Coventry University



DOCTOR OF PHILOSOPHY

Evolving urban agroecology with deep democracy - action research in London, UK

Logan, Robert

Award date: 2021

Awarding institution: Coventry University

Link to publication

General rights Copyright and moral rights for the publications made accessible in the public portal are retained by the authors and/or other copyright owners and it is a condition of accessing publications that users recognise and abide by the legal requirements associated with these rights.

· Users may download and print one copy of this thesis for personal non-commercial research or study

• This thesis cannot be reproduced or quoted extensively from without first obtaining permission from the copyright holder(s)

• You may not further distribute the material or use it for any profit-making activity or commercial gain

You may freely distribute the URL identifying the publication in the public portal

Take down policy

If you believe that this document breaches copyright please contact us providing details, and we will remove access to the work immediately and investigate your claim.

Evolving urban agroecology with deep democracy – Action research in London, UK

by

Robert Logan

PhD

October 2020

Evolving urban agroecology with deep democracy – Action research in London, UK

by

Robert Logan

PhD

October 2020

A thesis submitted in partial fulfilment of the University's requirements for the Degree of Doctor of Philosophy



Certificate of Ethical Approval

Applicant:

Robert Logan

Project Title:

How can urban agriculture contribute to social justice? - Action research in London, $$\rm UK$$

This is to certify that the above named applicant has completed the Coventry University Ethical Approval process and their project has been confirmed and approved as Medium Risk

Date of approval:

10 September 2018

Project Reference Number:

P75421

For Grandad,

the land where he rests will always be home



Abstract

The aim of this thesis is to evolve urban agroecology with a central feature of 'deep democracy' whilst surviving and thriving in the neoliberal city. Urban agriculture has many social and environmental benefits but has experienced issues of viability and also faced criticism for entrenching social inequities in movement practice and discourse. With theoretical frameworks such as alternative food networks failing to fully answer questions posed by the limitations of urban agriculture, urban agroecology has been pointed to as a holistic and political framework to develop emancipatory urban food systems. With a need for empirical research to connect theory to on-the-ground empirics and the emerging praxis far from meeting its potential, this thesis contributes strategic and practical learnings towards developing economically viable urban agroecologies with transformative relationships and democratic practices.

This thesis draws on insider action research from 2017-2019 based in a surfacing urban agroecology movement in London, UK. Two distinct organisational processes iteratively emerged within a young food hub at the Wolves Lane Horticultural Centre (WLHC), and a new entrant agroecological workers' co-operative, London Grown Workers' Cooperative (LGWC), both based on public land. The former enquiry focused on developing a community-led food policy for the food hub as a democratic intervention, and the latter explored issues of viability in relation to generating anti-capitalist livelihoods within the neoliberal city coupled with evaluation of the workers' co-operative as an elevating model for urban agroecology. The enquiries combined engaged with 67 people and implemented eight different participatory and qualitative methods: photovoice, community mapping, graphic harvest, document analysis, focus groups, auto-ethnography, community cookery, and semi-structured interviews.

Based on findings in the organisational enquiries, the thesis argues that the joint development of *diálogos de saberes* (dialogue among different knowledges and ways of knowing) and a 'prefigurative compromise' with the market, to generate viable place-making transformations in inequitable neoliberal contexts, is necessary to evolve urban agroecology with deep food democracy. I propose that accompanying research findings can support this strategic relationship, these being: a 'critical lovingness' embedded in organisational structures underpinned by an anti-oppression framework; creative popular education included in a transformative agroecological learning framework for Europe; and extending cooperative membership beyond worker identities. Overall, the thesis argues that securing long-term financial investment must be a short-term strategic aim over gifting economies, in order to create more stable, equitable foundations from which to develop autonomous commons-to-commons economies in the medium to long term.

Acknowledgements

Firstly, I would like to express massive respect and appreciation to everyone involved at London Grown Workers Coop (LGWC) and Wolves Lane Horticultural Centre (WLHC); for their work in developing community spaces which make London so much more a rich and hopeful place. There's been a lot of laughs, learning, and hard work along the way, and many special community meals and events that I'll always appreciate as a reminder of the city I want to be part of. The Conversations from Seed to Plate and Beyond! at WLHC certainly wouldn't have been possible without co-instigators and facilitators Yvonne Field and Deirdre Woods; whose creativity, critical thinking and leadership contributed so much to the making of fun and dynamic learning spaces to be part of, and other processes we have worked on. I'd also like to make a big thankyou to my main gardening partner, J, with who I spent many a long day in all the elements, and regularly made Tuesdays a highlight of the week with hilarious to philosophical chats amongst the plants. Particular thanks to Rachel Dring for making time to read the work and was so often at the heart of progressing Wolves Lane, greatly supporting LGWC in its early years. I'd also like to acknowledge the support of Organiclea through the Farm Start programme to get LGWC up and running and the opportunity to build a relationship with a very unique wild space in the city, with Brian Kelly also reading and giving feedback on the research. To Beth Stewart, Mama D, and Leslie Barson, for making time to engage in some playful and astute reflections on our work together with CFGN.

I am grateful to CAWR for this life-changing opportunity to undertake a PhD, made possible through a studentship enabling time and space to do this research. My studies have been both challenging and broadening through supervision with Ulrich Schmutz, Chiara Tornaghi and Marina Chang. I appreciate how they gently guided me to find my own way to urban agroecology, and also the emotional support at times through the ups and downs. To Ulrich, who has been a fantastic ally through the structures of the programme as my DOS and provided feedback with a great eye for detail in the formulation of academic argument and economic approaches. To Chiara, who has brought deep insight into the theoretical area of the work and whose writing has been a great source of inspiration in building understanding of scholar-activism. To Marina, who has regularly animated new perspectives on the thesis with penetrating questions and for supporting me to make a research proposal in the first place.

The research environment at Ryton has been such a welcoming and energising place to learn, and the generosity and expertise of Mina Thompson and Liz Woodard as the PhD support team have certainly played an important part in this for me. The People's Knowledge collective has been a compelling and important peer-to-peer space at CAWR to share learnings, questions and hear the experiences of action research. I would especially like to thank Jasber Singh and Colin Anderson for their sage advice and making spaces that have enabled a fundamental shift in my understanding of the qualities of knowledge. A big thankyou to Christopher Yap who made time to give comments on the work in the final stages.

I'm enormously grateful to my partner Paloma, so often a critical friend in the evolution of the work, bringing insight and care, and inspiring through her own practice. To my parents, Mike and Clare, who have shown such kindness through the experience, with offering study space during the pandemic, and even sitting through an end-of-year presentation run-through. To my brother Ali, who for all the talk of transformative education in this research, shows commitment to the learning of the next generation every day, like so many teachers around the country. Thank you to Vicky and Peter, whose shared love of plants and the garden has often brought joy in the heavy periods of laptop work. To grandma and grandad, Bill and Joan, whose company and advice has regularly lifted my spirits, and whose hard work has been such a source of motivation.

To the lunchtime library crew, Evalina, Maia, Joe and George, who brought humour and daily political debate to my weekly studies. And I would particularly like to extend appreciation to Lewis Bassett, with who I sat on many a park bench trying to work out the 'golden thread' and offered clarity in comments on the work. To Dan Glass who read through chapters and reminded me that political work, academic or otherwise, involves the head, heart and hand. Finally, to all the mates who have been great for chats and motivation: Nathan, Theo, Rennie, George, Holly, Leo, Joe, Hannah, and more, and my house mates Richard and Oliver, who have often been engaging support as I've tried to understand library readings and brought fun beyond urban agroecology at the end of the working day.

Contents

ABSTRACT	7
ACKNOWLEDGEMENTS	8
CONTENTS	10
TABLE OF FIGURES	13
TABLE OF TABLES	15
ABBREVIATIONS	16
CHAPTER 1: INTRODUCTION	17
1.1 Key definitions and a polyculture of food movements	17
1.2 DEVELOPMENT OF THE RESEARCH QUESTIONS AND AIMS	19
1.2.1 Experiences within UK food movements	20
1.2.2 Connecting experiences to literature; towards urban agroecology	22
1.2.3 Iterative development of enquiry within organisations	25
1.3 RESEARCH QUESTIONS AND CONTRIBUTION TO KNOWLEDGE	26
1.4 Structure of the thesis	28
CHAPTER 2: LITERATURE REVIEW	31
2.1 Urban Agroecology	33
2.2 Agroecology is political and holistic	35
2.2.1 Redressing a co-opting imbalance: urban political agroecology in Europe	38
2.3 DEEP FOOD DEMOCRACY	43
2.4 CRITICAL LEARNINGS FROM URBAN AGRICULTURE	44
2.4.1 Food Justice	46
2.4.2 Missionary complex	48
2.4.3 Local Trap	50
2.5 The neoliberal city	53
2.5.1 Dialectical tension; transformative aims <> viability in the co-opting neoliberal city	57
2.5.2 Trifecta of urban agriculture, viability and spatial justice	60
2.6 SUMMARY: " <i>Mind the GAP(s)</i> !"	63
CHAPTER 3: RESEARCH CONTEXT AND ORGANISATIONS	67
3.1 London Grown Workers Co-operative	71
3.1 London Grown Workers Co-operative 3.2 Workers' co-operatives as a strategic place for urban agroecology	

3.4 WLHC as a food hub 'plus'	85
CHAPTER 4: METHODOLOGY	88
4.1 RESEARCH OBJECTIVES AND TWO INTERCONNECTED ENQUIRIES	
4.2 ACTION RESEARCH APPROACH AND EPISTEMOLOGICAL POSITION	
4.2.1 Critiques of action research, dialogue and a transformative agroecological learning	!
framework	94
4.3 VALIDITY, POSITIONALITY AND ETHICS	
4.3.1 Reflexivity and insider positionality	
4.4 Overview of research activities and data collection	103
3.2.1 (Auto) ethnography	108
3.2.2 Focus Groups	109
4.5 Wolves Lane Centre methods and analysis development	110
4.5.1 Photovoice and Workshop 1	115
4.5.2 Graphic Harvest	119
4.5.3 Community food mapping and Workshop 2	119
4.5.4 Communal cooking and statement writing in Workshop 3	121
4.5.5 Twelve principles and a poster	124
4.5.6 Analysis in the WLHC enquiry	126
4.6 LONDON GROWN WORKERS CO-OPERATIVE METHODS AND ANALYSIS DEVELOPMENT	126
4.6.1 'Reflective walk' (mobile focus group)	129
4.6.2 Document analysis	
4.6.3 Interviews	132
4.6.4 Analysis in the LGWC enquiry	133
4.7 Summary	
CHAPTER 5: AN EXPERIMENTAL INTERVENTION IN FOOD DEMOCRACY TOWARDS URBAN	
AGROECOLOGY AT A FOOD HUB	138
5.1 CREATIVE POPULAR EDUCATION AND DEEP DEMOCRATIC KNOWLEDGES FOR URBAN AGROECOLOGY	139
5.1.1 Translation in dialogue of practices	
5.1.2 Critical Conversations	
5.2 Community definitions of health and holistic food beyond the 'missionary complex'	151
5.3 TRANSLOCAL FOODWAYS, EMBEDDING ANTI-OPPRESSION FRAMEWORKS AND BREAKING OUT OF THE 'LOCA	AL TRAP ['] —
3,563	158
5.3.1 Supporting deep democratic cultures with anti-oppression politics	163
5.4 TRANSFORMATIVE CULTURES, RELATIONSHIPS AND 'CRITICAL LOVINGNESS'	
5.5. Summary	

CHAPTER 6: URBAN AGROECOLOGY AND A WORKERS' CO-OP; LIVELIHOODS, CARE AND VI	ABILITY .174
6.1 CO-OP BUSINESS DEVELOPMENT AND LIVELIHOOD GENERATION	175
6.1.1 Livelihoods	180
6.2 WHY WERE FINANCIAL VIABILITY AND LIVELIHOODS NOT GENERATED?	185
6.2.1 Contextual conditions	185
6.2.2 Internal factors	189
6.3 IMPACTS OF FINANCIAL INSECURITY ON ANTI-CAPITALIST LIVELIHOODS	195
6.3.1 Limited resources and a lack of contact in the neoliberal city	199
6.4 Prefigurative compromise and <i>diálogo de saberes</i> towards viable urban agroecologies	203
6.5 CO-OPERATIVES BEYOND 'THE WORKER' TOWARDS DEEP FOOD DEMOCRACY	208
6.6 SUMMARY AND PRACTICAL LEARNINGS	211
6.6.1 Budget estimate, practical learnings and suggestions	213
CHAPTER 7: CONCLUSIONS	218
CHAPTER 7: CONCLUSIONS	
	219
7.1 Summary of key arguments	219 223
7.1 Summary of key arguments	219 223 225
 7.1 Summary of key arguments 7.2 Methodological learnings and limitations of the research 7.3 Contributions to knowledge 	219 223 225 228
 7.1 Summary of key arguments 7.2 Methodological learnings and limitations of the research 7.3 Contributions to knowledge 7.4 Recommendations for further research and action 	219 223 225 228 231
 7.1 Summary of key arguments 7.2 Methodological learnings and limitations of the research 7.3 Contributions to knowledge 7.4 Recommendations for further research and action BIBLIOGRAPHY 	219 223 225 228 231 278
7.1 Summary of key arguments 7.2 Methodological learnings and limitations of the research 7.3 Contributions to knowledge 7.4 Recommendations for further research and action BIBLIOGRAPHY	
7.1 Summary of key arguments 7.2 Methodological learnings and limitations of the research 7.3 Contributions to knowledge 7.4 Recommendations for further research and action BIBLIOGRAPHY APPENDIX Appendix A: Interviews	
7.1 Summary of key arguments 7.2 Methodological learnings and limitations of the research 7.3 Contributions to knowledge 7.4 Recommendations for further research and action BIBLIOGRAPHY APPENDIX Appendix A: Interviews Appendix B: Food for Thought; towards food principles at Wolves Lane, April 2019	

Table of Figures

FIGURE 1: DIAGRAM REPRESENTING THE KEY AREAS OF LITERATURE THAT MAKE UP A THEORETICAL
FRAMEWORK TO EVOLVE URBAN AGROECOLOGY WITH FOOD DEMOCRACY
FIGURE 2: MAP OF GREATER LONDON WITH PG AND WLHC HIGHLIGHTED IN YELLOW IN NORTH
LONDON (SITES NOT TO SCALE) (SOURCE: MAPROOM N.D.)
FIGURE 3: MAP OF THE NORTHERN AREA OF GREATER LONDON71
FIGURE 4: AERIAL VIEW OF THE PASTEUR GARDENS SITE WITH ENTRANCE MARKED
FIGURE 5: VIEW OF THE PASTEUR GARDENS SITE IN NOVEMBER 2015 FROM UP A TREE, SHOWING THE
BRAMBLES AND THE TREES AROUND THE EDGE OF THE SITE
FIGURE 6: QUEENSLAND AVENUE ENTRANCE TO PASTEUR GARDENS IN FEBRUARY 2016
FIGURE 7: GRASSY AREA NEXT TO TREES AND BRAMBLES THAT WAS CLEARED FOR A GARDEN AREA,
NOVEMBER 2015
FIGURE 8: THE EIGHT-YEAR GROWING ROTATION DEVELOPING AT PASTEUR GARDENS, 2017
FIGURE 9: GARDENING VOLUNTEER SESSION AT PASTEUR GARDENS, 2017
FIGURE 10: THE PALMHOUSE AT WLHC IN SEPTEMBER 2017
FIGURE 11: WLHC AFTER HARINGEY COUNCIL HANDED OVER MANAGEMENT TO ORGANICLEA IN APRIL
2017
FIGURE 12: A COMMUNITY GARDENING SESSION RUN BY LGWC IN JULY 2017
FIGURE 13: AUBERGINE AND CUCUMBERS GROWN BY LGWC IN 2018
FIGURE 14: A FRAMEWORK FOR TRANSFORMATIVE AGROECOLOGY LEARNING IN EUROPE (ANDERSON
ET AL. 2018)
FIGURE 15: MAP OF ITERATIVELY DEVELOPED METHODS THROUGH THE RESEARCH PERIOD
FIGURE 16: DUAL ITERATIVE ENQUIRY WITH OVERLAPPING ACTION-REFLECTION CYCLES
FIGURE 17: CLOSE-UP OF ACTION-REFLECTION CYCLE WITHIN AN ACTION RESEARCH PROJECT (SOURCE:
ANDERSON 2013)
FIGURE 18: THE TRIAD OF PRAXES THE WLHC FOOD POLICY PROCESS WERE INSPIRED BY AND DREW ON
IN ITS ITERATIVE DEVELOPMENT
FIGURE 19: FLYER ADVERTISING THE FIRST WLHC WORKSHOP USING A PHOTOVOICE METHOD
FIGURE 19: FLYER ADVERTISING THE FIRST WLHC WORKSHOP USING A PHOTOVOICE METHOD
FIGURE 19: FLYER ADVERTISING THE FIRST WLHC WORKSHOP USING A PHOTOVOICE METHOD 116 FIGURE 20: PHOTOGRAPHS SUBMITTED AS PART OF PHOTOVOICE EXERCISE IN PRIOR TO WLHC
FIGURE 19: FLYER ADVERTISING THE FIRST WLHC WORKSHOP USING A PHOTOVOICE METHOD 116 FIGURE 20: PHOTOGRAPHS SUBMITTED AS PART OF PHOTOVOICE EXERCISE IN PRIOR TO WLHC WORKSHOP 1
FIGURE 19: FLYER ADVERTISING THE FIRST WLHC WORKSHOP USING A PHOTOVOICE METHOD 116 FIGURE 20: PHOTOGRAPHS SUBMITTED AS PART OF PHOTOVOICE EXERCISE IN PRIOR TO WLHC WORKSHOP 1
FIGURE 19: FLYER ADVERTISING THE FIRST WLHC WORKSHOP USING A PHOTOVOICE METHOD 116 FIGURE 20: PHOTOGRAPHS SUBMITTED AS PART OF PHOTOVOICE EXERCISE IN PRIOR TO WLHC WORKSHOP 1

FIGURE 24: DEIRDRE (LEFT) ENGAGING WITH A PARTICIPANT AT WLHC WORKSHOP 2 (DECEMBER 2018)
FIGURE 25: RESPONSES TO THE COMMUNITY MAPPING EXERCISE AT WLHC WORKSHOP 2 (DECEMBER
2018)
FIGURE 26: MAKING PIEROGI AS PART OF WLHC WORKSHOP 3 (APRIL 2019)
FIGURE 27: PARTICIPANTS REARRANGING THE FIVE CLUSTERS OF FOOD VALUES THE FACILITATION
TEAM BROUGHT TO WLHC WORKSHOP 3 BASED ON WORKSHOP 1 AND WORKSHOP 2
FIGURE 28: PARTICIPANTS REARRANGING THE FIVE CLUSTERS OF FOOD VALUES THE FACILITATION
TEAM BROUGHT TO WLHC WORKSHOP 3 BASED ON WORKSHOP 1 AND WORKSHOP 2 123
FIGURE 29: POSTER DOCUMENTING THE WLHC CONVERSATIONS (CREDIT: DREW SINCLAIR) (ZOOM FOR
DETAIL)
FIGURE 30: METHODS USED FOR INSIDER ACTION RESEARCH FOR THE LGWC ENQUIRY
FIGURE 31: ITERATIVE METHODS USED WITH PARTICIPATORY EVALUATION IN RELATION TO THE
DEVELOPMENT OF LGWC AS A BROADER PROCESS OF INFORMAL ACTION LEARNING
FIGURE 32: PHOTOGRAPHS FROM 'REFLECTIVE WALK' THROUGH AN INDUSTRIAL ESTATE IN
TOTTENHAM, SEPTEMBER 2019 130
FIGURE 33: ANALYSIS IN THE LGWC ENQUIRY
FIGURE 34: ANALYTIC TOOL FOR CO-ANALYSIS TO EXPLORE HOW LEARNINGS THROUGH LGWC RELATED
WITH BROADER SOCIAL DYNAMICS IN LONDON AND SOCIAL STRUCTURES
FIGURE 35: BENEFITS FOUND IN THE STUDY OF CREATIVE POPULAR EDUCATION TOOLS SUPPORTING
FOOD DEMOCRACY
FIGURE 36: PARTICIPANTS' PHOTOGRAPHS OF PLANTS AND GREEN SPACES AS PART OF THE LGWC
PHOTOVOICE EXERCISE
FIGURE 37: SECTION OF GRAPHIC HARVEST HIGHLIGHTING A KEY QUESTION OF "HOW DO WE FEEL
ABOUT MEAT?" AT WORKSHOP 1 (CREDIT: DREW SINCLAIR)
FIGURE 38: WORD FREQUENCY OF WLHC WORKSHOP 1 TRANSCRIPT
FIGURE 39: COMMUNITY FOOD MAP (WLHC WORKSHOP 2, DECEMBER 2018) 158
FIGURE 40: CUT OUTS FROM THE LGWC WORKSHOP 1 GRAPHIC HARVEST AND FLIPCHART NOTES
HIGHLIGHTING DIFFERENT RELATIONSHIP CHARACTERISTICS

Table of Tables

TABLE 1: TIMELINE OF METHODS TO EXPAND ON FIGURE 15	. 105
TABLE 2: OUTLINE OF ITERATIVE METHODS, ANALYSIS DEVELOPMENT AND RESEARCH OUTPUTS IN	
WLHC ENQUIRY	115
TABLE 3: RESULTS FROM THE COMMUNITY MAPPING EXERCISE IN RESPONSE TO THE QUESTION: W	'HAT
FOODS DO YOUR FRIENDS OR FAMILY EAT OR MAY HAVE EATEN IN THE UK OR COUNTRIES OF	
ORIGIN? (IN ALPHABETICAL ORDER OF FOOD)	. 160
TABLE 4: PROFIT AND LOSS FOR LONDON GROWN WORKERS CO-OPERATIVE, 2015–2020	. 176
TABLE 5: COMPARISON OF LGWC TRADING INCOME AND WAGES, 2017–20	177
TABLE 6: COMPARISON OF MARCH 2018 BUSINESS PLAN TARGETS WITH ACTUAL FOOD SALES AND	
GRANT INCOME	179
TABLE 7: AVERAGE NUMBER OF PAID DAYS PER MONTH IN DIFFERENT AREAS OF LGWC WORK (N.B	
FOOD GROWING WORK SEASONAL MARCH TO NOVEMBER)	182
TABLE 8: LGWC GRANT FUNDING 2015–20	191
TABLE 9: BREAKDOWN OF LGWC FUNDING GRANTS FOR CO-OP BUDGETS 2016–20	192
TABLE 10: ESTIMATED RETROSPECTIVE BUDGET FOR SETTING UP LGWC AT PASTEUR GARDENS IN TH	HE
FIRST TWO YEARS	214
TABLE 11: PRACTICAL LEARNINGS/SUGGESTIONS FROM EXPERIENCES WITH LGWC (IN NO PARTICUL	AR
ORDER)	217
TABLE 12: THESIS AIM, OBJECTIVES AND KEY QUESTIONS	. 219
TABLE 13: MAP OF CONTRIBUTIONS TO KNOWLEDGE WITHIN THE THESIS	227

Abbreviations

AR: Action Research
AMG: Anonymous Market Gardener
BAME: Black, Asian and minority ethnic
BPOC: Black people and People of Colour
CFGN: Community Food Growers Network
DA: Document analysis
DDS: diálogo de saberes
FS: Food sovereignty
LGWC: London Grown Workers Cooperative
n.d.: no date
PC: Prefigurative Compromise
PE: Popular education
PG: Pasteur Gardens
TALF: Transformative Agroecological Learning Framework
UA: Urban agriculture
UAGC: Urban agroecology
WC: Workers' co-operative
WLHC: Wolves Lane Horticultural Centre

Chapter 1: Introduction

This thesis explores how the emerging praxis of urban agroecology (UAGC) can evolve with a central feature of deep food democracy while surviving and thriving in the neoliberal city. The enquiry engages in insider action research in the early development of a food hub and a workers' co-operative in North London, UK, with both organisations holding agroecological intentions. Through iteratively developed enquiries the thesis contributes practical and strategic findings related to policy-creation, organisational structure, and viability. Ultimately, the work explores how viable urban agroecologies can be built from the city, rooted in underlying principles of political agroecology such as democracy and social justice, while generating resources to engender these within the inequitable and co-opting neoliberal city. In this chapter I define key terms, before relaying how the topic and sub-questions of the thesis were arrived at in relation to food movement experiences prior to the PhD, academic discourse, and on-the-ground issues within the organisations, that pointed to a focus on urban agroecology with deep democracy. I set out the key aims and questions of the thesis and outline how I researched these, before summarising the contribution the thesis makes. This chapter ends with a structure outline of the following chapters.

