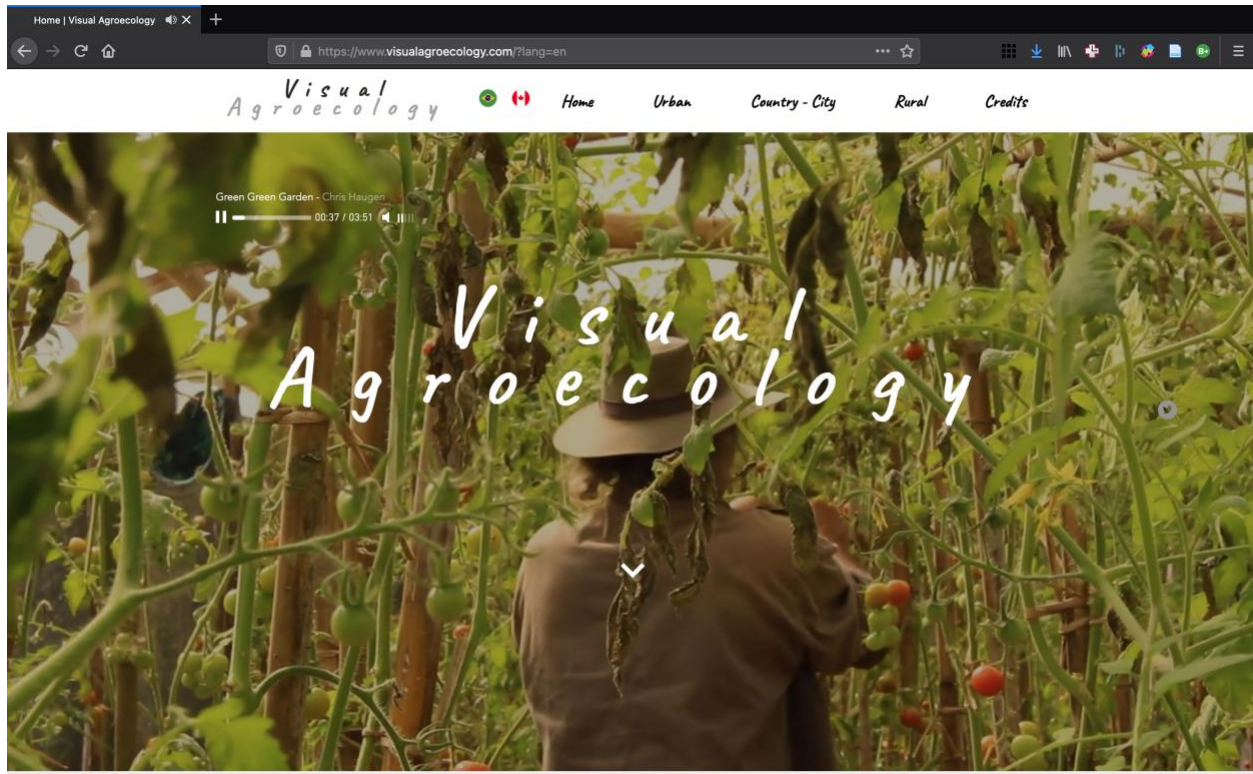
One output from the fieldwork conducted in Santa Catarina, Brazil, is a visual storytelling website and “web documentary.” The homepage of the website reads:

Visual Agroecology is a WebDoc about the agroecological movement in Santa Catarina, Brazil. Using visuals (photos and videos), it showcases efforts in the agroecological movement towards building sustainable and just food systems.

Visual Agroecology is a window into qualitative fieldwork conducted as part of a PhD thesis in progress at the Center for Sustainable Food Systems at UBC Farm in Vancouver, Canada, in partnership with the Brazilian NGO, the Center for the Study and Promotion of Group Agriculture (CEPAGRO).