1.1 Key definitions and a polyculture of food movements

As chapter 2 goes into key theory in detail, in this chapter I summarise background discourses with which the thesis engages. To support this, I first define some of the key terms. Through the thesis I refer to inequitable or unjust social structures, which transformative politics ultimately aim to shift / challenge / overturn. To define them I apply bell hooks' (2004: 17) description of power structure underlying social order as, "imperialist white-supremacist capitalist patriarchy", that shape much of contemporary life (Gayá n.d.). When asked about this in an interview, hooks replied:

"We can't begin to understand the nature of domination if we don't understand how these systems connect with one another. Significantly, this phrase [imperialist white supremacist capitalist patriarchy] has always moved me because it doesn't value one system over another...for me, that phrase always reminds me of a global context, of the context of class, of empire, of capitalism, of racism and of patriarchy. Those things are all linked – an interlocking system" (Yancy and hooks 2015).

In terms of 'transformation' as a way to change inequitable structures, I use the definition, "the act of combining to make new ideas, concepts and associations" (Light et al. 2011: 7); while 'power', either to instil inequitable social structures or be built to change them, I define as a decentralised pervasive force (Kesby 2005: 2040), created in relationships (Foucault 1980) and *potential* in nature (Giddens 1979) to be used in domination over people (Giddens 1993) or with others to make positive change (Grant et al. 2008). 'Foodways' are also referred to through the thesis; and I define

these as an "intimate commodity" that is taken through the body as physical nourishment and symbolic of cultural histories, practices and identities (Agyeman 2013, Winson 1993).

A key concept in the thesis is that of the neoliberal city. Neoliberalism emerged in the 1970s and can be generally described as political project to reassert class power through the removal of state regulations and bolstering the free movement of capital (Levkoe 2011, Massey 2013). In regards to neoliberalism, cities have become drivers of, and are shaped by, neoliberal processes such as gentrification, increasing privatisation and financialisaton of space, and austerity, which result in the uneven distribution of opportunities and resources such as housing, water, energy and food (Dehaene et al. 2016, Soja 2010).

In arriving at UAGC as the main focus of this thesis in relation to food democracy, discussion traverses concepts and mobilisations that make up a broad family of food politics as a "polyculture of movements" (Alkon and Agyeman 2011). These broadly aim to challenge and shift the dominant food regime as sustained by powerful neoliberal configurations (McMichael 2005); which has cemented power for decades over how food is produced and accessed with privatisation of seeds and land in export-led, profit-driven economics (McMichael 2009, Jansen 2015). This broad family of movements at times correlate and overlap with Alkon and Agyeman (2011), for instance defining 'food justice' with a key strand of 'food sovereignty' (FS) alongside equitable food access. Food sovereignty is best defined by movement mobilisations as, "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 2007). FS particularly emphasises that communities and states should decide both their own food practices and policies (Patel 2009, Wittman et al. 2010).

There is also a strong link between food sovereignty and agroecology with practitioners stating that you can't have one without the other (Anderson et al. 2015). While agroecology takes an integrative and holistic approach to encompass, "the ecology of … entire food systems, [including] ecological, economic and social dimensions" (Francis et al. 2003, Gallardo-López et al. 2018), it also is political. Political agroecology is being increasingly recognised, asserting a radical vision that foregrounds community self-organisation and autonomy in a paradigm shift of structural and cultural power dynamics that shape the ecologically unsound and unjust food system (Anderson et al. 2019, Gliessman 2011, de Molina 2013). Political agroecology and food sovereignty have commonality in asserting that people and communities should have agency in how the food system they are part of operates, underpinned with principles of social justice and sustainability. In the light of suggestions that agroecology will not last without a food sovereignty policy that supports it (Anderson et al. 2015) I deduce that FS is more focused on frameworks for political mobilisation,

such as campaigning for representation at various levels of governance from the local to the transnational (Windfuhr and Jonsén 2005); while agroecology is political in quality as the network-based praxis embodies social and epistemic justice and actualises a totally different reality to the one produced by dominant inequitable social structures. In other words agroecology articulates food sovereignty on the ground as the foundation for transformative food systems (Anderson et al. 2018).

Food democracy is another discourse that has crossover with the aforementioned concepts, an underlying assertion being that people should have equitable opportunities in actively shaping the systems that affect their everyday lives (Hassanein 2008) through direct participation (not proxy participation) in 'empowered participatory governance' (Fung and Wright 2001). A difference I note between food democracy and food justice is that the latter underlines the extent to which identities of social groups (i.e. class) influence inclusion or exclusion from food system transitions, and thus must be central to transformations (Brent et al. 2015, Gottlieb and Joshi 2010). I would also argue that a difference between food sovereignty and food democracy is that the former is more focused on peasant identities rooted in Global South political movements.

Within discussions of food movements, this thesis focuses on agroecology being built from the city and aims to learn from a closely connected practice of urban agriculture (UA). UA engages in a broad range of activities including all forms of food growing in and around cities, processing of foods, education services, and animal husbandry for instance, with foods mainly distributed in that urban area (Santo et al. 2016, McClintock 2014, Mougeot 2005). With the majority of the world's human population living in cities (UN DESA 2018), with estimates of one billion people around the world involved in urban agriculture (Mougeot 2015), food production is certainly more than just a rural phenomenon (Thebo et al. 2014: 1). UA engages in the above *movement* aspects, i.e. democracy, justice, sovereignty, to different degrees. I introduce urban agroecology and deep democracy, as the two major frameworks, within the text below outlining how they became the focus of the work. With key terms and background food movements defined, I now turn to introduce how the key questions of this thesis were developed and how they respond to gaps in knowledge.

1.2 Development of the research questions and aims

When I began this PhD programme I was finishing three years as a part-time network co-ordinator for the Community Food Growers Network (CFGN), "a London-based support network of food projects putting land into community use" (CFGN n.d.), and I was a year into setting up a food growing and education project called London Grown Workers Co-operative (LGWC). LGWC was the result of Organiclea's 'Farm Start' programme that supported trained growers in finding land for setting up agroecological enterprises, through which a team of four of us had been given access to a public land site in Enfield, North London called Pasteur Gardens (PG) in 2016. PG is a sevenacre site with woodland and was largely covered in 15-foot-high brambles with no amenities on arrival (see chapter 3). In 2017 LGWC also joined a consortium of groups setting up a community food hub at Wolves Lane Horticultural Centre (WLHC), two miles away from Pasteur Gardens, also part of the Organiclea's 'Farm Start' programme. The horticultural centre had six professional glasshouses and a palm house, café, kitchen and barn. LGWC's role was to set up food growing and related education programmes in tandem with the market garden activities at Pasteur Gardens. Both PG and WLHC are owned by the Borough of Haringey council.

Prior to being part of LGWC I had mowed private lawns and trimmed bushes on-and-off since 2003 and had been involved in community food growing in London since 2009, working in gardens in volunteer and paid capacities that were focused on community development and education rather than on enterprise activities. London has an emerging urban agroecology movement, to which WLHC and LGWC are connected, and is working to, "establish non-extractive and community-focused spatial relations and post-capitalist economic values in the urban fabric" with one feature being the generation of anti-capitalist livelihoods through workers co-operatives (Tornaghi and Dehaene 2019: 13). As an urban space where local grassroots movements mobilise for democratic control while the city promotes the global value chain as a key institutional domain of neoliberalism, London is a unique and contradictory place (Buchanan et al. 2017) in which to understand how urban agroecology can develop with deep democracy. In offering a textured insider perspective, I focused this PhD on development of the food hub (WLHC) and the workers' co-operative (LGWC) as part of an emerging urban agroecology movement, bringing into the research issues that had emerged from my previous food movement experiences, in tandem with academic discourses and the emerging questions related to project development of these much larger sites with new commercial aspects. These underlying elements in combination shaped the iterative development of this thesis: literally between the garden and the library, community meeting and academic workshop, and reflects its place between scholar activism and urban movements (Deh-Tor 2017).

1.2.1 Experiences within UK food movements

My role with CFGN led to my participation in organising the UK's second food sovereignty gathering in 2015, attended by 300 people, which aimed to build a stronger political movement for a democratic, sustainable and fair food system. The event generated for me three 'experiences' of relevance to the aims and topic of this thesis. Firstly, the gathering being, "inspired by the efforts of farmers and social movements around the world" (UK Food Sovereignty Movement 2015) raised questions as to how political ideas and movements travel considering different social contexts in relation to, for example, class and peasant histories, land, and colonialism. I felt and observed a tension in building a movement that respected the cultures and politics of the roots of food sovereignty, and also wondered how underlying principles might manifest in an adapted way to a new context taking into account risks of cultural appropriation. A second related experience concerned the issue of local food and what 'local' meant. Different perspectives arose in discussions concerning a UK narrative of 'local food' with emphasis on low food miles, which seemed to disavow principles of culturally appropriate foods with a lack of consideration of the foodways of diverse diaspora communities in the UK. For example, how does a position that prioritises locally grown food understand the consumption of tea, coffee and rice in the UK, for instance, and how does this impact on whose foodways are culturally accepted in movement spaces?

A third concern, similarly connected to the first two, was observations expressed that those in attendance were predominantly middle-class and white, and that for a movement with principles of social justice and democracy, working-class and BPOC voices were under-represented. This was not the first time that such observations had been made concerning demographics of the UK local food movement. These experiences showed that there were live issues in terms of application/co-option of political food movement principles rooted in the Global South in the new context of the UK, concerns in terms of just and democratic participation within political food movements, as connected to how emerging food movement narratives were being shaped- thus re-entrenching exclusionary dynamics.

There are two further experiences, related to my broader role within CFGN, which have strongly shaped my research. In producing a map of community food growing projects in London (CFGN 2015) as a resource to both practitioners and members of the public, I also generated information about the barriers that projects were facing, and how a network could support them in overcoming these. Feedback coalesced around two themes: viability as related to funding and resources, and issues of access to land. The latter is highlighted by three CFGN members, in areas of rapid gentrification namely Brixton, Tottenham and Elephant & Castle, having lost the sites of their projects in the couple of years prior to 2016. A second point in connection to this is the complex relationship to gentrification that exists in terms of community food growing in the city. While community food growing projects experienced loss of land and a lack of financial resources, there were also critical considerations of how community food growing projects were part of greenwashing inequitable regeneration programmes, and how sales of organic foods at relatively expensive prices contribute to the gentrification of high streets, with natural foods being central to

many diasporic cultures in London impacted by gentrification (Ziaei 2018).

In summary, the experiences and questions that emerged through my role with CFGN highlighted connected issues for urban agriculture (UA) and local food movements: viability in relation to income and land access; what local meant in local food; a complex relationship between UA and gentrification; social inequities re-embedding in movement cultures; and consideration of how political movements in the Global South can be expressed in different socio-ecological contexts in the Global North. These issues and dialogues that were live in UK food movement development were the initial motivation for this research, with the aim to continue to explore these with colleagues directly connected to on-the-ground action and reflection. While these issues have been expanded with additional themes responding to emerging considerations in the two organisations and connected with academic literature as outlined in the following paragraphs, these key topics remain among the kernels of the thesis. They also reflect my own commitment to a practice that, as part of my motivation to participate in food movements and community food growing, engages with connected principles of social justice and ecology, as well as also really liking gardening with people.

1.2.2 Connecting experiences to literature; towards urban agroecology

In engaging with academic literature for this PhD I found a plethora of discourse that documented and discussed similar experiences to those outlined above. The 'multifunctional' nature of urban agriculture (McClintock 2010), for instance, and its generation of numerous environmental, economic, cultural and social outcomes is well documented (Bell et al. 2016, Mukerji and Morales 2010, Bradley and Galt 2014), with some scholars highlighting its political qualities (Heynen et al. 2006, Certomà and Tornaghi 2015). Critical studies of UA, particularly from food justice perspectives, also highlight how food movements embed social inequities into discourses and practices (Tornaghi 2017, Kato 2013, Glennie and Alkon 2018, Reynolds and Cohen 2016). Studies connected with experiences outlined in the UK, such as naming the dynamic of socially privileged actors "bringing good food to others" (Guthman 2008), thus creating disempowering and patronising epistemologies with low income communities and communities of colour (Garzo Montalvo 2015). Critical perspectives on local food related describe the "local trap", which equates locally grown with inherently good and inclusive of social justice, democracy and ecological sustainability (Born and Purcell 2006, DuPuis and Goodman 2005), and can produce a 'defensive localism' that protects a homogenous 'local' (Winter 2003, Hinrichs 2003). UA is also charged with elitism in combination of the "local trap" and "bringing good food to others", when it is seen to champion local, organic food that is relatively expensive and often inaccessible to low-income communities, as part of a "market as movement" strategy (Sbicca 2012, Pollan 2006).

I also found that issues of viability for UA initiatives and a complicated relationship with gentrification experienced in London were present in the academic discourses. For instance, scholars have highlighted how the aims of UA – jobs, equitable leadership opportunities and affordable foods - are unattainable without external investment (Daftary-Steel et al. 2015), and a lack of viability and the short-term nature of funding hinders socially just urban agricultures and development of long-term food democracy (DeLind 2014, McIvor and Hale 2015, Siegner et al. 2019). A lack of policy support for expanding UA (Pothukuchi 2004, Bedore 2010) and disabling factors of the neoliberal city have contributed to the practice remaining residual, marginal and interstitial (Tornaghi 2017). While urban agriculture has also been connected to ecological gentrification and 'selling' cities to higher income residents (Rutt and Loveless 2018, Dooling 2009, Bedore 2010) thus contributing to the neoliberalisation of urban space.

In summary, while UA is celebrated for its multiple benefits and at times transformative politics, the practice can also be seen to embed social inequities in practices and narratives that include neoliberal urban regeneration. Finding itself in a weak position with a lack of funding, insecure access to land, and a lack of policy support, UA experiences a complex relationship with the neoliberal city in which it resides. This dynamic is well articulated in work describing UA as neither neoliberal nor radical, but has to be both if it is to create opportunities for proliferation (McClintock 2014).

With UA being in this predicament, and issues highlighted in literature bridging with experiences in UK food movement, what became particularly prescient in the direction of this thesis was acknowledging calls for new theoretical approaches to answer practical questions where conceptions of 'alternative food networks' and 'local food systems' have not proved fully effective (García-Sempere et al. 2018, Moragues-Faus and Marsden 2017, Renting et al. 2012). The framework that offered principles of social and epistemic justice, community-based democracy, and ecological symbiosm, to engage with the complexities of developing just and sustainable urban food systems, was urban agroecology (UAGC). This approach of developing agroecology from the city is highlighted in the proposal that, "urban agriculture and agroecology may help create the principles and dimensions of an agroecological approach to productive systems, social subjects and urban territories. We can term it 'urban agroecology'" (de Almeida and Biazoti 2017). While UAGC is still an emerging concept without comprehensive shared understandings (Hoekstra and Torgnaghi 2017) there is some consensus that it is a *political* praxis centring analysis of power in a holistic approach towards the generation of urban food systems grounded in sustainable and just socialecologies (van Dyck et al. 2017, Tornaghi 2017, Siegner et al. 2019, Anderson 2017). Some early themes that have emerged are: land stewardship, healthy and culturally appropriate food access, fair living conditions for urban agroecological workers, democracy, and symbiotic nurturing of living

soils and biodiversity (Mount 2017, Altieri et al. 2017, Schmutz 2017, Van Dyck et al. 2017, López et al. 2017).

UAGC has been highlighted as a robust framework whereby urban food justice practitioners can identify synergistic ecological, socio-cultural and economic benefits of UA (Siegner et al. 2019: 581), and a way of reconnecting urban and agrarian food movements (Tornaghi 2017). Importantly, urban agroecology connects to broader political issues, as the young praxis is, "not a goal, yet an entry point into, and part of, much wider discussions of desirable presents and futures" (Van Dyck et al. 2017: 6). For instance, an urban agroecology framework, that connects local places to broader political issues of the neoliberal food regime, holds potential to reconcile limitations of the local trap with ultimately aiming to break out of it. Transformative epistemologies at the heart of agroecology, such as *diálogo de saberes* which roughly translates as dialogue among different knowledges and ways of knowing (Martínez-Torres and Rosset 2014: 980), also hold pathways for building equitable knowledge-exchange into just urban food systems and shifting missionary complexes of 'bringing good food to others'. In terms of framing the research based in London, urban agroecology, therefore offered a praxis that connected with the issues arising in my experiences of the UK food movement and linked with academic studies. Considering that there is a lack of empirical research on urban agroecology, needed to ground emerging theory in practice (Siegner et al. 2019, Renting 2017), and given that the full political potential of urban agroecology is yet to be metabolised (Deh-Tor 2017: 9), this thesis aims to contribute new knowledge towards the young praxis' development.

While engaging in literature through the PhD has supported building understanding and connecting practical learnings with different contexts and theoretical framings, it also reinforced a disconnection between the academy and political movements. The concepts referenced above, such as the 'local trap', 'bringing good food to others', and analysis on the viability of UA, for example, could have really supported understanding the barriers faced on-the-ground in the previous experiences highlighted. It felt that these discussions in academic journals were largely not filtering through to movement development, reflecting a lack of a "vital intellectual connection" between social movements and academic literature, and the production of theory, "more about than for the social movements" (Epstein 1990: 39). While I was drawn to action research and participatory methodologies in the proposal for the PhD, this above reflection restated the importance for me of this research being embedded in action on-the-ground with colleagues. I now introduce how developments in the food hub at WLHC and the workers' co-operative, LGWC, contributed to shape the aims and questions of this thesis.

1.2.3 Iterative development of enquiry within organisations

The overall methodological approach of the thesis has been one of action research, which is a "family of practices of living inquiry" (Reason and Bradbury 2008: 1) that in asserting multiple ways of knowing integrates theory and practice, scholarship and activism (Gayá Wicks et al. 2008) from the view that the world can be understood in endeavouring to change it (Brydon-Miller et al. 2003). AR is fitting for agroecology knowledge processes as they both share the principle that for there to be social justice there must be cognitive justice (Santos 2007a, de Oliveira Andreotti 2011), acknowledging that traditional, lived and indigenous epistemologies have been systematically marginalised by a Eurocentric knowledge monopoly (People's Knowledge Editorial Collective 2016a, Chambers 1997). With agroecology being at risk of co-option in Europe and losing its political qualities (Altieri and Holt-Giménez 2016, Mama D and Anderson 2016) an action research approach to developing UAGC offers opportunity to build on transformative pedagogies necessary for agroecology in Europe (Anderson et al. 2018) and also within urban food movements.

Scoping periods for the research pointed to two separate yet connected enquiries; one process based in the workers' co-operative LGWC, and one process situated in the food hub at WLHC, where LGWC was also a consortium member. At WLHC the AR intervention was to co-facilitate with colleagues a community-based food policy process in response to a plan for the policy to be written within the management group. This co-designed process engaged in creative and practical popular education exercises to centre community definitions of food and health that challenged "bringing good food to others" and the "local trap". Over three workshops in six months, integrating photovoice, graphic harvesting, communal cooking, and community mapping, the beginnings of a food policy was produced in March 2019, with 12 key principles for the food hub to be guided by in decision-making.

The interventionist aspect of the AR with LGWC was that with the co-op being under-resourced and overstretched there was little time for reflecting on the development of the organisation; and so a mobile focus group and interviews were set up accordingly to respond to this. These were complemented with document analysis, which gave organisational insight into business plans, and meeting minutes from 2015 to 2020. This enquiry focused on LGWC engaged with the aim of the organisation to generate anti-capitalist livelihoods and how viability related to building an equitable and caring urban agroeocology, with evaluation of the workers' co-operative as a model to support this. Across the two enquiries a combination of eight different participatory and qualitative methods were used, and 67 people were engaged with. Running through the enquiries was a research diary engaging in (auto-)ethnography. Section 4.3 outlines considerations of my 'insiderness' in relation to building catalytic validity into the work, and engages in a reflexive approach to my positionality as a white, university-educated cis-male in relation to AR approaches and aiming to generate solidaristic relations through the enquiry.

With the issue of democracy and just participation emerging at WLHC, and questions of viability being pertinent in meeting agroecology goals within LGWC, the conversations with colleagues and issues arising intertwined with dialogues I had experienced in UK food movements previously, and academic discourse. I now outline why 'deep democracy' was chosen as a key feature of urban agroecology, summarise the key questions and objectives of the thesis and what this work contributes to the development of the young praxis.

1.3 Research questions and contribution to knowledge

A common theme that emerged through the iterative development of the research was food democracy, as seen in; the WLHC enquiry, the structuring of LGWC giving workers control of their labour, issues highlighted in UK movements concerning equitable participation, and is a central feature of agroecology. Democracy appears as a critical turn in the development of UAGC as a deficit in democracy within governance is the "sticky' and omnipresent dynamic" that determines the transformative nature of agroecological transformations in food movements (Anderson et al. 2019: 17). Democracy also speaks to the UK's situation of "post-democracy" (Crouch 2004), where corroded institutional forms of parliamentary democracy disguise decisions being made by political and economic elites, as is the case with the neoliberal city (Harvey 2012). I chose the conception of "deep democracy" (McIvor and Hale 2015) as was developed in relation to limitations of UA, and has appropriate characteristics for evolving urban agroecology of; emphasising democratic relationships, mapping of power, and commons-making. The mapping of power being especially important in terms of applying justice-based analysis, and power and democracy being at the centre of an agroecology vision (de Molina 2013). The importance of enduring relationships at the heart of democracy also speaks to definitions of power and transformation as being relational as well as structural.

In terms of contributing to knowledge in the development of UAGC, I do not aim to better define the term as a primary motivation; rather, the thesis aims to understand how the young praxis can be developed with a central feature of deep food democracy with the agroecological approach of action through bottom-up place-based organizing (Anderson et al. 2019). This connects the approach of the research to prefiguration, in aiming to advance practice that develops elements of a desired future in the present – and has been described as, "fertile pedagogical grounds for agroecological transitions" (Tornaghi and Dehaene 2019: 8). It is this approach, in understanding this thesis as a fractal within the slow constructivism of knowledge (see 4.2), that underpins the title term to 'evolve' urban agroecology, through practice-based epistemology.

The **overall aim** of the thesis, as consequence of the coalescing of my previous experiences as a practitioner, academic discourse, and on-the-ground developments within a food hub and a workers' co-operative, is:

To develop understandings of urban agroecology with a focus on deep food democracy and how this relates with tensions of trying to exist in a neoliberal city.

The related question to this is, '*How can urban agroecology evolve with food democracy as a feature whilst surviving and thriving in the neoliberal city?*' With this aim there are **three objectives and related sub-questions** for the research:

1. To co-produce a just democratic process in shaping foundational principles of a food hub with urban agroecological intentions.

How can a food hub develop urban agroecology with a central tenet of food democracy?'

2. To develop understanding of how urban agroecologies can be viable in a neoliberal city economy.

How can urban agroecological initiatives be viable in the neoliberal city?

3. To explore with co-workers our individual and collective learnings in developing a workers' cooperative as an elevating organisational structure for urban agroecology.

Is a worker's co-operative an elevating model in developing urban agroecology towards food democracy?

The enquiry focused on the food policy at the WLHC food hub primarily engages with objective 1, and the enquiry within LGWC focuses on objectives 2 and 3. Therefore, the enquiry focuses its efforts towards developing UAGC with deep food democracy on organisational structure, economic viability, and policy-creation. In tandem these objectives develop on the assertion that governance as a transformative process is central to urban agroecology (Schmutz 2017), and respond to the need for alternative economic practices and strategies towards deepening of democracy in the emerging praxis (Pimbert 2017, Tornaghi 2017).

The thesis contributes that the joint development of *diálogos de saberes* and a 'prefigurative compromise' with the market, to generate viable place-making transformations in inequitable neoliberal contexts, is necessary to evolve urban agroecology with deep food democracy. I propose that additional findings can support this strategic relationship in developing UAGC towards its 'emancipatory' potential (Dehaene et al. 2016) , namely: a 'critical lovingness' embedded in

organisational structures and underpinned by an anti-oppression framework, creative popular education included in a transformative agroecological learning framework (TALF) for Europe (Anderson et al. 2018), and extending co-operative membership beyond worker identities. Practical suggestions are also made, drawing on experiences of setting up LGWC so as to create more enabling conditions for urban agroecologies to be viable. These include, for example, a revised budget for setting up LGWC at Pasteur Gardens based on learnings, and local and regional UK governments taking up the Preston model' (Reynolds 2017) to support public procurement of agroecological products. The thesis emphasises an overarching strategy of a short-term prioritisation of raising financial investment over economic strategies of gifting: as necessary to support the building of stable foundations in UAGC networks, with equitable opportunities for fair livelihoods and capacity to create cultures of care, from which to develop non-commercial exchange through autonomous commons economies in the medium to long term.

1.4 Structure of the thesis

In the **literature review** (**chapter 2**) I build the theoretical context of the study on urban agroecology with consideration of; *agroecology* as containing the principles and roots of the praxis, *urban agriculture* as a closely connected practice that holds signposts for key issues, and the *neoliberal city* as the context in which UAGC is situated and aims to change. I synthesise literature on urban agroecology as a basis for the review and define food democracy as necessarily 'deep democracy'. The chapter highlights gaps in research that the thesis engages with based on critical evaluation of the literature. Ultimately, I argue that urban agroecology in London, UK, must engage with the progression of deep food democracy considering the political roots of agroecology and limitations of urban agriculture, in tandem with economic viability to support just processes in the inequitable neoliberal city.

Chapter 3 introduces the **context** of this action research in terms of UAGC mobilisations in the territory and provides backstories of LGWC and WLHC with socio-economic data in terms of their local geographies. I also outline background literature on food hubs and workers' co-operatives, as the organisational contexts of the research. This is so that theoretical discussion of the organisations is close to the practical case studies. WLHC is described as a food hub "plus", as it integrates distributive functions with community development and education activities, while the workers' co-operative is highlighted as a strategic place to develop UAGC as has some shared some underlying principles.

Chapter 4 is the thesis' **methodology** chapter. I show how the two separate organisational enquiries respond to the thesis objectives in dialogue with one another. I assert that AR is an

appropriate research approach for this enquiry into UAGC and present its key characteristics and critiques in connection with cognitive justice. I further situate this study's methodology as building on a 'transformative agroecological learning framework' (Anderson et al. 2018) in Europe with the enquiry's aims of generating horizontalism and *diálogo de saberes* (DDS). The chapter also discusses issues of validity, positionality and ethics concerning AR. An overarching summary of how the research iteratively developed is outlined with diagrammatic representations, before detailing the methods for the organisational enquiries separately- as to *how* they emerged, *why* they were chosen and *who* was involved in *what* ways.

Chapter 5 discusses the findings of the **food policy enquiry at Wolves Lane Horticultural Centre (WLHC)** with literature presented in the literature review and methodology. The chapter discusses how the creative popular education methods contributed towards developing holistic community definitions of health with a centring of translocal foodways and initial emergences of DDS. Considering that structural inequities are re-embedded into food movement mobilisations I explore how organisational structures can support the developing transformative cultures at the food hub to continue to grow with equitable dialogue in cultural food practices and leadership. Linked to this is the assertion that democratic relationships are key to building transformative cultures, and I explore how relationship characteristics might be nurtured by supportive organisational structures towards building solidarities as a fundamental basis for deep democracy.

Chapter 6 aims to share findings from the **enquiry on London Grown Workers Co-operative** (**LGWC**) and to discuss them in regard to viability and potential organisational structures for evolving urban agroecology (UAGC). Financial information is presented before evaluating this in terms of how workers defined a fair livelihood. In finding that the co-operative took limited steps towards financial viability I make analysis of why this was considering contextual conditions and internal factors, and how limited financial resources impacted the aims of the organisation. With a lack of financial resources hindering the development cultures of care and equitable opportunities as part of anti-capitalist livelihoods, I explore options for supporting the emergence of viable urban agroecologies in the neoliberal city. In doing so I suggest that a 'prefigurative compromise' with the market is necessary, in tandem with developing cultures supportive of *diálogo de saberes*, as to steer moments of dynamic tension between co-option and survival towards agroecology principles. The chapter also evaluates whether the workers' cooperative is an elevating model for developing UAGC with deep democracy – in relation to a 'prefigurative compromise' and commons creation on public land.

Chapter 7 draws together the two enquires to present a summary of the key arguments, pulling out contributions to knowledge. Methodological limitations and learnings are presented concerning the

action research, with suggestions as to supporting such approaches within university institutions. Recommendations for future developments of UAGC are made, including a food democracy audit in the UK and territorial action research into the symbiotic nature of a 'prefigurative compromise' and DDS.

Chapter 2: Literature Review

In this chapter I aim to critically review three key areas of literature to build understanding of germane research directions to evolve urban agroecology with deep food democracy as a central focus: agroecology, urban agriculture with food justice perspectives, and the neoliberal city. I highlight key interactions between these discourses to pinpoint where my research elucidates gaps in knowledge. Dialogues between the discourses also constitute a guiding theoretical structure towards which the findings of the enquiry are analysed, discussed and synthesized, as represented below in Figure 1. The choices of key discourses reflect de Almeida and Biazoti's (2017: 14) assertion that, "Urban agriculture and agroecology may help create the principles and dimensions of an agroecological approach to productive systems, social subjects and urban territories. We can term it 'urban agroecology''.

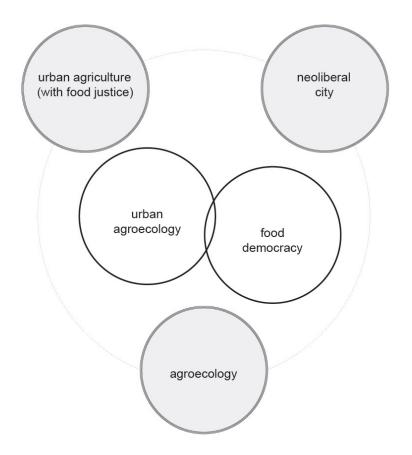


Figure 1: Diagram representing the key areas of literature that make up a theoretical framework to evolve urban agroecology with food democracy

I include urban agriculture (UA) as a key feature of the literature review as I hold that it contains useful signposts for directing urban agroecology research in its limitations and successes, and in the practice's divergent forms there is evidence of agroecological principles. It is important to note that a key difference between UAGC and UA is that the former is necessarily political and develops deeper relations with the earth and more-than-human solidarity, beyond the latter's focus on the social and technical (Anderson 2017, Prizendt 2017). Although not all encompassing, UA initiatives do take form as "political gardening" (Certomà and Tornaghi 2015), and have been described as one pathway in building just sustainable food systems based on values and experiential knowledge of community power and democracy within existing initiatives (Heynen et al. 2012, Biel 2013, Cadieux and Slocum 2015). In a UK context, for instance, Milbourne's (2012) study found that community gardens connect every day and localised actions with large-scale social injustices.

UA projects across the world also implement non-chemical growing methods that reflect agroecological principles, and also identify themselves as agroecological (Renting 2017). Therefore, in following de Molina's (2013: 56) and Altieri and Toledo's (2011) assertion that small farmers have "high agroecological potential" due to their closeness to rural rationality and practices that make the sustainable management of agroecosystems, I hold that this practitioner-focused approach should be applied not only in rural settings but to small farmers in urban ones as well. So, while I concur with Tornaghi and Dehaene (2019: 4) that UA at times perpetuates neoliberal dynamics (see section 2.5), on the basis of the above arguments I challenge assumptions that there is a, "general [emphasis added] disconnection with political ecological issues" and that practices are "very rarely" agroecological. UA is included in the theoretical framework, therefore, as a prescient place to listen, understand and strategise "urban agroecology *from the* city" (de Almeida and Biazoti 2017).

The addition of neoliberal city literature provides context to understand how urban agroecology may flourish in a geography that the praxis is fundamentally opposed to and trying to change. And so, in setting the theoretical background in which to explore urban agroecology (UAGC) and deep food democracy, I consider; *agroecology* as containing the principles and roots of the praxis, *urban agriculture* as a closely connected practice that holds signposts for key issues, and the *neoliberal city* as the context in which UAGC is situated and aims to change. Urban agroecology in the UK, I argue, must engage with the progression of **deep and just democracies**, taking into account the political roots of agroecology and the limitations of urban agriculture. In supporting the generation of spatially-just urban agroecologies, it is vital to evolve **agroecological pedagogies in the European context** and to achieve **financial viability** for prefigurative endeavors to endure in neoliberal cities.

Since the research project is based in London, UK, the literature reviewed is weighted towards texts from the UK, continental Europe and the Global North, reflecting the context of the study and recognising that knowledge develops in different historical and spatial contexts for different reasons (Santo et al. 2016). This weighting shifts throughout the discourses, however, depending on the geographical histories of each term. For example, food justice literature and activism developed in urban areas of North America to join food sovereignty, "its "radical sister" from the global South ... in a discourse that aims to distinguish between an industrial food system and a more equitable, ecologically viable alternative" (Slocum and Cadieux 2015: 2). I forefront literature from movements born in the Global South on agroecology emphasising its political nature, whilst engaging with European texts as to position the research in how agroecology has, is and will potentially develop in this context. I aim to recognise power dynamics at play in discourse creation by striking a balance between sources from political movements, practitioners and the academy as to engage with compelling epistemologies and respect the people that lived and shaped the discourses.

The chapter begins with a definition of urban agroecology as a basis for the review, including some key issues of the young praxis that have already been discussed (section 2.1). Initially I critically outline literature on agroecology, establishing that democracy is central, especially in Europe, to the development of urban agroecologies in new urban contexts. In doing so I define food democracy as deep democracy (2.3) before highlighting what has been learned from urban agroecology might centre deep democracy (2.4). In considering the context in which urban agroecology aims to form democratising processes, I critically outline literature on the neoliberal city, focusing on the territory in question and on London, in particular, as a world city (2.5). The gaps in knowledge uncovered by the interactions of the discourses are synthesised in section 2.6.

2.1 Urban agroecology

While urban agroecology is still an emerging concept without comprehensive shared understandings (Hoekstra and Torgnaghi 2017), there is some consensus that it is a political praxis centring analysis of power in a holistic approach towards the generation of urban food systems grounded in sustainable and just social-ecologies (Tornaghi 2016, Siegner et al. 2019, Dehaene et al. 2016, Anderson 2017). There are some strong connections with urban political ecology which highlight urban injustices in terms of social and ecological spaces in the city, acknowledging how capitalism produces cities and 'nature' within cities (Swyngedouw and Heynen 2003, Heynen et al. 2006, Milbourne 2012, Heynen 2017). Resource sovereignty, for instance, has emerged as a theme of UAGC with power analysis of how food, water and energy are produced and consumed in the city (Deh-Tor 2017, Schmutz 2017). This connects with broader political considerations of urban space with UAGC, "not a goal, yet an entry point into, and part of, much wider discussions of desirable presents and futures" (Van Dyck et al. 2017: 6). Although this conception of urban agroecology as a "stepping stone" (Van Dyck et al. 2017: 6) is necessary in connecting with solidarity and social justice across different urban areas of life, it is important to note that this begins with and is focused on *food* systems based on agroecological values. Values that are commonly referred to in UAGC literature are: land stewardship, healthy and culturally-appropriate food access, fair living conditions for urban agroecological workers, democracy, and symbiotic nurturing of living soils and biodiversity, underpinned with the principles of equity and justice (Mount 2017, Altieri et al. 2017, Schmutz 2017, Van Dyck et al. 2017, López et al. 2017). The essence of urban agroecology has been described as aiming to regain and shore up local and democratic control over food systems (Renting 2017).

These values begin to build a picture of urban agroecology as having 'emancipatory' potential (Dehaene et al. 2016), in confrontation with neoliberal market mechanisms that prioritise highprofit activities such as real estate and underpin exploitation in the dominant agro-food industry (Tornaghi 2017, Renting 2017, Deh-Tor 2017). This opposition to neoliberalism means that urban agroecology must, "understand cities as territories of dispute between social movements engaged in the promotion of life, and the capitalist industrial food system" (de Almeida and Biazoti 2017: 14). Authors have argued that a feature of this emancipatory potential is that the praxis can contribute towards the healing of the "metabolic riff" (Dehaene et al. 2016, McClintock 2010). First described by Marx (1967), as highlighted by Schneider and McMichael (2010), the metabolic rift embodies the estrangement of production and consumption across a rural-urban divide in result of urbanisation and industrialisation that are bi-products of capitalism (Dehaene et al. 2016). The healing of the rift through 'urban agroecology from the city' is suggested through holistic whole system approaches bridging the rural and the urban (de Almeida and Biazoti 2017) while shifting conceptions of 'the city' towards the reconnection of nutrient cycles, and building soil and community health (Dehaene et al. 2016, Swyngedouw and Heynen 2003).

The emancipatory potential of urban agroecology is far from metabolised (Deh-Tor 2017) and further empirical research is required to ground emerging theory in praxis (Siegner et al. 2019; Renting 2017). While there have been opportunities to understand urban agroecology through onthe-ground initiatives such as those in São Paulo, Zaragoza and Rosario (López et al. 2017, Prizendt 2017, Lattuca 2017, Nagib and Nakamura 2017), there is work to be done in connecting these everyday learnings in different contexts with broader political, ecological and economic possibilities of the young praxis (Pimbert 2017). For instance, how might urban agroecology discourse better understand suggestions of expanding, "direct democracy in decision making to complement, or replace, models of representative democracy" (Pimbert 2017: 16) and invent, "economic organisation that re-territorialise food and wealth production whilst creating free time for citizens to shape and re-govern urban spaces" (Pimbert 2017: 15)? This is where the work of this thesis is situated: in contributing to understandings and strategic directions of UAGC through embedded action research that connects everyday learnings with conceptual development. From an urban archaeology perspective, Siegner et al. (2019) built on the theoretical understandings by insightfully observed existing UA practice in San Francisco, USA; yet there lacked an *action research* element to the enquiry based in agroecological pedagogies that centred participatory and popular education methods (as outlined further in Chapter 4).

London, as the site of the research, has an emerging urban agroecology movement, with nonextractive and community-focused spatial relations surfacing in the UK capital through the development of land-based livelihoods and co-operative models, challenging rampant gentrification and the high concentration of land ownership (Tornaghi and Dehaene 2019: 9). With similar approaches emerging in other European contexts (Riga, Latvia, and Brussels, Belgium) (Tornaghi and Dehaene 2019: 9), research situated in London gives the opportunity to contribute to strategic thinking that considers UAGC land-based programmes and prefigurative value systems beyond its own territory – namely their impacts, barriers, practical learnings, and support requirements. In aiming to build a framework to evaluate the surfacing UAGC in London, I now critically synthesise literature on agroecology in considering the critical features and historical dynamics of the praxis informs emancipatory urban agroecologies in a UK context.

2.2 Agroecology is political and holistic

In this section I will outline how agroecology is fundamentally political, due to its development through social movements that challenge neoliberal socioeconomics through networks propagating cognitive justice. The source of an increased use of the term 'agroecology' in the last 40 years – reflected in academic publications, policy, and social movement efforts (Guzmán-Casado et al. 1999, Wezel and Soldat 2009, Nyéléni 2007) – can be seen in the political resistance to the 'Green Revolution' which saw the intensification of industrial agriculture that implemented highly mechanised practices of crop monocultures, the use of genetically modified seed, high yielding plant varieties, chemical inputs, and a high volume of homogenous products (IPES-Food 2016). Altieri and Holt-Giménez (2016) assert that the Green Revolution originated in the bread basket of the USA after the Second World War, and that by 1960 demand for products had been exhausted; leading to the Rockefeller Foundation exporting these green revolution goods and way of farming to the Global South with the support of international agencies and governments (Gallardo-López et al. 2018). This was despite protestations that this would sabotage indigenous cultures, economics and ecologies, as occurred in Mexico (Jennings 1988).

Indian activist and scholar Vandana Shiva, for example, highlights how the World Bank was

responsible for shifting India's water supply to non-sustainable models, and that the Green Revolution has destroyed ecosystems and soil fertility, as well as damaging people's health (India Together 2003). As a result of the Green Revolution, small-scale producers, "struggled to stay on the land and restore the ecological integrity of their farming systems" until they found a way through agroecology to do so, which, based on traditional farming knowledge and modern agricultural science, has propagated "hundreds of agroecologically-based projects … throughout Latin America" (India Together 2003). The imposition of agricultural methods and products through the Green Revolution is present in ongoing international development approaches whereby largely Global North actors impose external management of agriculture in the Global South (Giraldo and Rosset 2018).

With farmer-to-farmer networks implementing peasant-based agroecological approaches and defending land from extractive industries in the Global South, agroecology is a, "political project of resistance and survival" calling for self-determination and equitable distribution of resources as pathways for justice (Altieri and Holt-Giménez 2016). Analysis of power is critical in agroecology visions, particularly around the democratic governance of natural resources and how access to these are framed by structural injustices that generate inequities based on, for example, class, gender and ethnicity (Peet and Watts 2004, Méndez et al. 2013, de Molina 2013, Gliessman 2016). This analysis of power propels political agroecology into calling for a redesign of structural, cultural and economic dimensions that govern food systems and centres community self-organisation as a means and end (Gliessman 2011, Anderson, Colin et al. 2019, Nyeleni 2015). Agroecology movements, therefore, work to challenge and transform dominant socio-economic systems that are capitalist, imperialist, and colonial in nature, and which underlie power dynamics of the food regime (Nguyen n.d.: 21). Political aims of agroecology working towards ecological sustainability, democracy and social justice (López et al. 2017), for example centre feminist epistemologies upholding that Women and their knowledge, values, vision and leadership are critical ... as for agroecology to achieve its full potential, there must be equal distribution of power, tasks, decisionmaking and remuneration' (Declaration of the International Forum for Agroecology 2015).

An important element of political agroecology are transformative pedagogical models that integrate transdisciplinary, participatory and action-orientated ways of learning (Méndez et al. 2013, Ruiz-Rosado 2006), and shape cultures around the socialisation of foods across communities and generations (Deh-Tor 2017). This approach to knowledge has been a key feature in the strength of rural social movements such as La Via Campesina (LVC) in fermenting *diálogo de saberes* (DDS) (Martínez-Torres and Rosset 2014, Anderson, Colin et al. 2019). DDS, which has been developed in the work of Boaventura de Sousa Santos (Santos 2010, 2016), roughly translates as, "dialogue among different knowledges and ways of knowing" (Martínez-Torres and Rosset 2014), and

enables a, "collective construction of emergent meaning based on dialogue between people with different historically specific experiences, knowledges, and ways of knowing" (Van Dyck et al. 2017). Agroecological epistemologies based in indigenous, traditional or "subaltern" knowledge systems which centre everyday farming practices (Martínez-Torres and Rosset 2014) are intrinsically political; as they defiantly understand the world through solidaristic dialogue beyond Eurocentric, positivist and colonial epistemologies that are integral to the imposition of colonial socio-economic systems (Santos 2016, Cuéllar-Padilla and Calle-Collado 2011).

A critical feature of agroecology's political agenda of democratisation of food systems and society, therefore, is the practice of agroecological epistemologies including DDS. This begs the question, how might DDS, with roots in rural places in the Global South, translate in urban settings including cities in the Global North, as regards the evolution of urban agroecology? For instance, in section 2.4.2 I connect the 'missionary complex' observed in UA networks with the need for epistemic transformations in working towards social justice, and with the democratic leadership central to urban agroecology. And I explore cognitive justice further in terms of the epistemologies of action research and agroecology in the Methodology section 4.2, and how DDS is an important part of developing a transformative agroecological learning approach in Europe in 4.2.1.