This collection of notes, videos and photos are part of an ongoing development of the concept of ‘Urban Agrarianism’ and show connections that agroecology makes between the city and the countryside, both within and across urban and rural contexts. The site was assembled by Fernando Lisboa (research assistant on the project).

This website, which is presented in both Portuguese and English, provides a publicly accessible set of supplementary materials for viewers to engage with additional narratives compiled during the ethnographic fieldwork conducted in Brazil for this dissertation. The website, which features several short videos, standalone vignette clips excerpted from individual interviews and photographs taken during site visits, is a visual ethnography-inspired knowledge mobilization output designed to valorize agroecology for a general audience. Below are a few screenshots from the website:



CEPAGRO | Visual Agroecology X +

https://www.visualagroecology.com/cepagro?lang=en

Visual Agroecology Home Urban Country - City Rural Credits

CEPAGRO

One Organization, Many Relationships

The Center for the Study and Promotion of Group Agriculture (CEPAGRO) is a key organization of the agroecological movement in southern Brazil. Currently, CEPAGRO has its headquarters within the Agricultural Sciences Campus (CCA) of the Federal University of Santa Catarina (UFSC) in the Itacorubi neighborhood in Florianópolis (SC), Brazil. The organization has very close relations with the academic community, supports the "CCA Organic Market" and the CCA Community Garden, and provides physical space, work structure and assistance in orienting interns, students researchers, undergraduate and graduate students.

CEPAGRO Watch later Share

Bucket Revolution | Visual Agro X +

https://www.visualagroecology.com/revolucao?lang=en

Visual Agroecology Home Urban Country - City Rural Credits

Revolução Watch later Share

Watch on YouTube

"The Community was empowered with the Revolution of the Little Buckets"
Karol - Coordinator of The Bucket Revolution

Appendix B Interview Guidelines - ENGLISH

This study involves focus groups and semi-structured interviews drawing on this list of questions about urban food systems. Depending on the context and the outcomes of past interviews, the interview themes may emerge and change. Note: “X” stands in for the initiative the participant is involved in (such as a community garden, an organization, a farm, etc).

1. Who are you? What’s your ‘food story’ – what does food mean to you?
2. What is ‘the food system’? What are its parts? What does it do? How does it work?
3. Please describe the ways in which you interact with the food system (production, consumption, distribution, policy)?
4. Is there anything you would like to change about it?
5. What makes you passionate/ motivated/interested about X? What emotions motivate you in your connection to X?
6. What do you know about urban agriculture? Who participates in it? What are the benefits / who benefits from it? What are some of the drawbacks to it?
7. Are you involved in urban agriculture? If so, how did you get involved in food/farming? And why?
8. Are you familiar with the idea of food sovereignty? What does it mean to you? How does the concept of food sovereignty relate to your work / X?
9. What environmental/social problems are you aware of that relate to the food system?
10. Are you doing anything to change it? Please explain.

11. Do you think there is a 'food movement'? If so, please explain. Do you think it is encountering challenges? What are some of the successes of the food movement? Do you think there is a problem of marginalization in the food movement?
12. Do you see your involvement in X as a part a (food) movement?
13. What are your inspirations in your position as (gardener, policy maker, activist, etc.)? Do you have any goals for the short/medium/long-term?
14. Do you frame your work within any larger struggles (food justice movement, climate justice, social justice, localism, etc.)?
15. In terms of your own involvement and commitment to X, what is your biggest struggle?
16. How are urban people involved in problems in the food system that they don't directly experience? Do you know of any ways that urban folks can participate in supporting farmers? What about beyond just purchasing local/organic?
17. Do you think your work really matters? If so, how? (e.g, because it helps feed people, or because it's important to learn and share skills or because it's good for awareness raising...)
18. At what 'scale' do you interact with the food system through X? (e.g., the garden, the neighborhood, the city, the regional policy sphere, the global food system)?
19. Do you think a sustainable food system is possible?
20. Is there anything else you'd like to add?