Alongside political dimensions it is important to note agroecology's holistic quality. The agroecological vision, sometimes interpreted with a focus on ecological dimensions, incorporates connected social, cultural and political goals and works towards corresponding shifts in these terrains for ecological transformations to happen (Silici 2014, Machín Sosa et al. 2013). This integrative and holistic approach bridges different social scales to encompass, "the ecology of ... entire food systems, [including] ecological, economic and social dimensions" (Francis et al. 2003; Gallardo-López et al. 2018; Gliessman 2007).

To summarise this section: agroecology is a "a farmer-led countermovement against the modern agri-food system" (Bellamy and Ioris 2017:13) that takes a whole-system approach to the application of cultural, economic and ecological dimensions of food, with explicit commitments to a more just and sustainable future in the reshaping of structural power relations (Vaarst et al. 2018, Altieri and Toledo 2011, Méndez et al. 2013, Dehaene et al. 2016). With commitments to environmental and social justice, as reflected in feminist political principles and resistance to neoliberal coloniality in socio-economics and epistemologies, agroecology is fundamentally political (de Molina 2013). So, while agroecology has been described as a science, a practice, and a movement (Wezel et al. 2009) – scientists should work co-operatively and with respect to the experiential knowledge of farmers (Anderson et al. 2015). Therefore, rather than an attempted equilibrium between the three forms, my reading of agroecology suggests that it is a political

movement based in practice that is to be mutually supported by science. In having identified democracy as a key feature of political agroecology in the roots of the praxis in rural areas in the Global South, I now contextualise this in terms of developing agroecology from an urban space in Europe and highlight key concerns and issues.

2.2.1 Redressing a co-opting imbalance: urban political agroecology in Europe

Agroecology is territory in dispute and at risk of co-option, so it is crucial to acknowledge the dynamic between its movement and science elements (Giraldo and Rosset 2018). The root of this lies in the fact that, while agroecology has its origins in the ecological approaches of traditional and indigenous communities practiced around the world for millenia (Anderson et al. 2015, Anderson et al. 2019), scholars have claimed the origins of the terms to be in European studies on the relationship between agriculture and ecology (Wezel et al. 2009; Wezel and Soldat 2009) such as (Bensin 1928). The colonial dynamic of epistimicide, therefore, is present in the literature histories of agroecology itself, and highlighted by educational institutions' mainstream view of agroecology as a science informing agricultural development (Anderson et al. 2015). This prevailing institutional approach sees agroecology being moulded with dominant neoliberal ideologies whereby its transformative elements are ignored, "in favour of the more controllable aspects of the scientific and agricultural practice pillars" (Gonzalez et al. 2018: 15). A contemporary literature review found that there is an overwhelming focus on ecological elements of agroecology, with less than a third of literature referring to more than three instances of social, ecological, cultural and political dimensions (Palomo-Campesino et al. 2018). Social movements have been clear on co-opting transgressions away from political aspects as highlighted by Declaration of the International Forum for Agroecology (2015):

"This co-optation of Agroecology to fine-tune the industrial food system, while paying lip service to the environmental discourse, has various names, including "climate-smart agriculture", "sustainable-" or "ecological-intensification", industrial monoculture production of "organic" food, etc. For us, these are not Agroecology: we reject them, and we will fight to expose and block this insidious appropriation of Agroecology."

Considering the location of this PhD enquiry it is important to understand the character of agroecology's emergence in Europe in relation to the risk of co-option. While an 'agroecological revolution' has embedded in areas of Latin America (Altieri and Toledo 2011), the burgeoning praxis in Europe lacks critical analysis on tensions and power dynamics at play (Anderson et al. 2018). In literature analysis the authors (Gallardo-López et al. 2018) find that in Switzerland, Poland, Denmark, Germany, Austria, Spain and the UK, agroecology is mainly perceived firstly as science, secondly as practice, and less often as political or a social movement. This reflects the fact that, although agroecology may be described as a science, a practice, and a movement, there can be

a separation amidst the way it's different aspects mobilise (Sevilla Guzmán and Woodgate 2013). While Gallardo-López et al. (2018) make an illuminating review of agroecology transitions in Europe from the perspective of the academy, in analysing agroecology they describe, "society– nature as [a] study unit" (Gallardo-López et al. 2018: 18). Although their article is more progressive than traditional positivist science in taking a transdisciplinary approach, it retains a positivism in framing interwoven relations and ontologies of the natural world, and humans' part in this, into 'units'. This is at odds with the agroecology (2015) which emphasises connection and relationships rather than unitary measures:

> "The core of our cosmovisions is the necessary equilibrium between nature, the cosmos and human beings. We recognize that as humans we are but a part of nature and the cosmos. We share a spiritual connection with our lands and with the web of life. We love our lands and our peoples, and without that, we cannot defend our agroecology, fight for our rights, or feed the world."

This example shows that European processes in agroecology knowledge must work to challenge euro-centric positivist epistemologies and develop agroecologies in which science is led by movement strategies. In acknowledging the complexity and tensions of different contexts, however, there are regions with emerging political agroecologies, such as in Cataluña, where an infrastructure of care engages with social and cultural dimensions (González et al. 2014). So, it important to note that agroecology in Western Europe does not always equate to positive science.

This is shown in the UK, that while it is a place found to be prioritising science over political approaches in academic literature, there are political histories and contemporary social movements that connect with political agroecology. For instance, the Peasants' Revolt of 1381 had roots in anti-capitalism and ecological concerns for impacts on ecosystems and rural ways of life (Sevilla Guzmán and Woodgate 2013), while the agrarian communism of the Diggers of 1649 (Encyclopedia Britannica n.d.) acted on principles such as common land, respect for ecological systems, and the right to produce and consume healthy foods. The vision statement of the UK-based Landworkers' Alliance (LWA) who are members of La Via Campesina, can be connected to political agroecology in asserting, "we want to see power put back in the hands of producers and communities rather than supermarkets and industrial processors" (Landworkers Alliance n.d.).

As the largest member-based agroecology organisation in the UK, the LWA's mobilisations and documents interact with developing political transformation, but also focuses on practice and science. For instance, compared to the vision statement above, the document 'Agroecology in Action' (Fernandes et al. 2019) emphasis the economic qualities of small-scale farmer livelihoods and social benefits, while the political and social justice in agroecology is minimal with the language

of "integrating the community" rather than the central tenet of community control in the food system. The latter document might be 'watered down' in its political nature for a UK parliamentary audience, yet it seems that in comparison to Nyelenhi statements there are some core features missing. A lack of social justice principles in connection to political agroecology is highlighted by Mama D and Anderson (2016) in terms of the development of food sovereignty, as connected to agroecology, in the UK and Europe:

> "Indeed, food sovereignty activism and organizing doesn't always (or even rarely) incorporate intersectionality, race, class, gender, income. Do the absence of these not create contradictions within a movement which was based on alerting the world to the complex inequalities and injustices experienced by people of the Global South and people in the margins, wherever they are to be found?"

Interventions to centre questions of political agroecology in the UK food movement have occurred in recent years, including discussions at the Food Sovereignty gathering in 2015 (UK Food Sovereignty Movement 2015), and 'The Food Journey' workshops run by Community Centred Knowledge, that connect participants, "to different ways of looking at how the unique, historical routes of Britain link it to its present day impact on culture, tastes, health, community, economics and oppression" (Community Centred Knowledge n.d.). A central annual event for the UK agroecology movement is the Oxford Real Farming Conference (ORFC), where in 2020 the first keynote speaker on food justice and African diasporic wisdom was the author, farmer and activist Leah Penniman, and where newly-formed BPOC-led land justice group Land in Our Names (LION) ran an oversubscribed session called, "Farming So White: Land Ownership, Race and Racism in Britain" (ORFC 2020).

As well as these recent developments, the People's Food Policy, facilitated by multiple organisations including LWA, also contains strong elements of social justice and political critique of power present in food justice, food sovereignty and agroecology discourses. Examples of this can be seen in demands for the strengthening of migrant workers' rights, and a vision where, "everybody earns a living wage and works in a safe environment, free from all forms of exploitation, discrimination and racism", with, "land ... recognised and valued as an essential resource for food and shelter and the basis for numerous social, cultural and spiritual practices" (Butterly et al. 2017: 13). In terms of political agroecology being developed across the academy (science) and the movement in the UK, there is some work happening to develop political agroecology such as the People's Knowledge collective based at the Centre for Agroecology Water and Resilience (CAWR), who, "work towards a world of knowledge and technology creation that has broken free from centuries of colonialism and neo-colonialism" (People's Knowledge n.d.).

These above movement and knowledge mobilisations, although certainly not exhaustive, highlight

that a political agroecology agenda is present and gaining strength in the UK, despite an overarching dynamic of science and practice dimensions taking centre stage in its agroecology. Therefore, research engaging in political dimensions with connected pedagogies can crucially contribute to efforts to shift the direction of agroecology in the UK and Western Europe towards agroecology's political foundations. This thesis aims to contribute to such knowledge (see section 4.2.1 in terms of methodology), while engaging in an emerging area of agroecology research that is outlined in section 2.1: namely that *from* urban places.

Agroecology has historically been based in rural development, culture and livelihoods as linked to contributing to "re-peasantisation" where people return to the land, in processes contrary to urbanization (Altieri and Holt-Giménez 2016) that rebuild identities and cultures of rural and peasant contexts (Nguyen n.d.). This is echoed in the Declaration of the International Forum for Agroecology (2015) which states that:

"Our diverse forms of smallholder food production based on agroecology generate local knowledge, promote social justice, nurture identity and culture, and strengthen the economic viability of *rural areas* [emphasis added]".

In 'A People's Food Policy' (Butterly et al. 2017), which aims to transform the UK food system through food sovereignty and agroecology with input from 150 UK organisations, the term 'rural' is included in the document over three times as many as 'urban'. This is in the context of the UK, with an urban population of 55 million people (83%) and rural population of just over 11 million (17%) in the year of writing (Statista 2020). This light document analysis does not make for indepth insights, although does seem to reflect the broader dynamic of a rural focus in the UK agroecology movement.

In relation to this dynamic Tornaghi (2016) highlights that many western food sovereignty activists live in cities, and that their 'imaginary for change' and the focus of their mobilisations is predominately of farmers in distant lands, in line with agroecology traditions. Furthermore, attempts to translate the agenda from the international peasant movement, which mobilises resistance to neoliberal institutions such as the International Monetary Fund (IMF), to urban contexts has often resulted in a dwindling of radical aims (Alkon 2013). Urban agroecology, therefore, refuses to rest on failed attempts and challenges rural imaginaries of agroecology to ignite new ways of understanding agroecology and urban relations. Importantly, it calls for acknowledging the city as a place with emancipatory agroecological potential (see section 2.1), which is necessary due to the urban being a site where socio-natural injustices coalesce and appear most strikingly, as is the case with food (Swyngedouw and Heynen 2003, Coulson and Sonnino 2019, Alkon 2013). This view emphasises new perspectives: that food is an urban issue (Bedore 2010, Blay-Palmer 2009); and that the urbanisation on food systems contributes to the experience

of cities, whether materially, culturally and/or embodied (Coulson and Sonnino 2019, Steel 2013). The holistic and political qualities of agroecology can serve to dissolve city-countryside binaries that denote the urban as a place of non-production, as is highlighted by Andrea Ferrante from the European Coordination of La Vía Campesina:

> "Agroecology is what can help us to have always in mind that organic is not only techniques, but it is also a tool to change our society...to change the market to reconnect the citizens to the farmer, the urban to the rural area" (Anderson et al. 2015).

The development of traditionally rural agroecology emerging in urban places is in line with conceptions of the broad diversity of agroecological perspectives described plurally as 'agroecologies' (Méndez et al. 2013). Importantly, this is not a free for all, and principles of agroecology described above move with the praxis in new contexts, retaining transdisciplinary, participatory and action-oriented approaches (Méndez et al. 2013) with farmers' input and leadership in innovation (Altieri and Nicholls 2012). It is this democratic approach to agroecology transformations that I focus on as a cornerstone of urban agroecology's evolution. This lens with which to analyse urban agroecology mobilisations is prescient, as a deficit in democracy and power imbalances within governance is the "'sticky" and omnipresent dynamic" that determines the transformative nature of agroecological transformations in food movements (Anderson et al. 2019: 17). More broadly, democratic governance at all scales, in connection with democratisation in knowledge creation, have been identified as current cross-cutting research issues to work towards sustainable food systems (Duncan et al. 2019).

This thesis, therefore, identifies that political dimensions of agroecology are weakened in Western European formations and aims to steer agroecology with a focus on food democracy as a key pivot in advancing urban agroecology. In carrying out this research in an urban context, the work directly responds to calls for new theoretical approaches in understanding questions that emerge from urban initiatives aiming to develop just, sustainable food systems, where existing frameworks, such as 'alternative food networks' and 'local food systems', have proved limited in doing so (Renting et al. 2012, García-Sempere et al. 2018, Moragues-Faus and Marsden 2017). The direction of the enquiry is founded on the assertion that shifting governance towards bottom-up democratic arrangement and away from technocracies has the most potential for enabling ecological and socially just food systems (Nyéléni 2007, Anderson, Colin et al. 2019). In having identified democracy as a key feature of agroecological transformations I now outline understandings of food democracy.

2.3 Deep food democracy

In this section I define food democracy, emphasising 'deep democracy' that prioritises long-term relationships characterised by transparent mapping of power across different social positionalities in support of generating collective commons (McIvor and Hale 2015). Simply put, democracy means the ability of the people (the demos) to organise action collectively to make change (Ober 2008). The concept of "post-democracy" (Crouch 2004) can be applied to the UK, whereby corroded institutional forms of parliamentary democracy are sustained by spectacle elections and decisions are made behind closed doors between government and political and economic establishments (Jörke 2011 cited in Follmann and Viehoff 2014). This disabling and disempowering form of democracy is reflected in a democratic deficit in the global food system and has given rise to literature which advocates increased transparency and the integral role of citizens in making food policy (Levkoe 2011, Coulson and Sonnino 2019).

The concept of food democracy, which arose at the turn of the twentieth century, refers to the capacity of people to regain control of their food and food systems by taking part in the decision-making, whether at government level or in localised efforts (Lang 1998, Hassanein 2003). Within this discourse localised democracies have divergent characteristics and pathways of progression (Hassanein 2003) and generate diverse meanings (García-Sempere et al. 2018). The underlying assertion of food democracy is that people should have equitable opportunities in actively shaping the systems that affect their everyday lives (Hassanein 2008) through direct participation (not proxy participation) in empowered participatory governance (Fung and Wright 2001). If the aim is to integrate social justice in sustainable futures then democracy must, ultimately, be a basic condition (Agyeman 2013, Sen 2009).

Within the discussion of food democracy (McIvor and Hale 2015) have asserted the need for a "deep democracy" with equitable social organisation being strongly connected to the health of its roots, namely ongoing social relationships. The first aspect of deep democracy consists of enduring democratic qualities of relationships, with a second feature being mapping and public dialogue of power dynamics and different social experiences. The latter connects with Hassanein's (2003: 79) observation that conflict is inevitable in social-change processes and the best hope for appropriate responses to these conflicts in the food system is, "through the active participation of the citizenry ... and political engagement to work out our differences." The third aspect to the concept is that deep democracy takes a complex approach towards the commons, acknowledging that these are dynamic, fluid, and constantly reproduced via joint action through negotiation across difference (McIvor 2011). Commons are governance spaces, resources and systems that are taken care of by a community or network and take forms of non-capitalist self-provisioning to meet collective needs

(Helfrich and Bollier 2015). With these dimensions in tandem a 'deep' approach to food democracy can lead to transformation towards ecological sustainability through the reconfiguration of power dynamics in social relationships (Lohest et al. 2019). This reverberates with holistic and social justice elements of agroecology. With urban agriculture (UA) initiatives characterised as well positioned to support deep democracies (McIvor and Hale 2015), I now define UA and then turn to critical reflections of the practice, in order to highlight learnings on deep democracy pertinent to the advancement of urban agroecology.

2.4 Critical learnings from urban agriculture

Since agriculture projects access land across city boundaries into thresholds of peri-urban and rural (Pfeiffer et al. 2014), I include this peri-urban "buffer" zone between urban and rural space (Santo et al. 2016) in defining urban agriculture (UA), alongside the city centres themselves. This is in keeping with agroecological approaches where the *edge* space – where two different spaces (the forest and the field) meet – is rich in interaction (Holmgren 2002). This creates dynamic bridges across urban-rural space, and so in geographic terms I agree with Mougeot (2000: 10) that UA is, "located within, or on the fringe of, a town, city or metropolis."

Certomà and Martellozzo (2019: 62) note that the horizon of UA globally is, "constantly widening and diversifying, often in conjunction with cognate grassroots and institutional initiatives that make it difficult to provide a unique, encompassing definition... yielding to diverse – and sometimes opposite - outcomes." To an extent, this broad range of activities can be summarised as: the growing, processing, and distribution of food; non-food plants; education services; aquaculture; and animal husbandry; all taking place in and around cities for distribution mainly in that urban area (Urban Agriculture Committee of the CFSC 2003, Santo et al. 2016, Horst et al. 2017). The exciting and sometimes enchanting characteristic of UA is that people are engaging in UA activities in different pockets of the city; once I started looking, my whole experience of city life changed as I noticed, for example, hidden gardens behind railway lines, gourd plants tumbling over home fences, youth project raised beds. UA happens in housing estates, allotments, schools, restaurant-assisted gardens, office block roofs, homes, backyard chicken coops, community gardens, guerrilla gardening, city farms, and indoor aquaponic sites, to name a few typologies of place (Hou et al. 2009, Tornaghi 2014, Follmann and Viehoff 2014, Redwood 2008). The underlying land relations of these activities can be commons spaces, institutional, residential, municipal parks (Meenar and Hoover 2012) and operations may be formed loosely through community groups, or owned privately, publicly or commercially (Santo et al. 2016, Hou 2010).

Significant research has been done on UA projects and policies in the last two decades (Meenar

2017), with the proliferation of new forms such as guerrilla gardening and urban farming projects (Follmann and Viehoff 2014). The practice of food growing in UK cities has intensified recently, with increased demands for allotments and community gardens in the UK, with the number of community gardens registered by the Federation of Urban Farms and Community Gardens increasing by 65% from 2010 and 2011(Church et al. 2015).

Having defined urban agriculture, I now outline some of the benefits of the practice in relation to food democracy and social change. UA generates numerous environmental, economic, cultural and social outcomes (Bell et al. 2016, Mukerji and Morales 2010). Environmental benefits include decreasing air pollution (Janhäll 2015), the composting of organic waste that would otherwise be landfilled (Brown and Jameton 2000), and increasing biodiversity (Taylor and Lovell 2014). Research has shown that UA can have a beneficial impact in socially marginalised communities (Morales 2011), and contributes to addressing economic inequality and inequitable investment in different areas of cities (Meenar 2017, Meenar and Hoover 2012). One way this happens is through UA initiatives offering opportunities to learn new skills for future employment (Sustain 2012)and creating jobs (Kobayashi et al. 2010).

UA has been shown to supply low-income residents with fresh (sustainable) food (Caputo 2012) contributing to community food security, and creating restorative spaces which improve health through stress reduction and improved exercise levels (Viljoen et al. 2005). Community wellbeing has also been cited as a benefit, with urban gardens often becoming gathering places, away from workplaces and home, for community-led development (Meenar 2017; Santo et al. 2016), and functioning as cultural neighbourhood centres such as the Latino community gardens in New York (Saldivar-Tanaka and Krasny 2004). This opportunity for inter-cultural engagement across sometimes segregated groups from diverse backgrounds and social status, as linked to structural power, can bring people together through activities increasing social bonds, reducing existing tensions, generating mutual empowerment and community networks (Cabannes and Raposo 2013, Tan and Neo 2009, Teig et al. 2009) These multifunctional elements of urban agriculture combine to show conditions, manifestations, and great potential for deep food democracy and agroecological principles. The features of socio-economic empowerment through UA indicates a democratic pulse, and the enabling of cross-cultural relationships meets the first dimension of deep democracy: the creation of enduring democratic relationships. Also, the collective management and occupation of public space seen in community gardens points to the third deep democracy dimension, that of collective endeavours to create commons.

These social benefits of UA integrated with environmental contributions shed light on the reasons for agroecology emerging from the city within UA movements. The question remains, however, as to whether UA commonly meets the second feature of deep democracy: the mapping of and open dialogue about the power dynamics at play in relation to broader structural injustices, a question that is also fundamental to the 'political' of emerging urban agroecology. Some scholars have asserted that urban agriculture can take on this political quality, as radical democratic processes emerge from urban community gardens (Shepard 2009) and challenge atomised subjectivities of neoliberalism by generating social relations that emphasise equity and ecological stewardship (McClintock 2014: 165). With participants developing new political skills through participatory decision-making (Travaline and Hunold 2010), urban agriculture has built autonomous systems of self-governance outside neoliberal frameworks that progress mobilisations of social justice (Levkoe 2006, Heynen et al. 2006).

The portrayal of UA in these positive examples, as benevolent and unproblematic in its multifunctionality (Tornaghi 2014), ignores ways in which the practice also perpetuates social inequities, its power shaping initiatives and thus limiting revolutionary potential. Food justice perspectives and movements emerged after the turn of the century and held alternative food networks (AFNs), including urban agriculture, to account for manifesting regressive politics that shored up structural power dynamics in movement tendencies. In order to understand this further I now define food justice, before foregrounding two related critiques: the 'local trap' and the 'missionary complex', both applicable to considerations of urban agroecology evolving with deep democracy.

2.4.1 Food Justice

Urban agriculture is often strategically linked and associated with food justice (Horst et al. 2017, Reynolds 2015), and food justice has been used to critically analyse UA (Reynolds and Cohen 2016, Tornaghi 2017). The term food justice was developed by North American food activists, with increased literature since 2011 and discourse ties to environmental justice or "just sustainability" (Agyeman 2013) where social justice and ecological sustainability coalesce (Glennie and Alkon 2018). Food justice (FJ) highlights how unequal access to food reflects historical and structural racism, economic disparity and oppression, and works to shift and transform these origins within and beyond the food system (Kato 2013, Gottlieb and Joshi 2010, Hislop 2014). Alkon and Agyeman (2011: 4) highlight equitable 'food access' and 'food sovereignty' (community control) as key features of food justice, and state that intersections of, "race and class play a central role in organising the production, distribution, and consumption of food." Anti-racism has emerged as a strong theme of the food justice movement in North America (Glennie and Alkon 2018), with the origins of mobilisations linked to the Black Panther Party's (BPP) radical anti-hunger approach of their 'Free Breakfast for School Children' programme in the 1960s and 70s (Sbicca 2012). These narratives and critical thinking, although present to varying degrees, are not always manifested in alternative food networks (AFN's), which often focus on local food and environmental sustainability while sidelining social justice issues related to food systems (Allen 2008, Alkon and Mares 2012). Food activist Sharon, a Non-Profit Partner Representative, in McIvor and Hale's (2015) study of deep democracy in Colorado, USA, remarks:

"So, it's like this upper income crap and if that's the face of the new food movement, then we're screwed, in my opinion. Because there was not any talk of farm workers, there was no talk of people of color, there was no talk of lowincome communities, food accessibility, you know there was no talk of that. It was absent – noticeably absent from the conversation. And so that to me sort of sums up what's messed up about the urban ag movement."

FJ perspectives have highlighted the inequitable distribution of power being reflected within AFN's, entrenching economic disparity, structural racism and oppression, and being the root cause of unequal access to food (Allen 2010, Horst et al. 2017). For example, Reynolds (2015) finds that that white-led urban agriculture groups in New York, USA, have greater access to key resources such as funding, municipal support for land, and media opportunities. Such observations have led to calls in literature to emphasise feminist leadership and decolonial praxis in food movement activism, and for research to transform existing, "colonizing, dominating, hegemonic propensities of white, patriarchal systems of power and privilege" (Bradley and Herrera 2016: 99). This change has been limited by the expression of oppressive dynamics in alternative food systems as a diversity problem rather than a, "relational process embedded in society that constitutes community food" Slocum (2006: 331).

While the North American food justice movement and its literature have grown rapidly, European scholarship, policy and practice have been slower to do so in relation to local food, food security and urban agriculture (Darly and Mcclintock 2017, Bickerstaff and Agyeman 2009, Prové et al. 2019). In the context of financial crisis of 2008 and deepening of austerity measures in recent years, however, food justice and critical studies of urban agriculture have increasingly been discussed within European scholarship (Darly and Mcclintock 2017). Scholars have contributed to interpretations of food justice through analysis of, for example, the media, urban agriculture and the charity sector from UK institutions (Moragues-Faus 2018, Tornaghi 2017, Kneafsey et al. 2016). Also, in UK movement and cross-academic-movement spaces anti-racism and intersectional feminist frameworks are increasingly being centred, with systematic racism, climate change and land ownership being interconnected with food politics (Siva 2020, Woods 2019, Food Justice and Food Justice for All 2017). Whilst food justice narratives may be appearing more and more in the UK movement, after research visits to the USA in 2019 London-based food grower Beth Stewart writes:

"My experience of small-scale farming projects in the UK is that many of them are more focused on sustainable livelihoods for growers and environmental sustainability of the farming practices than they are on the food access part of food justice" (Stewart 2019).

Issues of food justice have been shown to be present in London's UA movement, with food practitioner Ian Solomon-Kawall, from May Project Gardens expressing at an event on food policy for London:

"Recruitment. That's another issue we have. We would like to see the policy expand to be more diverse. If you look at the room for example, we live in one of the most diverse cities, London, but it's not reflected in the food growing movement and that's one of the thing's we'd like to see. And how we'd like to see that is by a difference in the way people are recruited for certain jobs and certain positions" (Just Space 2016a: 21.40 - 22.05).

Stewart (2019) also observes that, in the struggle to make UK small-scale farms work in a system that favours bigger farms, insufficient effort has been made to bring distribution points, such as farmers' markets and box schemes, out of the sphere of the middle class. The slow uptake of food justice reflects the relative lack of development of political agroecology in the UK (see section 2.2.1). Urban agroecology, with underlying principles of social justice, equity and democracy, offers a framework to develop urban food systems with food justice considerations, and food justice analysis can support the mapping of power in the development of deep democracies. For democracies to be deep, therefore, they must also be just. The connection between urban agroecology, participatory democracy and food justice is observed by Phil Mount, associate director of a start-up farm programme run by the Just Food Farm in Ottawa, Canada:

"At the same time, in order to truly foster urban agroecology, these projects aim to integrate food justice for the community. Participation in and codevelopment of community farm projects is invited, and spaces are provided for the community to learn, grow and flourish" (Mount 2017).

I now introduce the 'missionary complex' and the 'local trap' as two food justice critiques of UA that indicate directions for urban agroecology.

2.4.2 Missionary complex

The 'missionary complex' is an expression of the race and class inequities re-entrenched in alternative food movements, including urban agriculture, through epistemological imposition and a charity mindset by socially privileged actors. North American food justice literature has discussed the 'missionary-complex' of some white-led UA projects where they "bring good food to others" (Guthman 2008: 431) in low-income communities and communities of colour, creating disempowering relations and epistemologies while patronising community members (Garzo

Montalvo 2015). I now illustrate the missionary complex through quotes from the email list of the Community Food Security Coalition (CFSC), an organisation which enabled the emergence of food justice organisations at the turn of the century (Morales 2011). In response to a message claiming that some ethnic minority groups do not have healthy cultural foodways, an activist, Tiffany Golden, argued that this was untrue in the light of attacks by imperialist projects on self-sustaining land-based models in the Global South. She named the dynamic at play:

"The Missionary Complex is unfolding – the ideal that there is no innate Wisdom within the culture, that it must all come from outside the group – THROUGH EDUCATION no less." (T. Golden as cited in Slocum 2006: 334).

Another CFSC participant, Mascarenhas (2002 as cited in Slocum 2006: 341) reflects on leadership, power and social class in relation to this dynamic:

"If we are talking about building power and taking control of the food system but the vast majority of people looked to as "leaders" in the community food security movement are white, middle-class, highly educated folks, we need to ask "WHO will take control?" and "WHO is building power?" Do the solutions we are developing speak to the issues that low-income communities and communities of colour have identified as crucial (i.e. living wage jobs, housing, childcare, even supermarket development, etc)? ... What kinds of "leadership" are we trying to foster?"

This missionary complex is highlighted in a case-study in Stroud, UK, where a food hub aiming to provide sustainable, local food provision to a low-income housing estate was both organised and used predominantly by people described as "middle-class", "educated" and "eco-friendly", with "core organic values" (Franklin et al. 2011: 780). One food producer who was part of the programme described the food hub as a, "naive social experiment to try and get people on that estate to eat this sort of food", acknowledging that this was "condescending" in practice (Franklin et al. 2011: 781). Failure of UA initiatives to meet the social potential of the practice (see 2.4) has led to increasing 'outreach' to bring people 'in', rather than reimagining projects through co-production and reflection on social structures that define space (Kato 2013).

The missionary complex comes with assertion of foodways from those who take on the role of missionary. These have commonly been criticised for promoting an individualistic 'vote with your fork' discourse, as promoted by Pollan (2006), involving the production and selling of relatively expensive and culturally-inappropriate foods in the context of the neighbourhood they are situated in (Turner et al. 2017, Guthman 2007, DuPuis and Goodman 2005, Feagan 2007). These foods, framed as healthy, sustainable and local, create a classed dynamic, being attainable for people who can afford them and inaccessible to everyone else (Levkoe 2011); they carry the assumption that missionary epistemologies are applicable to all peoples (Clifford and Harper 2010: 224).

The need for cognitive justice and emancipatory pedagogies to shift missionary dynamics connects with "discourses of ownership, empowerment, and control" that are prominent in food justice literature (Cadieux and Slocum 2015: 5). Detroit-based D-Town Farmers for instance, emphasise that those communities who have been most marginalised by the agribusiness system need to, "lead the movement to provide food for the members of their community" (White 2010: 204). These political principles and goals positively address the need to build leadership, whether in formal positions or informal spaces, food movement-wide or local initiatives, into transformative actualities that challenge unjust power structures. In shifting leadership dynamics ludmilap (2012) – a blog piece written by a group described as people of colour, women and queers, reflect on manifestations of USA anti-oppression activism at Occupy Oakland – say:

"Appeals to white benevolence to let people of colour "lead political struggles" assumes that white activists can somehow relinquish their privilege and legitimacy to oppressed communities and that these communities cannot act and take power for themselves."

In considering deep democracy with the key element of open dialogue on embedded power dynamics, one suggestion regarding the transformation of the missionary complex is for, "white food activists and scholars to decolonize their practice – to take a step back, and listen" (Ramírez 2015: 767).

The missionary complex, therefore, is born of and engenders socially unjust power dynamics through dismissive and arrogant epistemologies, foodways that are individualistic, relatively expensive and often culturally inappropriate, and propelled by undemocratic leadership. These characteristics closely reflect the green revolution and ongoing global colonial dynamics where food systems are imposed through expensive products, disregarding local knowledges that propelled the agroeocology movement (see section 2.2). In terms of generating transformative leadership that puts into practice deep and just democracies the need for community self-definitions of foodways is highlighted with an epistemological shift away from colonial dynamics and towards spaces grounded in solidarity, listening and respect. This relates to considerations of what health means in connection with food, how food reflects cultural aspects and identity, and how food connects with different ontologies, for instance. Building on discussions about the missionary complex, I now focus on the 'local trap' in continuing to learn from how UA movement dynamics relate with the generation of urban agroecology with deep democracy.

2.4.3 Local Trap

The characteristic of 'local' has emerged as central to alternative food networks (AFNs). Regional markets have developed to build community relations and support economies where local farmers

and processors have a place to sell their produce and consumers can meet concerns on provenance of their food (Allen and Hinrichs 2007, Morgan and Morley 2002). The local element also speaks to environmental concerns as the food travels short distances in contracting supply chains. Urban agriculture is party to this narrative as can be seen in the promulgation of local farmers' markets in cities. Allen (2010: 296) explains this local impetus as meeting a need for collaborative working at a human scale, and as, "both a reaction and product of neoliberal ideologies and practices." Authors have criticised the equation of the local scale as inherently good in meeting desires around social justice, democracy, food security and ecological sustainability, when these outcomes are dependent on the actors and agendas that are empowered by interweaving social relations (Born and Purcell 2006, DuPuis and Goodman 2005, Prové et al. 2019). Overly positive judgements of local food systems have been described as the "local trap" (Born and Purcell 2006), and the fetishisation of locavorism, a form of ethical consumption, has been questioned (Johnston and Baumann 2010, Hinrichs and Allen 2008).

The risk of the local trap is that a local-first approach can slip into xenophobia, if every community is not included (Clennon 2019). This has been observed and described in alternative food literature as a "defensive localism" that protects a homogenous 'local' through manufacturing barriers to define what and who is "local" or "non-local" (Hinrichs 2003). These barriers can polarise and discriminate against particular social groups in an 'othering' process based on racial injustice (Woods 2019), and also limit understanding of food system challenges rooted in places beyond the vicinity of the locality (Levkoe 2011). Thus, the local trap is not only strategically limited but it also risks exacerbating food injustices in a parochial politics that hinders the formation of deep democracies.

For instance, the emphasis on 'the local' and local foods in the UK food movement throws up questions on who, what and how food is defined as local in relation to power dynamics of identity, food culture and nationalism. The right to eat 'culturally-appropriate' foods as a feature of agroecology clashes with a 'local' fetishisation, if plants and foodways of diverse diaspora communities are not included in local definitions. The local trap undermines just and deep democracies, and as DuPuis and Goodman (2005: 364) suggest, "we have to move away from the idea that food systems become just by virtue of making them local and toward a conversation about how to make local food systems more just." One approach in moving away from the local trap is a 'reflexive localism' whereby diverse foodways, cultures and communities take a central role in envisioning and developing *localised* food systems that aim to generate affordable, culturally-appropriate foods for all (Levkoe 2011, DuPuis and Goodman 2005, Goodman et al. 2012). Julian Agyeman's (2013) and Valiente-Neighbours' (2012) work on "translocal food" is helpful here in breaking out of the local trap. "Translocality" refers to the interconnectedness of space with central

dimensions of 'mobility' and 'place' through, "complex social-spatial interactions in a holistic, actororientated and multi-dimensional understanding" across geographic scales (Greiner and Sakdapolrak 2013: 376). Brickell and Datta (2011: 3) describe this as "situatedness during mobility", and (Freitag and von Oppen 2010) assert that a translocal aspect is made up of flows of, "entanglement and interconnectedness". Translocality supports discussions on power critical to deep democracies and urban agroecology as questions are raised as to, "who moves and who does not, how power relations are differentiated in flows and movements and how power and powerlessness are experienced simultaneously in different locations" (Massey 1991: 25).

The connection between place, food and power is highlighted by (Agyeman 2018) and how this moves with people, when writing:

"Migrants carry complex and life-affirming foodways with them as both memories and dreams, creating an umbilical link between where one is from and where one is now. Food thus provides a grand stage for the performance of translocal identities, new belongings and becomings."

In understanding the local, therefore, the expression and centring of translocal foodways support the dissolution of divisive conceptions of what is local food, as we understand that local cultural landscapes are fluid and complex, dependent on cultural interactions between plants, land and people across space and power dynamics. Translocality speaks to the holistic and whole-system approach of agroecology that includes social, cultural and ecological elements in understanding food systems with power dynamics through scales. La Via Campesina might be considered a translocal workers' union, for instance, mobilizing globally towards a vision of food sovereignty and agroecology across different localities. Understanding the local as translocal, therefore, offers opportunities to break out of the local trap in company with agroecological underpinnings of holistic food approaches. In developing political agroecologies from cities and learning from the missionary complex and the local trap present in urban agriculture, Agyeman's (2016) suggestion holds weight:

> "As we move toward a more intercultural world, the local food movement should recognize, embrace, and celebrate the possibilities and opportunities of translocalism, of cultural diversity as much as it currently celebrates biodiversity."

In highlighting the centrality of democratisation in developing agroecologies in new contexts, whether in urban space and/or in the Global North (2.2.), and defining food democracy using the concept of deep democracy (2.3), in this section I have applied a deep democracy lens to urban agriculture with support of food justice perspectives in mapping questions of power. I have shown that for food democracies to be deep then they must also be just, and consider how movement spaces, cultures and leadership form in relation to broader social structures. Through focusing on

missionary complex dynamics and the local trap, I have emphasised community self-definitions of healthy foodways and translocal food stories as important considerations in the development of democratic urban agroecologies. Both critical learnings highlight the need for those affected by food injustices to take the lead in movement strategies coupled with pedagogical shifts supporting dialogues across different knowledges and mapping of power towards cognitive justice. This reiterates urban agroecology's challenge in Global North cities as to how agroecological pedagogies including *dialogos de saberes*, a critical connector of cognitive justice in political agroecology, can manifest in mobilisations considering their rural roots in the Global South (see 2.2). Having critically reviewed and connected literature on urban agroecology's political and historical roots in agroecology, and deep democracy analysis of a closely associated practice, urban agriculture, I now turn to the neoliberal city as the background to the generation of deep and just food democracies.

2.5 The neoliberal city

In this section I synthesise works on the neoliberalism and neoliberal city to understand the conditions in which urban agroecology aims to evolve deep democracies. To gain a closer view of the nature of the neoliberal city I refer to literature on London, UK, as being a key global instigator of neoliberalism, and at the same time give more insight into the territorial context of this PhD. To understand the potential of urban agroecology (UAGC) within the neoliberal city I return to critical literature on urban agriculture (UA), highlighting how the practice takes on the logics of neoliberalism and supports its development, whilst also offering transformative challenges and being severely limited due the same socioeconomics. Overall the section highlights a strategic necessity and gap in understanding as to how viable urban agroecologies can emerge in neoliberal contexts to support enduring deep democracies whilst in tension with risks of co-option.

Neoliberalism emerged in the 1970s and can be generally described as a political project to reassert class power through the removal of state regulations to bolster the free movement of capital (Levkoe 2011, Massey 2013). The set of ideas that neoliberalism promulgates are underpinned by the assertion that human advancement is best served by entrepreneurial freedoms with the assumption that humans are self-interested individuals (Goldstein 2012, Harvey 2006). As an economic programme neoliberalism is a specific form of capitalism that enhances "accumulation by dispossession" (Harvey 2004) – where an institutional framework manages free market entrepreneurialism through state-supported instruments of privatisation, free trade, property rights, devolution, calculated regulation and deregulation, and austerity (Harvey 2006, Mayer 1996).

Neoliberalisation has meant that industries and services have increasingly been transferred from public to private control and ownership, coupled with regulatory responsibilities, particularly social welfare, being devolved from national to local government and then jettisoned onto community groups (Wekerle 2004, Rosol 2012, Barron 2016). Whilst this increase in responsibility for citizens has assisted greater autonomy and feelings of empowerment for community groups (Staeheli 2008) this has come with austerity policies of the reduction and removal of public funding for social programmes. In the UK post-financial crisis austerity came with political philosophies of citizens being part and contributing to 'big society' which affectively meant volunteering to run public services with cuts to resources. The last decade of austerity measures has been described as "super-austerity" where new cuts on top of prior ones exacerbate initial impacts with multiple social ramifications (Lowndes and Gardner 2016). These relationships between privatisation, austerity and devolution are pertinent in the development of urban agroecology as community organisations and spaces, where urban agroecology is often situated and has potential for, are being asked to do more for less with increased pressure to become entrepreneurial.

Peck and Tickell (2002) usefully analyse the development of neoliberalism as the 'rolling-back' of social-collectivism of the Keynesian welfare state in the 1980's, to 'roll-out' neoliberal institutions in the 1990's. Neoliberalism has importantly been observed to be more than economics, with Doreen Massey (2013) describing it as a 'social settlement' that has been hegemonic in the UK since the 1970's. The author notes that neoliberalism drives competitive individualism for private gain having, "altered our very senses of ourselves. It has invaded our imaginations and moulded our identities" (Massey 2013) with reshaping social divisions around gender, sexuality and race. The ongoing securitisation of power for elites through neoliberal practices, therefore, plays off a social idea and a "new common sense" of human competition (Massey 2013) with manufactured hierarchical differences between peoples i.e. white supremacy and patriarchy. This understanding of neoliberalism which exploits difference between peoples stresses the importance of deep democracy in governance with the formulation of dialogic social relationships with mapping of power dynamics- as food system governance is currently dominated by "state-market" agendas (Jose Luis et al. 2019).

As part of neoliberalisation processes, cities have been repurposed as "enterprises" where local governments become vehicles competing for investor capital, rather than points of redistribution as seen with conceptions of the welfare state (Harvey 1989). The entrepreneurial city also seeks to attract asset-rich residents (Harvey 2007), resulting in gentrification processes whereby low-income residents are displaced (Davidson and Lees 2005). These processes manifest social inequities along class and ethnicity lines, particularly in terms of access to housing, community assets, enterprise opportunities, and green spaces (Aptekar 2015, Ziaei 2018, Field et al. 2015, Lees 2016, Wolch et al. 2014). This entrepreneurial direction of city geographies reflects and caters for neoliberal processes of financialisation defined as, "increasing importance of financial markets, financial motives,

financial institutions, and financial elites in the operation of the economy" (Epstein 2002: 1).

Financialisaton not only influences what types of industry exist within cities, but also feeds into privatisation of land, as land and housing have become sites of financial investment and profitable returns. Austerity spurs this on as cash-strapped municipalities sell off land to raise capital. This has led to increasing loss of public space, whether parks, pavements or social housing (Agyeman 2013, Low, S. and Smith 2006). Property developers who are enactors of privatisation of space gain huge profits from property speculation, and can shape the city more and more through relationships with local governance (Barron 2016, Follmann and Viehoff 2014). Thus the neoliberalisation of urban policy and space (Brenner and Theodore 2002) contributes to a democratic deficiency in society, with strategic city decision-making and resources being held by financial and political elites with minimal accountability (Harvey 2012). Public space often hosts battles of gentrification and community democracy and has been described as, "one of the primary battlegrounds on which ideology will contest power in the 21st century" (Mount 2017: 21). It is worth noting here that both sites discussed in this PhD are on publically-owned land that borough councils have stepped back from operating and managing.

Ultimately, cities have become drivers of and are shaped by neoliberal processes (gentrification, increasing privatisation and financialisaton of space, austerity) that result in the uneven distribution of opportunities and of resources such as housing, water, energy and food (Soja 2010, Dehaene et al. 2016). But the neoliberalisation of the city has not gone uncontested, as progressive local government workers, third sector organisations, and grassroots groups have rallied, resisted and reimagined urban life with, for instance, affordable housing, living wages, public services and democratic governance (Leitner et al. 2007). We can see this contestation in the political elements of UA (in section 2.4) and the "emancipatory potential" of urban agroecology (Tornaghi and Dehaene 2019) for making democratic interventions in the neoliberalisation of the city. To understand the context of this PhD study and add depth and detail to the broad strokes outlined above, I now synthesise literature outlining London as a neoliberal city.

From merchant city to imperial hub (Davidson and Wyly 2012) the latest manifestation of the metropolis of London is as a heartland of neoliberalism and a centre of political, institutional, economic and cultural power (Massey 2007: 8). London is not just subject to neoliberalism but is a key institutional domain in which neoliberalism unfolds (Brenner and Theodore 2002: 345). The UK capital is a 'world city' as both holding 'internal multiplicity' of *the world coming to it* while simultaneously having power relations that shoot across the globe through 'trade routes, investments, political and cultural influences' that tie the future of other places to what happens in London (Massey 2007: 7). Whilst the city offers economic, political and cultural possibilities, it is

exceptionally competitive and strikingly entrepreneurial (Buck et al. 2002).

London is the most unequal place in the UK (Massey 2007) with 13 London boroughs in the top 20 most deprived local authorities in England (Hamnett 2003: 189). With striking changes in industry, jobs and housing in the last 50 years, class compositions in London have shifted with increased inequality as wealthy elites have become richer, the middle class or 'middle mass' with its relatively slower income rise has grown in number, and people on low incomes and dependent on welfare have experienced austerity cuts disproportionately (Hamnett and Butler 2013).

London as a global city is described as having the characteristic of 'super-diversity' (Vertovec 2007) caused by escalating globalisation, conflict and forced migration in the twenty-first century, and refers to:

"more ethnicities and countries of origin represented among urban residents, but also to a range of further interacting variables of difference including socioeconomic status, labour market integration, language, religion, migration trajectory and immigration status, different degrees of diasporic engagement, as well as distinct gender, age, and generational profiles of different groups living side by side" (Berg 2019: 185).

While cultural diversity and cosmopolitanism have been named as the characteristics that made people "proud of London", with people from BAME backgrounds having a relatively high rate of satisfaction with the city as a place to live (MORI 2004), UK national policies intentionally create a "hostile environment" for migrants (Yeo 2018, Travis 2013), and has been linked to the impacts of austerity, and ability to access public services in London, disproportionately impacting people from ethnic minority backgrounds (Berg 2019). An extraordinarily complicated series of rules and regulations around the qualification of migrants to access benefits and public services (Oliver 2014) illuminates "everyday bordering" (Yuval-Davis et al. 2017) that exists in London. As austerity has excessively affected the most deprived local authorities in London, home to the city's most diverse populations (Poppleton et al. 2013) this reflects broader UK dynamics around injustice and inequality at the intersection of race and class (Runnymede 2017), and when gender is taken into account low-income BAME women have been disproportionally affected by austerity budget cuts from 2010 to 2020 (Women's Budget Group 2016).

As regards living costs and housing in London, rising property prices have priced out nearly all working-class buyers from home ownership and made it progressively harder for most young, middle-class potential buyers (Hamnett and Butler 2013). In 2019 it was estimated that to buy a first-time home in London a salary of £84,000 was required, with the average house price of £482,200 (Little 2019) meaning that the likelihood of managers and professionals owning their own home is roughly four times higher relative to people in other occupations (Hamnett and Butler

2013). The inequities related to housing, increasing wealth of the upper classes, and displacement of working class communities in London is directly related to the 'financialisation' *of and by* the metropolis, as highlighted by the fact that in 2013 61% of London housing sales were bought by investors (British Property Federation 2014).

Given these inequitable conditions of London, how might urban agroecology initiatives actually exist, and generate transformative politics in such an intense pressure cooker of neoliberalism? To begin to frame this question I return to learnings from urban agriculture literature, and how the practice has related to neoliberalism.

2.5.1 Dialectical tension; transformative aims <> viability in the co-opting neoliberal city

In section 2.3.2 I problematised the notion of a "vote with your fork" strategy present in relation to urban agriculture's manifestations of the missionary complex. A "market as movement" creates neoliberal subjectivities that aspire to self-improvement, for example through healthy eating or 'grow your own' where individuals are appraised as responsible for the achievement of their own wellbeing (Allen 2010). This individualistic approach ignores collective responses to collective human needs (McClintock 2014) and limits the politics of the possible as to what is "arguable, the fundable, the organisable [and] the scale of effective action" to consumer choice and entrepreneurialism (Guthman 2008: 1180). In terms of generating food democracy as a means for collective and transformative action (Lohest et al. 2019), "market as movement" is fundamentally undemocratic, especially in an economic sense as, "allocations of choices are shaped by the historical demographics of inequality' (Allen 2010: 300), and re-embed these inequalities into the urban fabric by emphasising the privileged position of 'well-to-do consumers' (Hinrichs 2000). Market as movement, therefore, falls victim to the neoliberal social agreement and supports logics of the entrepreneurial city.

Related to ethical consumption narratives of UA is the sector's relationship to gentrification, critics arguing that UA and its associated organic products contribute to gentrification processes (Johnston 2008) through "greenwashing" or "ecological gentrification", whereby inhabitants are displaced or formerly public spaces are ousted for "green spaces" as part of urban regeneration (Dooling 2009, Bedore 2010, Quastel 2009, Aptekar 2015, Tornaghi and Van Dyck 2015).

In broader political economy contexts scholars have found that UA organisations fill gaps left in the neoliberal roll-back of Keynesian welfarism (McClintock 2014) by providing those most affected the food and activities that would have been provided through the safety net of the welfare state, and thus enable the roll-out of neoliberalism (Poppendieck 1998, Guthman et al. 2006). Critical literature observes that alongside 'classical' strategies such as privatisation, the de facto incorporation of civil society into urban governance acts as a 'soft strategy' in the neoliberal transfiguration of cities (Rosol 2012). This ensures devolution without public funding as governments are relinquished of responsibility to address the structural causes of food insecurity and inequities (Donald 2008, Andrée et al. 2014). In both these cases UA practitioners may not intentionally contribute to gentrification or to the 'roll-out' neoliberalisation of cities. The inequitable power dynamics of neoliberal cities that co-opt green space into entrepreneurial agendas mean that criticality and reflection are necessary in developing urban agroecology, and reaffirm the need for deep democracy in which these dynamics mapped and considered.

The above critiques of urban agriculture's role in the neoliberalisation of the city is not allencompassing as in reality the practice is diverse in manifestations. Authors have observed how the practice contributes to actively resisting neoliberalism and reimagining the city in socially just and ecologically-sound ways. Urban gardening has been described as a, "form of politics from the bottom-up, fighting for a radically different, social just and ecologically sustainable city" (Follmann and Viehoff 2014: 1166), and can be liberatory in the face of neoliberal relations, galvanising people to be actively critical in their understandings of the food system and the food regime (Tornaghi 2014). Gardens are locations where public versus private conflicts over land use play out in both philosophical and literal manifestations (Schmelzkopf 2002), and as sites to resist gentrification (Reynolds 2015, Sbicca 2012). Political demands, for instance, have included structural change in the way neoliberal property and markets function and for equitable redistribution of resources such as land and water (Holt Giménez and Shattuck 2011).

The radical elements of urban agriculture go some way to show why the practice has remained a, "residual, marginal and interstitial practice" (Tornaghi 2017) with transformative politics at odds with dominant neoliberal logics and conditions. Systems of urban land value, land management and landscape design are chiefly orientated by market mechanisms which prioritise high profit, namely commercial regeneration, and downgrade agricultural, agroecological and solidarity-based community food growing practice; thus limiting the possibilities of transformative change to the food regime (Deh-Tor 2017, McClintock et al. 2012) as UA often finds itself with temporary land tenures with projects relying on volunteerism and self-exploitation (Tornaghi 2017).

While there are cases of UA being supported by municipalities with funding, land provision and incorporating the practice into food strategies (Greater London Authority 2018, Broadway 2009, Cohen and Reynolds 2014) and signs of holistic and just urban foodscapes emerging through urban food policy mobilisations (Moragues-Faus and Morgan 2015); policies and regulations for expanding UA have been largely disadvantageous, with urban planners slow to address food-related

concerns in cities generally (Pothukuchi 2004, Bedore 2010). Intrigue around UA in regional planning has often led to the use of UA activities as stopgaps in empty plots to boost the image of the surrounding area and bring with it associated benefits (McClintock 2018), while established urban community gardens have been bulldozed in lower-income areas (Gottlieb and Joshi 2010). These experiences highlight how UA is manoeuvred to benefit state-market governance in entrepreneurial visions of city life, while city governance is often unwilling to commit resources and long-term land use to embedding the practice into cities long-term. Linked to this is Tornaghi's (2016) assertion that UA advocates in a "food disabling city" have to continually justify that urban agriculture can be a direct way to contribute to the food needs of urban populations in the first place. What is important to note is that for urban agriculture and urban agroecology to thrive there must be space in the city, and the historical production of precarious land cultures, through policy and planning, limits UA's funding streams, community development, sustainable finances and developing ecological practices (Meenar and Hoover 2012, Just Space 2016b, Meenar 2017).

Urban agriculture's experiences of the disabling conditions of the neoliberal city complicates the discourse that frames the practice as neoliberal. Literature on urban agriculture highlights how the practice is "fraught with contradictions" (Tornaghi 2017), having a complex relationship with the neoliberal city. These different manifestations have led to scholars describing urban agriculture as either radical (McKay 2011) or neoliberal enacting a political reformism at best (Holt-Giménez and Wang 2011, Alkon and Mares 2012, Pudup 2008). Considering the heterogenous forms of UA and different political approaches, I find it misleading to universalise UA as one thing or the other. I readily support Harris's (2009) and Kurtz's (2001) analysis that a 'dialectical tension' is embedded in UA, and McClintock's (2014: 148) assertion that:

"urban agriculture (...) is not radical or neoliberal, but may exemplify both a form of actually existing neo-liberalism and a simultaneous radical countermovement. Further, I contend that urban agriculture has to be both; indeed, contradictory processes of capitalism both create opportunities for urban agriculture and impose obstacles to its expansion."

In acknowledging and engaging with the UA's contradictions as regards hegemonic neoliberalism, there lies potential for transformative learning and action. What can we learn from the dialectical tension and limitations of UA in the neoliberal city, considering urban agroecology's evolution with a central theme of deep democracy? Firstly, that disabling conditions of neoliberalism blunt the radical elements and potential of UA becoming more in tune with agroecology principles and becoming popularised. A second key learning is that green space, organic food, and urban agriculture generally is co-opted into entrepreneurial city development and risks becoming a technology of neoliberal governmentality (Darly and Mcclintock 2017). And thirdly, in centring commercial products at the heart of a "market as movement" strategy this emulates individualistic

subjectivities in a neoliberal mould. This dialectical tension and bind of fragility in the neoliberal city is expressed in Daftary-Steel et al.'s (2015) "unattainable trifecta of urban agriculture".

2.5.2 Trifecta of urban agriculture, viability and spatial justice

The trifecta of UA highlights how un-attainable expectations of UA have been developed in concert by funders, policymakers, practitioners and academics which cannot be met without external monetary support (Daftary-Steel et al. 2015). The authors describe this as a trifecta of mythical expectations where UA projects can provide:

- affordable healthy food for people with limited resources
- employment, training and leadership development for people who usually experience exclusion in these activities
- fair wages for food growers through commercial sales of produce

These goals can be seen to meet social principles of agroecology and form basic elements of deep food democracies. In the UK the trifecta is situated in an agricultural sector that has been forced into "diversifying incomes" to remain viable (Gasson 1988, Maye et al. 2009), with below-average annual incomes for farmers (Office for National Statistics 2011), depressed food prices that do not reflect 'real cost' (Morris 2014), enabled in part by exploitative labour relations inside and outside the UK (Case 2018, Webber 2019) and a biased subsidy system that benefits large landowners and limits access to markets for small-scale agroecological growers (University of Reading n.d., The Landworkers Alliance 2014). Ultimately, in an inequitable and exploitative market expecting that UA projects are able to meet the trifecta, which aim to respond and contribute to transforming the structural context and be viable without external financial backing just doesn't quite add up.

The unattainable trifecta has had different impacts on UA that urban agroecology can learn from. Firstly, cheap food prices that do not take into account values of unseasonal storage of products and the ecological repercussions of transportation, nor often provide fair wages, make it difficult for small-scale urban agroecological producers to compete in the market and pay workers fairly (Deh-Tor 2017). As with their rural counterparts, this has meant that urban farms have to rely on diverse income streams through commercial activities other than food production (Siegner et al. 2019), which has contributed to mission drift. Secondly, due to pressures of financial instability through a lack of income from food production, many UA projects are funding-reliant and thus placed into competitive short-term funding cycles. Emphasis on short-term practical projects, attracting local uptake and support from funders focused on quantifiable outputs, contributes to social mistrust and disconnections between UA organisations and the communities they are based in, with strategies of long-term food democracy put on the back burner (DeLind 2014, McIvor and Hale 2015).

Urban agriculture's and urban agroecology's struggle to endure in neoliberal contexts is not new, as historically attempts in the UK and USA to deepen democracy by acknowledging humanity's mutual interdependence have struggled to survive against the backdrop of competitive individualism and consumer capitalism (Singh and Wakeford 2008). Within broader alternative food movement literature the issue of economic viability, too, has been raised in relation to goals of social transformation, particularly the development of the food hub model (Levkoe et al. 2018). One way forward is an economic strategy of gifting outside of neoliberal markets, with the exchange of alternative currencies as well as money through UA, as proposed by Tornaghi (2017: 796):

> "People could join in by donating/sharing different resources depending on their preferences, cultures and available resources: land, labour, produce, cooked food, organic waste, storage space, transport, time and skills."

However, as Ghose and Pettygrove (2014: 1103) note, participation in non-commercial urban gardens requires extraction of material and labour resources from resource-poor citizens already struggling to meet their basic needs. This throws up questions around what the relations are between accessible and equitable deep democratic process and inequitable resource distribution neoliberal environs. For instance, Allen (2004) connects inequitable participation with inequitable access to time and money as related to social structures when stating that:

> "Access to processes of community interest are often dominated by those with the most resources, knowledge or connections. People who disproportionately experience food insecurity such as low-income earners, children, and single mothers may not have the time, energy, transportation and money to participate in local planning meetings."

Therefore, if urban agroecology aims to generate viable deep democracies that engage in its dialectical tensions within the neoliberal city, it must acknowledge how material and participatory justice are connected in the formation of full participatory prefigurations. This connects with agroecology's ambition to remove disabling conditions and create enabling contexts for human wellbeing (Anderson et al. 2019, Dehaene et al. 2016), and the need for urban food movements to negotiate the challenge of sociospatial equity (Moragues-Faus and Morgan 2015: 1570).

Participatory justice is the potential for people, particularly those historically marginalised, to participate as equal partners in all levels of decision-making about how benefits and burdens are shared in the correction of socio-economic disparities (Moragues-Faus 2017, Loo 2014). Distributional justice concentrates on whether the distribution of benefits and burdens are fair,

namely whether everyone is getting their fair share. Although I disagree with Loo's (2014) reading of Alkon and Agyeman's (2011) definition of food justice as light on participatory elements, I do agree with the author's suggestion that food justice should be defined with as much emphasis on participatory justice as on distributional. Both Allen's (2004) point that distributional inequalities shape participatory injustices, and Fraser's (2000) assertion that economic (distributional) injustice is the expression of cultural hierarchies (participatory justice) are both valid, and I hold that these are connected rather than in opposition as to which should get most attention.

If procedural justice should be a core governance value in urban agriculture (Prové et al. 2019), and also in urban UAGC, then full participation can be supported by acknowledging different access to resources, time and money, and aim to incorporate equitable distribution of these. At the same time, without participatory justice social power is re-embedded into missionary complexes, and systems are at risk of being unfit for purpose without diverse everyday experiences to shape just distributional mechanisms. Therefore, in evolving urban agroecology in the inequitable context of the neoliberal city, considering both social power in decision-making *and* distribution of resources are necessary prerequisites in generating deep democracies.

This underpinning conception of justice in the neoliberal city speaks to the different elements of deep democracy covered in section 2.3; it asks for consideration of how peoples come together from different positionalities with varying access to resources in the aim of building enduring relationships, and calls for the mapping of social and material conceptions of power, to formulate complex understandings of commons-creation. In relationship to the inequitable geographies of the neoliberal city, a deep democracy that evolves through understanding of and action towards distributional and participatory justices offers potential to engender spatial justice as emancipatory formulations of UAGC. Spatial justice demands that the needs and visions of all residents are reflected in city spaces, and that those affected by how space is shaped have opportunity to participate (Soja 2010, Barron 2016). If urban agroecology is to enable inhabitants to meet in urban space and negotiate and shape the city in their own image (Purcell 2013, Dehaene et al. 2016), then developing better understandings of how to become viable and endure with equitable distribution as part of mobilisations can critically support the praxis in its aims. As Soler et al. (2019) note, the agroecology movement does not give enough importance to issues of economic viability, and as job insecurity mainly affects women then agroecology, in line with feminist principles, must question how to obtain both a decent income for workers, and affordable prices for low income consumers. These aims reflect the aforementioned 'unattainable trifecta of urban agriculture', and highlights that there is a gap in knowledge as to how build viable (urban) agroecologies.

It is important to contextualise urban agroecology movements' efforts to shift hegemonic social

structures and material inequity towards equitable processes and relations. Food and health inequities will not change, and full participation in decision-making decisions cannot occur, without the reversal of social structures of ownership and the ironing out of multiple forms of power in society (Holt Giménez and Shattuck 2011, Allen 2004: 159). We cannot expect UAGC to do this work alone. In applying McClintock's (2014) suggestion that we should limit our expectations of urban agriculture to urban agroecology, it is appropriate to situate the young praxis as part of a constellation of social movements working towards just sustainability (Santo et al. 2016). DuPuis (2005: 361) outlines an approach that can support navigating dialectical tensions and viability in the neoliberal city, by not, "creating an ideal [...] model of society and then working for society to meet that standard, but on articulating open, continuous, reflexive processes".

In this section I synthesised literature on neoliberal cities, introducing London as a key exacerbator of neoliberalism. As a closely connected practice to UAGC, urban agriculture shows us the complexities of existing within the neoliberal city, manifesting market logics and reformist tendencies whilst also embodying places and practices of resistance and transformation. Whilst highlighting the need for critical awareness of being co-opted into entrepreneurial urbanism, the disabling urban conditions and trifecta of urban agriculture raise questions as to how to generate viable urban agroecologies. I emphasised the necessity of this to propagate enduring deep democracies capable of creating equitable platforms for dialogue across different positionalities, considering material and structural barriers that shape participation. The section therefore points towards research that develops approaches supportive of viable prefigurations in the neoliberal city, capable of making equitable space for enduring relationships, and engages with the issues highlighted in section 2.4 such as reimagining the local. The next section of the chapter draws together the line of argument, pointing to gaps in knowledge in which this PhD situates itself.

2.6 Summary: "Mind the gap(s)!"

To contextualise the young praxis of urban agroecology and highlight strategic directions for research, this literature review has focused on three main areas: agroecology, urban agriculture (with food justice), and the neoliberal city. In developing agroecology in new contexts outside rural areas in the Global South I identified the importance, if the praxis is to retain political elements, of centring democracy and liberatory pedagogies (2.2). This is especially necessary in the UK and Western Europe, where co-option and overemphasis on agroecology as a science and a practice is present.

In considering what food democracy means, the concept of deep democracy was singled out so as to address agroecology traditions of dialogue on power (2.3). In applying deep democracy to urban

agriculture, with food justice critiques, it was found that, despite some transformative qualities, disempowering dynamics exist in relation to social inequities embedded in missionary complexes and the narrative of local foods (2.4). These called for the need for community self-definition of healthy foodways and for bridging local food with translocality, with an underlying necessity to shift towards equitable epistemologies. This echoed with the aforementioned need to develop transformative agroecological pedagogies in the context of Europe, as a strategy for evolving urban agroecology.

To consider how such efforts might be influenced by the context of the neoliberal city, section 2.5 showed how, despite co-option, UA has been severely under-resourced, leaving it residual and limited in the development of deep democracies. In the inequitable context of the neoliberal city, resources are necessary so as to counter material barriers to deep democracy and work towards full and equitable participation. I conclude that research into *how* processes of deep food democracy can be carried out with agroecological pedagogies is vital in the evolution of urban agroecology, with understanding of how initiatives and movements can be financially viable while the risks of co-option into neoliberal logics.

By choosing to base this enquiry in a food hub and a workers' co-operative (as further outlined in chapters 3 and 4) I respond directly to the question in the context of urban agroecology's evolution:

"The analysis of deep democracy could hone in on more specific local food practices, such as farmers markets, food hubs, and food policy councils. How are these spaces meeting (or failing to meet) civic challenges identified by deep democracy?" (McIvor and Hale 2015: 739).

Given the context and food democracy focus of the study, this thesis builds on recent work exploring civic food networks and food democracy through a food hub in the UK, which recommends tactics to such as flexible ethical standards and building relationships rather than skills through accessible participation (Prost 2019). One key difference between this study and the aforementioned one lies in their methodology; although both aim to use participatory action research (PAR), this enquiry begins shaping foodways through popular education with participants from the outset, and stems from an insider perspective. The insider perspective of the action research contributes new knowledge to deep democracy discourses, with an approach that is light on literature. Urban agroecology being a young praxis, this PhD contributes vital empirical research rooted in community-level organisations (Siegner et al. 2019; Renting 2017) to support better understandings of its "emancipatory potential" (Tornaghi and Dehaene 2019) in relation to emerging theory. The thesis explores three areas in relation to this: organisational structure, policy creation, and financial viability. With governance highlighted as a transformative process central to urban agroecology (Schmutz 2017) and calls for developing direct democracy in the praxis (Pimbert 2017), the PhD seeks to understand what kind of organisational structures and processes enable this. Organisational structure was chosen as a topic since systems for sharing power can be vital in generating social change within movements (Stewart 2019). The workers' co-operative was chosen as a structure with democratic principles of workers' control, while aiming to generate resources and income through goods and services that are often socially useful and have the option to make the company not-for-profit. In effect WCs, in trying to survive and thrive with deep democracy in neoliberal cities, have potential to engage with the dialectical tension embedded in urban agroecology initiatives. I provide a fuller literature review as to why workers' co-operatives have potential to elevate urban agroecology with deep democracy in the next chapter outlining the backstory and research context of the organisations, so as to be close to the discussion of the worker co-operative in question.

Due to its ability both to engage in anti-capitalist politics and to engage reflexively with the market in order to generate resources to pay workers fair wages, the workers' co-operative in the study is also the main focus for understanding how urban agroecologies can become viable for enduring transformations. This particularly focuses on anti-capitalist livelihoods in the emerging urban agroecology in London (Tornaghi and Dehaene 2019). While economic viability and fair livelihoods for farmers have been central to agroecology in the Global South, and urban agriculture projects in the USA and Canada have shown their economic viability (Kaufman and Bailkey 2000), research into UA as an entrepreneurial activity has been largely neglected in Europe (Specht et al. 2016). Although issues of entrepreneurship are now attracting more attention (Specht et al. 2016), there is currently an absence of literature on the economic dimension of agroecology within Europe (van der Ploeg et al. 2019) which is needed to support equitable agroecologies and embody political principles (Soler et al. 2019). Situated in a new entrant not-for-profit enterprise, this thesis builds on understandings of urban agroecology's economic dimension of, "inventing forms of economic organisation that re-territorialise food and wealth production whilst creating free time for citizens to shape and re-govern urban spaces" (Pimbert 2017:15).

The third area of focus of this study is the creation of policy at a food hub based at community level with potential to be a sub-territory level operation. Although their work is focused a different scale (territory and national), Coulson and Sonnino (2019:171) point out that, "as one of the first countries to develop innovative urban food governance arrangements, the UK constitutes a productive terrain to examine how food policy developments are circulated, (re-)interpreted and (re-)assembled." By engaging with popular education approaches to generate a food policy at the burgeoning food hub, the enquiry engages with the need for a transformative pedagogical approach in Europe (Anderson et al. 2018), with potential for learnings to speak to and be useful at other

policy scales. This process in the enquiry particularly sought to understand better how to break out the local trap and to challenge missionary dynamics of imposing foodways as inherited from UA (see section 2.3.2), through aiming to develop democratic cultures with a participatory process in shaping a central organisational policy. With calls for participation in development of urban agriculture in the UK (St Clair 2017), this enquiry contributes new knowledge, building on prior scholar-activist efforts (Tornaghi and Van Dyck 2015), and more broadly develops political understanding of urban agroecology in testing the possibilities of, "expanding citizen participation and democracy" (Pimbert 2017:15). In the Methodology (Chapter 4), I begin by identifying the subquestions of this thesis in relation to identification of the above gaps in knowledge and elaborate on how the workers' co-operative and food hub enquiries emerged as separate, yet connected, in responding to these. I first outline the backstories of the organisations, in Chapter 3, with relevant literature on their organisational forms and introduce the territory of London with a focus on emerging urban agroecology mobilisations.

Chapter 3: Research context and organisations

"Sometimes I do not like London (central line, rush hour) but I trust it. I trust that it is a city, from its people to its landscapes, always in evolution. This change sometimes happens in brutal ways I do not like, but it reminds me that if a city like London must change, for better or worse, then so must we" (Nwulu 2016)

The aim of this chapter is threefold in providing context to the study; to give more background detail to London as a potential site to evolve urban agroeocology; to introduce the two organisations that are the focus of this study, London Grown Workers Co-operative (LGWC) and Wolves Lane Horticultural Centre (WLHC) within their locality; and to outline contextual literature to their organisational forms. In terms of focusing on London as the territory in question, socio-economic factors of the city were described in chapter 2 in relation to literature on the neoliberal city, and so in this chapter I focus more on social movement mobilisations as a background to a potential urban agroecology (UAGC). I begin by giving more textured insight to the assertion that:

"London (United Kingdom) presents a bubbling context in which a large coalition of politically organized social movements – partially affiliated to La Via Campesina – have long been organizing against highly concentrated land ownership, food-skills loss and rampant speculative gentrification, carving out spaces of antagonist thinking, building land-based livelihoods and proactively lobbying the Greater London Authority to influence spatial planning and policy" (Tornaghi and Dehaene 2019: 9).

Food is an illuminating indicator of inequality in London, whereby people on low incomes have comparable obstacles in accessing fresh healthy foods – as is true of other large urban conurbations (Caraher and Dowler 2007). In the city there are a host of local-level food-related projects working to increase access to fresh foods through, for example, food kitchens, education programmes, gardens, and school initiatives. Caraher and Dowler (2007) found over 400 food-related projects with the equivalent of two full-time equivalent workers (through volunteers or paid input per project), and by 2016 Sustain's Capital Growth programme, born out of the 2012 Olympics in London, had supported a network of 2400 community gardens (Sustain 2016). Resource and policy support has been highlighted as necessary for food projects to flourish and meet their potential contribution to London food economies (Caraher and Dowler 2007). The muted impact of agroecological growing within the city's food system is highlighted by Ru Litherland (2014: 194), lead grower at Organiclea, one of London's longest-running community market gardens:

"Although 2012 /13 saw us producing and getting to market over ten thousand kilograms of fresh produce, on one hand, that's a lot of grub; on the other, it's a drop in the ocean of groceries shipped in and consumed in this borough."

Whilst London agroecological food growing projects struggle to scale up with necessary policy

support, they also face the challenge of taking a systematic approach in addressing 'food poverty' (Levidow 2018: 373). This complex relationship between viably scaling up agroecology whilst forging food justice practice in a centre of neoliberalism is reflected in a complex relationship with gentrification, as seen more broadly with UA (see section 2.5.1). On the one hand community food growing projects have been lost in relation to regeneration programmes (Buchanan et al. 2017), and at the same time small businesses offering affordable culturally-appropriate foods are being forced out of regeneration areas as more expensive 'organic' and 'vegan' outlets move in (Ziaei 2018). The relationship between local food growing and gentrification is highlighted with the increase of short-term 'pop up' growing sites, rather than long-term tenures being made available to organisations, which impacts on the ability of agroecological praxis to literally take root (Buchanan et al. 2017).

In this context Levidow (2018: 363) finds that city-wide networks have evolved territorial strategies connecting skills for empowerment, affirming resources as community assets and value, establishing place-based food cultures addressing 'food poverty', and creating social enterprises to build short food-supply chains. One example of this is the Community Food Growers Network's (CFGN) response to an observed lack of focus on, "pre-existing economic, social and cultural relations of power and privilege existing both among and within localities" and how initiatives interact with low-income communities of colour (Ziaei 2018) (see references to London's movements in 2.4.1). The network has produced events and publications raising questions on these (CFGN 2018, Mama D 2018, Barton 2017), working towards a movement dynamic where, "the people most affected and most marginalised by the current food system are at the heart of shaping and changing it" (CFGN 2017b cited in Levidow). LGWC and organisations at WLHC are members of CFGN, with WLHC appearing in the network's handbook on how to build relationships with councils to secure land, funding and publicity locally (CFGN 2017b).

In response to the key issue of long-term land access, food growing networks in the last decade have built broad alliances with 'right to the city' and 'right to housing' groups to challenge the loss of public land and housing through the privatisation agendas of city elites (Buchanan et al. 2017, Edwards 2014). In acknowledging the need for policy change at a territorial level, networks have worked with spatial justice campaigners to write policy suggestions for the city's strategic planning document on food growing and production (Just Space 2016b), making up an, "ambitious agenda [that] conflicts with local authorities' aims to increase land value, inward investment and the tax base" (Levidow 2018: 371). In the territorial context of London, therefore, while there are indications of network mobilisations that reflect social justice commitments of agroecology, there is ongoing unresolved tension within the city's community food networks reflecting urban agriculture's broader conundrums of survival, scaling outwards and building food justice practice (see 2.4).

The contradictions and conflicts within the emerging agroecology movement reflect the broader geography of the city itself. This was highlighted when sharing an analytic graphic on emerging research themes (see Figure 34 in section 4.6.4) with co-op member J, who noted that many of the positive elements of London were missing. We amended the diagram to include 'creativity', 'social justice movements', 'entrepreneurial spirit' and 'diverse communities and cultures', alongside critical perspective of 'austerity', 'hostile environment', 'gentrification', 'rising inequalities' and 'financialisaton of the city'. The developing UAGC movement is a fractal of social and environmental justice movements in the capital; from migrant support centres, worker campaigns, community-led centres, renters unions, and youth groups, to name a few. As Dada and Ferjani (2016) note, people are fighting back in the face of immense wealth and political capital, showing London's entanglement in that it is, "no simple transmission belt for neoliberalism. And yet it is made here" (Massey 2007: 12).

In defining the scale of this study, London is a 'territory' with its own identity (Bosetti 2018), with territory considered the critical scale or place in stimulating agroecological transformations (Wezel et al. 2016, Anderson et al. 2019). Figure 2 shows the two sites discussed in this thesis in relation to the territory with both sites siting on the edge of inner and outer Greater London.

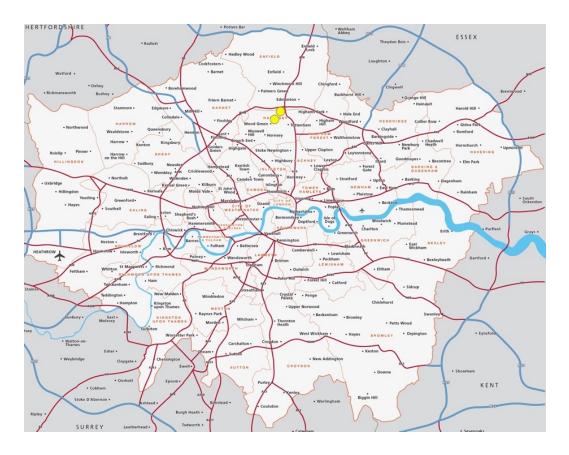
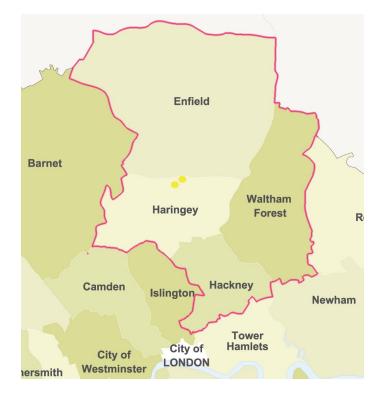


Figure 2: Map of Greater London with PG and WLHC highlighted in yellow in North London (sites not to scale) (Source: Maproom n.d.)

Within the metropolis there are sub-territories, as expressed by someone saying, "I'm from North-West London", or "I live south of the river [Thames]". Within different areas of the city each has differences (and similarities) in, for instance, cultures, food, vernacular, architecture and socioeconomics. This is reflected in political organising in the capital, with some food growing networks being borough-based, as in Hackney or Tower Hamlets (Tower Hamlets Food Growers Network n.d., Sustainable Hackney n.d.). As with many community food growing projects, volunteers came to LGWC activities at Pasteur Gardens and Wolves Lane Horticultural Centre from across the borough lines the gardens are situated in; in 2017 surveys found that volunteers were attending gardening sessions from Enfield, Haringey, Waltham Forest and Hackney (see Figure 3). So while the two enquiries are based in a 'community scale' (Anderson et al. 2019: 19), as they build community relations that stem from a particular place (i.e. the physical space where agroecology manifestations happen), they also have relations at a sub-territory level of the city – namely North London into North-East London, territory level through CFGN, and then national level through CFGN's relationship with the Landworkers' Alliance (LWA), who are connected on an international level with La Via Campesina. The positioning of this research reflects a foundational principle that agroecology transitions and policy must 'come from below' through community networks (Cuéllar-Padilla and Calle-Collado 2011).



Key: PG and WLHC highlighted in yellow (sites not to scale), the four boroughs where volunteers attended LGWC activities outlined in pink

Figure 3: Map of the northern area of Greater London

In having outlined the territorial context of the two organisations of this enquiry, and briefly in relation to connected networks at different geographical and governance scales, I now provide background information on London Grown Workers Co-operative (LGWC).

3.1 London Grown Workers Co-operative

Between the foundation of the co-operative in 2016 and the end of the research period (May 2019), there were six people, including myself, involved as co-op members. During the period of collective research activities four of us were members, with two members having left the organisation prior. Three new co-op members joined in May 2019 as I began to write up the research. I asked my colleagues how they would like to define themselves for this thesis. One asked to be described as 'anonymous market gardener' (AMB). J sent the description:

'My name is J and I AM a Nubian Sista, Outsider, Earth Guardian, Creative, Star Sailor, Writer, Eclectic Practitioner, with aspirations to be Untamed, Magical, Wise and Free.'

Dunya sent:

"My name is Dunya: I am a first generation, mixed race, cis-female, middle class Londoner. I do not own property or live in material stability. My name means earth, quince, everything of material existence. Despite displacement and alienation I aspire to embody my name: to be present, a child of the earth, fecund, worker, woman, artist, listener, daughter of witches. I work to disattach myself from the structures that curtail me and honour the ones that keep us together in trust."

LGWC developed through the Organiclea "Farm Start" programme which supports new entrant food growers to find land in or around London to set up food growing enterprises (Organiclea 2018). Organiclea has over 15 years' experience in running volunteer and education programmes focused around organic food growing in the neighbouring borough of Waltham Forest and describes itself as a, "community food project based in the Lea Valley in north-east London. We produce and distribute food and plants locally, and inspire and support others to do the same. With a workers' co-operative at our core, we bring people together to take action towards a more just and sustainable society" (Organiclea 2018).

AMB and I, who had been finishing a qualification together at Organiclea, had wanted to find a growing space to work one or two days a week to sell vegetables, having been told that we could make $\pounds 60$ a day in the harvest season. In signing up to the "Farm Start" we were asked whether we would be interested in setting up a gardening project with two Organiclea trainees at a seven-acre site in Enfield, known as 'Pasteur Gardens'. The site was owned by Haringey Council, who would

award Organiclea a 'tenancy at will' with peppercorn rent, before signing a more secure lease for the site.

The four of us agreed to set up a food growing project at the site, and in November 2015 we started a process of working out our mission statement, aims, objectives, roles and action plans for the organisation. In February 2016 discussions led to an initial mission statement: "To design, build and co-operatively run an ecological food growing and education hub that increases access to fresh, healthy food, and community space in the local area" (LGWC Project Plan 2016). The aims of LGWC were listed in a Project Plan in February 2016 as:

1. **Food production and distribution:** 'Pasteur Gardens' is committed to finding creative financial models that balances access to fresh, healthy food and financial viability.

2. **Community space and relationships:** 'Pasteur Gardens' will listen to a diverse range of voices in the surrounding area of what people want, how they feel about the project and be open to being steered by their feedback. We will actively reflect on our own processes, ways of working, and methods of building relationships.

3. **Co-operative livelihoods:** The organising structure will be not-for-profit, and everyone will be paid at the same rate so that we value all work equally.

4. Education: Informal and formal education will be integral to the approach and every day running of the project. From project members to volunteers to visitors – 'Pasteur Gardens' will be an educational space to learn individually and collectively.

5. Working with nature: Pasteur Gardens' will observe and work with the natural cycles of the wildlife and plant life on site. We aim to build soil fertility and be responsible stewards of the land with biodiversity and soil as precious assets for future generations.

The aims of LGWC broadly reflect agroecology principles with; community development, fair livelihoods and accessible healthy foods, and a holistic approach to food systems working with nature. The group agreed to volunteer one day a week each to develop the project until we generated food sales and funding. In 2016 the co-op raised a $\pounds 6,000$ grant for land works at PG and setting up storage and tool container, and in early 2017 we were awarded some seed funding of around $\pounds 14,000$ to run community research, test trade at markets, start growing-to-sell, and run a gardening volunteer programme. Co-op meetings were held every two to six weeks, with email and a phone message app used for making proposals and sharing updates and minutes.

In the summer of 2016 the co-op propagated plants at the Wolves Lane Horticultural Centre

(WLHC), which is just over a mile away from Pasteur Gardens, and in April 2017 joined a new consortium led by Organiclea to develop the site as a community food hub. This meant that LGWC's project plan shifted from developing a community food hub at Pasteur Gardens to developing this at WLHC where there was better infrastructure, whilst continuing to grow field crops and run outdoor learning at the PG. LGWC developed a food growing volunteer programme, commercial growing, school education programmes and community events across both sites in 2017. The co-op was a member of the informal WLHC management consortium from April 2017 to December 2018 and stepped back from running any activities at the site in November 2019 to focus capacity and resources on developing Pasteur Gardens. This was with retaining distribution relationships to WLHC and a commitment to collaborative working. With two interconnected enquiries (see section 4.2) within the thesis focusing on the different organisations -LGWC and the food hub at WLHC - it is important for clarity's sake to highlight that LGWC were also involved at the WLHC for a period of time, and that this enabled the research on the food hub's food policy due to my participation in organisational activities as a LGWC member. As background to WLHC is provided separately in section 3.3 I focus here on the Pasteur Gardens site in Enfield.

We started on the land on Pasteur Gardens in March 2016. The seven-acre site had been allotments in the 1930's, and a sports ground with a cricket pitch before being left derelict in the 1990's (see Figure 4). The site had no running water, toilet facilities or electricity, and was covered in two- to three-metre-high brambles, so that on opening the gate we had to cut our way through with a scythe (see Figures 5–7). The site had also become fly-tipped in small pockets. The co-operative designed an eight-year growing rotation using natural growing approaches, and with volunteer days in 2016 started clearing the brambles and setting up beds (see Figures 8–9). As the garden entrance is at the dead end of the road it does not have many passers-by and is fairly conspicuous to anyone that doesn't know about it, including, as we found out, people who lived on the streets next to it.



Figure 4: Aerial view of the Pasteur Gardens site with entrance marked



Figure 5: View of the Pasteur Gardens site in November 2015 from up a tree, showing the brambles and the trees around the edge of the site



Figure 6: Queensland Avenue entrance to Pasteur Gardens in February 2016



Figure 7: Grassy area next to trees and brambles that was cleared for a garden area, November 2015



Figure 8: The eight-year growing rotation developing at Pasteur Gardens, 2017



Figure 9: Gardening volunteer session at Pasteur Gardens, 2017

Pasteur Gardens is situated in the ward of Upper Edmonton in the south-easternmost part of the borough of Enfield, next to the borders of Haringey and Waltham Forest boroughs. The Indices of Deprivation 2015 indicates that, within Enfield, Upper Edmonton has been calculated to be the

second most deprived of the 21 wards in the borough, and is within the 10% most deprived wards in both London and England (Enfield Council 2018, Gov.uk 2015). From south to north the borough gradually changes from urban to suburban to peri-urban, with different pockets of each in more built-up areas. The west of the borough has relatively more wealthy households than the east; economically, the majority of residents in Enfield are categorized as "lower middle class", "working class" or "non-working" (postcodearea 2011).

House prices in Enfield are also rising faster than national and London average (Blunden 2017). While inner London has historically had higher deprivation and poverty rates than outer London, the Centre for London argue that poverty rates in outer London boroughs like Enfield are increasing as the housing crisis pushes lower-skilled, lower-income workers into such areas (Travers et al. 2016). Enfield has higher-than-average unemployment than the rest of London (Trust for London 2017), and the area used to have a strong manufacturing industry, but this has declined and jobs have not been replaced. As an outer London borough, Enfield has a better provision of green space, but the inner-city areas of Enfield, including Palmers Green, Edmonton and Arnos Grove still suffer from a lack of accessible green areas. As at the 2011 Census (Office for National Statistics 2011), in the Upper Edmonton ward the percentages of Black, Asian and Minority Ethnic Group (BAME) was 57.9% and Non-UK Born residents was 48.4%. The percentage of households without English as a first language was 22.7%. Enfield Council (2018) say that the ward contains relatively large numbers in the Turkish, Other Black African, Black Caribbean and Other Ethnic groups.

3.2 Workers' co-operatives as a strategic place for urban agroecology

In June 2016 London Grown legally registered as a company limited by guarantee, with the organisational structure of a not-for-profit workers' co-operative using consensus decision-making written into the 'Articles of Association' and 'Secondary rules'. This has been a usual way to set up a workers' co-op in the UK. The workers' co-operative structure reflected and supported equity for workers as reflected in the 'Co-operative Livelihoods' aim, with the expansion that, "Roles and responsibilities will be considered with long-term rotation and the aim to skill share across areas of the project for long-term sustainability" (LGWC Project Plan 2016).

Workers' co-operatives are organisational structures that combine worker ownership and worker management so that workers have the right to enjoy any surplus value created through production or to pass it on to another individual/community, and also the right to make pivotal decisions on the strategic direction and day-to-day management of the workplace (Pencavel 2012). In contrast with other forms of co-operative, there are no consumer-owners in a workers' co-operative, as only workers own shares in the enterprise.

Workers' membership of a co-operative in effect removes them from the labour market, as the organisation aims to create work and income stability, and, "maximise net revenue per worker" (Pencavel 2001: 53). With the features of self-organisation and ability to self-produce, workers' cooperatives have been described as, "islands of worker autonomy and responsibility quite distinct from the norm of the traditional labour movement" (Ranis 2005: 1). In considering "diverse economies for other worlds", Gibson-Graham (2012: 35) define 'community enterprise' and 'workers co-operatives' as 'non-capitalist', and 'non-profit' and 'socially responsible' organisational typologies as 'alternative capitalist'. Underlying principles of co-operative enterprises mark them out from capitalistic enterprise, which are, "self-help, self-responsibility, equity, democracy, equality among members, honesty, openness, and solidarity" (Birchall 2004 as cited in Majee and Hoyt 2009). When put into practice these principles can benefit the co-operative members and also the wider community, and, "it is fair to assume that, once learned, these skills are transferred to other areas of civic life" (Majee and Hoyt 2009). One reason for their attraction to those interested in social equity and economic justice is that worker-controlled shares cannot be sold as equity on capital markets and so are beyond the influence of conglomerate shareholders (New Economics Foundation 2018) who extract surplus value from those that produce goods and services. Mellizo et al. (2011) designed an experiment that indicated that when workers were allowed to decide on their own payment mechanism their work effort increased accordingly, which connects with the argument that co-operatives use resources efficiently and compete with conventional capitalist enterprise (i.e. sole proprietorships) with innovative developments (Gunn 2006).

WCs, in contrast to radical representations above, can be viewed as an instrument through which workers become capitalists, as capital ownership is protracted to broader parts of the community (Pencavel 2012). Whilst they are seen to create different norms in defiance of capitalism and make "real utopias" (Wright 2010), WCs have also been described as "of the capitalist world" and as functioning well in these conditions albeit being more democratic and egalitarian (Gunn 2006: 345). While relying on capitalist features of consumerism and individualism, co-operative members can collectively take more agency over their lives within the limitations of what's possible in a capitalist context (Braudel 1981). In this sense workers' co-operatives can be seen to reflect urban agriculture's conundrum as "both radical and reformist" (McClintock 2014) and also able to survive in neoliberal settings by generating income through capitalistic trade while making space for transformative relations of, for example, autonomy, workers' power, and direct democracy.

The transformative norms and practices that workers' co-operatives imbue are for the most part 'invisible and fragile' (Massicotte 2014), as in the UK where it is estimated that there are 403 worker owned and controlled co-operatives (Wikipedia n.d.). Co-operatives UK (2009) recorded a combined turnover of f_1 144 million for workers' co-operatives in the UK, with assets of f_3 2

million, showing that WCs also have some economic impact and take an active role in moulding societies. Yet the UK has one of the smallest co-operative sectors of any country, due to, "an absence of legislation and policy, institutional support, advice, incentive and promotion" (New Economics Foundation 2018).

WCs have been present in the roots of urban agroecology – in Brazilian (Pahnke 2015) and Cuban social movements (Earth 2019, Rotherham 2018), for example. Massicotte (2014), in a study of two co-operatives in the Brazilian Landless Rural Workers Movement, stated that workers' co-operatives, "explicitly challenge the dominant agribusiness model by appropriating and subverting the dominant discourse on what is possible and most effective" (Massicotte 2014). Further to this, Alkon (2013: 13), from a Global North food justice perspective, calls for experimentation with workers' co-operatives as a model for building socially just food movements, as "worker-owners [in food growing initiatives] develop a class-consciousness often missing from food justice activism." WCs therefore have history and political symbiosm with agroecology as a way to generate deep democracy and livelihoods for land workers – and so the model has potential for being a strategic site for evolving UAGC. Exploring this practically through LGWC is a key question for the thesis (see 4.1), and I return to evaluate this in chapter 6. I now introduce background information for Wolves Lane Horticultural Centre as the site of a food policy enquiry in this thesis.

3.3 A food hub at Wolves Lane Horticultural Centre

The WLHC is a unique community resource on Wolves Lane in Wood Green, London. The threeacre site consists of a rare sub-tropical palm house with koi carp and terrapins (see Figure 10), a glasshouse with cactus room and rainforest area, barn, professional-standard kitchen and café, classroom, and woodland area, as well as six professional-standard glasshouses. In April 2017 Haringey council shut down operations at the centre, after eight years of educational sessions with local schools on plants and nature, and a programme supporting people with disabilities in employment through running a garden centre and growing plants for the borough's parks. Prior to the step-back in management Haringey Council (2017) stated:

"With government cuts to the council's budget meaning a fall in funding, it was agreed by Haringey's cabinet that a third-party organisation would be best placed to make the best use of Wolves Lane and maintain it as a community asset."



Figure 10: The palmhouse at WLHC in September 2017

In the summer of 2016, the council opened up a bidding process to take on management of the site, with criteria leaning heavily towards socially beneficial activities. Organiclea led a consortium of groups to develop the centre as a community food hub with five themes of:

- Food growing sustainable foods
- Training and volunteering
- Healthy eating culturally appropriate, nutritious foods
- Food distribution box scheme, market
- Community activities

In January 2017, Organiclea's bid was successful, and there was a handover in April 2017 (Organiclea 2017) (see Figure 11). As part of the council handover, the plan was that a 25-year lease would be signed between Haringey council and Organiclea, and passed on to the consortium of groups once it had legally constituted. At the point of handover other members of the consortium were Crop Drop (Crop Drop 2019), a not-for-profit veg box scheme run by and for Haringey residents, who would focus on food distribution, and Dee Woods, an award-winning community cook who would develop community cooking and healthy eating programmes. Shared Assets (Shared Assets n.d.), who support the development of sustainable, democratic and productive new models for land management, were also a member of the consortium who would take a more background role in supporting with organisational structures development. LGWC's role was to develop food production, education and volunteer programmes around food growing. The Ubele Initiative (Ubele Initiative 2018) – a social enterprise with a mission to contribute to the sustainability of the African diaspora community through social leadership programmes, community enterprise and social action – joined the informal consortium in January 2018. All management consortium members were to participate in activities of collectively managing and evolving a community food hub around the themes of the bid.

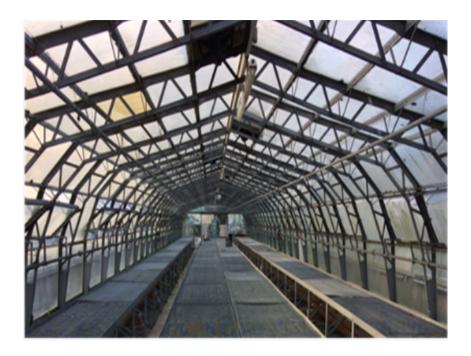


Figure 11: WLHC after Haringey council handed over management to Organiclea in April 2017

In the first year there was a focus on clearing the site and beginning to run some activities around the themes of the bid. The groups at the site worked to develop their own activities, i.e. Crop Drop – food distribution, with collaborative working on regular activities such as a weekly lunch for volunteers, open days each Sunday, and seasonal community markets. Crop Drop moved its box scheme operation to the site through 2017. LGWC started using two of six glasshouses to run volunteer and schools' programmes in gardening, and to grow food sold to the Crop Drop box scheme and at community market stalls, used in volunteer lunches, and donated to local community groups (see Figures 12 and 13). Using LGWC funding the co-op also worked with Deirdre and the Ubele Initiative to facilitate community research with a survey and workshops with six Haringey community organisations to shape a vision for the centre with collaborative relationships. Other Organiclea farmstarters, social enterprises and a residents group used the remaining growing space.

This included groups that Haringey council had suggested working with: a local social enterprise that grows sustainable cut flowers (Wolves Lane Flower Company n.d.), and a group of residents that had campaigned to save the centre. Over 2,500 people visited WLHC in the first two years of the consortium group taking on management of the centre. Funding for paid work to run and manage the centre with a part-time site manager and a volunteer coordinator was secured in early 2019; until then the centre was run voluntarily by members of the management consortium and the Wolves Lane Crew'. The latter was a large and committed group of volunteers who met weekly to complete routine maintenance tasks, as well as to contribute to the overall improvement of the site. **Content removed on data protection grounds**

Figure 12: A community gardening session run by LGWC in July 2017



Figure 13: Aubergine and cucumbers grown by LGWC in 2018

During the research period the management consortium met for strategy sessions to develop the centre as a community food hub, and registered the Wolves Lane consortium' as a legal organisation in May 2019, with Organiclea, Crop Drop and the Ubele Initiative as 'stewards' of the site. The buildings and glasshouses were in need of refurbishment, having had little investment for many years, and a ten-year Development Plan was generated, aiming to secure local and national investment to transform some of the main buildings. The management consortium also had operational meetings and online communication concerning the running of the site, and communicated with the Wolves Lane Crew about maintenance and site development. The time period also included trialling different management and communication structures, with workinggroup formats including volunteers and non-management consortium organisations to varying degrees. Sometimes the social enterprises and community groups outside the management consortium were consulted about directions for development of the hub, although they were not included in consortium management meetings. Membership of the consortium management group was agreed by existing members. From conversations, I understood that some people running activities and organisations at the centre were happy to have no involvement in centre management decisions, while others wanted to be more involved and to have more clarity about how decisions were made. This prompted, in part, the research enquiry to develop a community-led food policy for the hub, aiming to deepen the democratic culture with underlying values and decision-making structures being built from the bottom up (see section 4.5).

WLHC is located in Haringey, which is the sixth most deprived borough in London and has stark

health inequality (Haringey Council 2019). It is the fifth most ethnically diverse borough in England, with 190 languages being spoken; two-thirds of Haringey residents and 81% of the borough's school children are from Black and Minority Ethnic (BAME) backgrounds (Haringey Council 2013). The Runnymede Trust found that Haringey was the second lowest performing borough in London for ethnic inequalities in 2016 (Elahi and Khan 2016). There is a large wealth discrepancy between its different areas, with more deprivation in the east of the borough, where the Wolves Lane site is located. Gentrification processes are observed in the borough, with property prices and rents increasing (Parikiaki 2019). Haringey is home to a strong community-based politics; one political campaign successfully lobbied the borough to cancel a \pounds 2billion scheme called the Haringey Development Vehicle (HDV) in 2018, which campaigners said would provide inadequate affordable housing and contribute to social cleansing (Barnes 2018). An ongoing 16-year campaign aims to protect the only Latin Village in the UK – a vibrant market of 100% BAME tenants in Seven Sisters – that is under threat of demolition as part of Haringey Council's redevelopment (Pueblito Piasa 2019).

As the participatory food policy enquiry developed iteratively at WLHC, I worked closely and cofacilitated the process with consortium management members Deirdre Woods and Yvonne Field (see chapter 4). As key collaborators I introduce them here with descriptions they wrote in a cowritten draft article about the process. Deirdre wrote:

> "Deirdre is a disabled womxn of mixed Caribbean heritage, born in Ladbroke Grove. A decolonial black Feminista, human rights action-ist and cook citizen who is committed to social justice particularly in the food system. She has over 25 years experience in community and youth work, and alternative education. A resident of West London with family ties in Tottenham, she views herself as an outsider."

Yvonne wrote:

"Yvonne is an older African Diaspora cis womanist of Jamaican parentage. A child of the Windrush generation, with 40 years of community based and organisational experience, she describes herself as a lifelong change agent, serial social entrepreneur, scholar activist, global citizen and a mother of a daughter. After six years residency she still views herself as a relatively new-comer to North London. Prior to moving to Tottenham, she was born and raised in Lewisham, South London."

Yvonne, Deirdre and I worked to make analysis and produce an article for publication, and also presented findings from the policy process at the Royal Geographic Society Annual International conference in September 2019. After one rejection by an academic journal of our co-written article, we are currently discussing how to publish this (October 2020). In writing up the methods and analysis for this thesis I have referred to the draft article so as to reflect the analysis made with co-

researchers, as well as expanding on areas of my own analysis, that was not included in the article and has a different focus to this thesis. The thesis has been shared with Deirdre and Yvonne for feedback. During the telling of how the WLHC enquiry developed I sometimes use the term 'we' in relation to decisions made, aims and values of the methods, and this describes the three of us in the 'facilitation team'. Assertions of 'we' I have aimed to use based on previous collaborative writing and agreements with Yvonne and Deirdre, and use 'I' when presenting my own perspective so as not to misrepresent my co-facilitators.

3.4 WLHC as a food hub 'plus'

The food hub (FH) concept has emerged as part of a strategy to scale up local and regional food systems with the benefit that small and medium-scale farmers increase their market opportunities (Koch and Hamm 2015: 483). In the last few years food hubs have been seen to hold potential as an innovative enterprise concept that can partner community development approaches to meet increased demand for local food, encourage healthy communities, and develop sustainable food chains of exchange (Berti and Mulligan 2016). Blay-Palmer et al. 2013: 524) define food hubs as:

"networks and intersections of grassroots, community-based organisations and individuals that work together to build increasingly socially just, economically robust and ecologically sound food systems that connect farmers with consumers as directly as possible."

There exists a diversity of models within this broad definition, but the basic function and common characteristic has been described as the role of a, "regional food aggregator and distributor" (Fischer et al. 2015), which takes on the co-ordination role of a "missing middle" to increase market efficiency and enable small producers to connect with large customers (Morley et al. 2008). Studies also highlight that food hubs look beyond purely distributive functions and engage in "sustainable food community development" approaches (Berti and Mulligan 2016). These have been described as 'plus' elements that take into account social, economic and ecological dimensions, such as access to culturally-appropriate and healthy foods, deep democracy, and building community wealth and good jobs (Barham 2011, Fischer et al. 2015, Levkoe et al. 2018b). Wolves Lane Horticultural Centre (WLHC) aims to be a food hub 'plus', as seen in a blog announcing the project on Organiclea's website (2017):

"A coalition evolved with a vision for turning the Wolves Lane site into a hub for community food enterprise, and preventing the loss of its extensive rare urban glasshouse infrastructure. The aim is for an initiative that grows and distributes sustainably produced food to local residents and businesses; engages a wide range of people in learning and skills activities, and health and wellbeing benefits; establishes itself as a centre for promoting healthy eating; and offers space for community groups and social enterprises to run activities that benefit the community." With the glasshouses for food-growing, the packing house for Crop Drop's local box-scheme, and the café area for shared meals and community cooking, the site brings different elements of the food chain under one (or many) glasshouse roof. The above description begins with a focus on food enterprise and the commercial distribution of foods grown at the hub. Crop Drop also buys food from organic food growers in the regions outside London, which brings a "regional food distributor" element. The latter stages of the description enter in the 'plus' of the food hub with health, education and well-being mentioned, and space for community-beneficial activities. As described in the activities of WLHC during the research period, the hub's development of these characteristics have evolved to different degrees.

Food hubs have become a common model in the local food movement in North America, where the concept was originally developed (Psarikidou et al. 2019, Prost 2019, Levkoe et al. 2018b, Hardy et al. 2016). There has been less interest from academics and policy-makers in Europe, and particularly in the UK, despite increased numbers of food hubs meaning that, "on the political side, specific policies, strategies, programmes and initiatives are missed" (Berti and Mulligan 2016). With data from a 2013 survey showing that 49% of food hubs used language about local food (Fischer et al. 2015), the food hub is an appropriate site to explore and understand how to break out of the 'local trap' (see 2.4.3). Food hubs in the UK have been seen to reflect broader food movement dynamics raised by food justice perspectives, as they appear to be an elitist phenomenon mainly engaging affluent consumers, and struggle to address food inequalities (Psarikidou et al. 2019; Franklin, Newton, and McEntee 2011). At the same time research has highlighted that food hubs have the potential and opportunity to be a pivotal cog in increasing access to healthy foods for all (Fischer et al. 2015, Public Health Law Center 2012).

The food hub, therefore, as well as being a place for engaging with the 'local trap', also provides a setting for experimenting with processes to understand deep and just food democracy that moves beyond elitist tendencies in food movements (see section 2.4). Food hubs have been described as having potential to be a "learning and innovation boundary organization" (Berti and Mulligan 2016), where different stakeholders (i.e. producers, consumers, residents, schools) meet to explore the 'missing middles' between production/consumption and society/nature (Moragues-Faus and Marsden 2017). This is particularly suited to agroecology research on understanding food systems in a holistic way and on how different food processes inter-connect with making space for *diálogo de saberes* across different positionalities.

In this chapter I have introduced background information to this thesis enquiry. I provided an outline of the territory of London as a site for UAGC, described the backstory of the two organisations featured in the research, and introduced literature on worker co-operatives and food

hubs as the organisational forms the research is set in. I have shown that the WC model has strategic potential to develop direct democracy and fair livelihoods as part of urban agroecology, and food hubs a pertinent site to explore limitations of the 'local trap' and 'missionary complex'. In the next chapter, on the thesis's methodology, I clarify objectives for the research in relation to the two interconnected enquiries at the two organisations.

Chapter 4: Methodology

"Knowledge rooted in experience shapes what we value and as a consequence how we know what we know as well as how we use what we know" (hooks 2010)

"As with all great things, it had no single inventor" Alfredo Molano $(1997)^1$

In this chapter I lay out the research approach and methods, with justification for these decisions. I begin by surmising the research objectives and sub-questions, based on the gaps in knowledge identified in chapter 2, and introduce how two interconnected enquiries set in the organisations outlined in chapter 2 respond to these in dialogue with one another (4.1). In 4.2 I assert that action research (AR) is an appropriate research approach for this enquiry into urban agroecology (UAGC) and present its key characteristics and critiques in connection with cognitive justice and the epistemological position of this thesis. I further situate this study's methodology as building on a "transformative agroecological learning framework" (Anderson et al. 2018) in Europe with the enquiry's aims of generating horizontalism and *diálogo de saberes* (DDS). Section 4.3 introduces considerations of validity and ethics concerning AR and how I aimed to build an ethic of care in the quality of the relationships that underpin the study. I reflect on my 'insider' position where the research has been mobilised from, and describe steps taken to acknowledge this in building transparency and rigour through the work.

Having mapped the research approach (4.1-4.3) I provide an overview of the research methods and analysis of the dual enquiry in section 4.4 with diagrammatic representations of how the research reflects the AR commitment of, "making the road while walking" (Rajesh Tandon as cited in Wicks et al. n.d.). The two iterative organisational processes are detailed separately in 4.5 (Wolves Lane Horticultural Centre [WLHC]) and 4.6 (London Grown Workers Co-operative [LGWC]) as to *how* they emerged, why they were chosen and who was involved in what ways. These latter sections aim to build rigour into the study so as to be, "aware [of] one's choices, and to make those choices clear, transparent, articulate, to yourselves, to your inquiry partners, and, when you start writing and presenting, to the wider world" (Reason and Bradbury 2008).

¹ Molano was speaking at the World Congress on Participatory Convergence in Knowledge in Cartagena, Colombia.

4.1 Research objectives and two interconnected enquiries

In Chapter 2 I highlighted deep food democracy as a critical feature in evolving agroecology from the city. This is expressed in the **overarching aim** of this thesis: To develop understandings of urban agroecology with a focus on deep food democracy and how this relates with tensions of trying to exist in a neoliberal city. The **research question** related to this is: *How can urban agroecology cultivate food democracy as a central tenet whilst surviving and thriving in the neoliberal city?*

Connected to the overarching aim are three objectives that reflect the three areas highlighted in chapter 2 as prescient in exploring UAGC, namely: organisational structure, policy creation, and financial viability. The **research objectives** are:

1. To explore with co-workers our individual and collective learnings in developing a workers' co-operative as an elevating organisational structure for urban agroecology

2. To develop understanding of how urban agroecology can be viable in a neoliberal city economy

3. To co-produce a just democratic process in shaping foundational principles of a food hub with urban agroecological intentions

The **sub-questions** of the thesis as connected to the above evolved as:

- 1. Is a worker's co-operative an elevating model in developing urban agroecology towards food democracy?
- 2. How can political urban agroecological initiatives be viable in the neoliberal city?
- 3. How can a food hub develop urban agroecology with a central tenet of food democracy?

The research project is split into two processes; firstly an evaluation of the experiences of a young agroecological workers' co-operative (LGWC) based at two sites, Pasteur Gardens (PG) and Wolves Lane Horticultural Centre (WLHC); and secondly the development of a participatory food policy process, specifically at WLHC, where an organisational consortium aimed to develop an agroecological food hub. The first process enables insight into a predominately *food-producing* agroecological organisation, and the latter a more integrative food approach including *food production, food distribution and food preparation.* The two processes offer opportunity for learning around urban agroecological workers and educators, and WLHC a consortium of groups bringing different skill-sets, volunteer groups, organisational aims and activities under one (mainly glasshouse) roof. The two enquiries therefore enable the evolution of urban agroecology with valuable dialogues:

"Amongst food producers with different positionings and perspectives; Between food producers and other actors in the food system (especially food consumers); Between food producers and formal education and research institutions" (Anderson et al 2018).

Through discussions with colleagues within the two organisations, as to what would be useful research, two distinct enquiries (outlined in 4.5 and 4.6) iteratively emerged, with different weightings in contributing to the above objectives. The WLHC enquiry focuses on policy creation with elements of a transformative agroecological learning framework (see 2.2.1 and 4.2.1), and the LGWC enquiry focuses on organisational type, in this case a workers' co-operative, and financial viability. In keeping with a holistic approach central to agroecology these different dimensional learnings are interconnected; for example, the knowledge on financial viability in the LGWC enquiry speaks to how to generate a deep and just democratic process at WLHC, while the procedural learnings of developing a food policy at a food hub also informs organisational structure explored through a workers' co-op. Discussions between the two organisational enquiries were not just carried by myself, since LGWC member J and some LGWC volunteers were also involved in WLHC workshops. Fundamentally these dialogic crossovers forge new knowledge to the overall research question concerning the development of urban agroecology with food democracy in the neoliberal city- and are referred to in chapters 5 and 6 and synthesised in chapter 7. In terms of an appropriate pedagogical approach to answer the research questions I now introduce action research (AR) as a way to support steering agroecology from within towards political qualities within a Western European context (see section 2.2.1).

4.2 Action research approach and epistemological position

Agroecological social movements have made clear assertions about the way agroecological learning and knowledge functions such as in the declaration of the International Forum on Agroecology (Nyeleni 2015):

> "Our learning processes are horizontal and peer-to-peer, based on popular education. They take place in our own training centers and territories (farmers teach farmers, fishers teach fishers, etc.), and are also inter-generational, with exchange of knowledge between youth and elders."

Agroecology calls for the democratisation of knowledge and learning (Pimbert 2018) and embodies horizontalism as prefiguration for social change (Sitrin 2006), thus creating a necessary connection between agroecology *with* collective learning and co-creation of knowledge (Coolsaet 2016). Action research is embedded with principles of participation, practice, democratic learning, lived experience and social justice (outlined in the paragraphs below), and is therefore well suited to agroecological research. AR is commonly used in research on political agroecology, and as is the case in this thesis, "political agroecology and urban political agroecology are taking shape at the

crossroads between scholar activism and urban movements" (Deh-Tor 2017: 9).

Action research is a "family of practices of living inquiry" (Reason and Bradbury 2008) and is essentially:

"a participatory, democratic process concerned with developing practical knowing in the pursuit of worthwhile human purposes ... It seeks to bring together action and reflection, theory and practice, in participation with others, in the pursuit of practical solutions to issues of pressing concern to people, and more generally the flourishing of individual persons and their communities" (Reason and Bradbury 2001: 1).

AR surfaced from a mosaic of knowledge and praxes fields reflecting its complex history and multiple forms (Brydon-Miller et al. 2003) and providing a broad scope of strategies with a host of roles for action researchers (Levin 2008). Participatory and action research developed in the majority world in the 1970s (Fals Borda 2001, People's Knowledge Editorial Collective 2016b, Lykes and Mallona 2008) as the ground was prepared for new research approaches by, "critiques of the colonial scholarship, imperialistic history, and continuing neo-colonialist presence" (Swantz 2008). Reason and Bradbury (2008) outline a core aim of action research as contributing, "to the ongoing revisioning of the West mindset – to add impetus to the movement away from a modernist worldview based on positivist philosophy." A key influence on AR is the work of Paolo Freire in Latin America, who challenged academic knowledge practices and the "banking system" of education whereby students consume and memorise information given them to by their teachers (hooks 1994). Freire's critical pedagogy calls for a process of conscientizacao (conscientization) (Freire 1975) where learners collectively engage in critical self-inquiry in developing confidence and capability to answer one's own questions (Rahman 2004). This process entails building critical consciousness, "to perceive social, political, and economic contradictions" (Freire 1975). Central to action research, therefore, is the principle that knowledge generates power and peoples' (lived) knowledge is central to social change (Fals Borda and Rahman 1991), especially in the case of historically marginalised groups (Torre & Fine 2006). Importantly, AR questions power hierarchies with the goal of socioeconomic justice (Fals Borda 1979) through emancipation, empowerment and participatory democracy (Grant et al. 2008).

Like agroecology, AR approaches social justice as both epistemic and political projects sharing a foundational principle that, "for there to be social justice there must be cognitive justice" (Santos 2016). Building on the aforementioned qualities of agroecology in challenging colonial knowledge systems (in section 2.2), I agree that, "all knowledge is forged in histories that are played out in the field of social antagonisms" (MacLaren 1996 cited in hooks 1994). Vandana Shiva (2016) asserts a relational perspective to knowledge that is present in agroecology and action research when she says:

"We live in a world of relationships. We are not isolated atoms, fragmented and alone. We are not separate from nature. This is an illusion of the Cartesian, Newtonian, mechanistic paradigm which created and dominated the intellectual architecture of the industrial revolution."

This reflects how since the fifteenth century science and research have been connected with the violent extractive model of Euro-centric colonialism, as, "new sciences intended to establish the natural foundations of racist, sexist, and class social order were coproduced in both the colonized and the colonizing societies" (Harding 2017: 628 referencing Lugones 2009). Consequentially traditional, lived and indigenous epistemologies have been systematically marginalised by a Euro-centric knowledge monopoly (Wakeford et al. 2015). This has been described as "epistemic injustice" (Fricker 2007), and "epistemicide" (Santos 2016), with Visvanathan (2006) calling challenges to these dominant knowledge hierarchies "cognitive justice".

One way AR engages in critical pedagogies to challenge epistemic justice is by upholding multiple 'ways of knowing' (Belenkey et al. 1986) in approaching knowledge as being embodied and experiential (Reason and Bradbury 2008), relational (Gaztambide-Fernández 2012), in memory (Vercauteren 2011), and emotional (Jaggar 1989). In asserting multiple ways of knowing, AR integrates theory and practice, scholarship and activism (Gayá Wicks et al. 2008) as an important step in coalescing the disembodied halves, as, "the blindness of theory renders practice invisible or undertheorized, whereas the blindness of practice renders theory irrelevant' (Santos 2016). As hooks (1994: 61) points out, "theory is not inherently healing, liberatory, or revolutionary", and can only be directed so when there is action and informed reflection in the world to change it - namely praxis (Freire 1972). Critically, therefore, action research embodies a way of "world-making" through action by people themselves that can include outside researchers (Gergen and Gergen 2008, Rahman 2008), taking the view that the world can only be understood by endeavouring to change it (Brydon-Miller et al. 2003). This element of AR has been related to Kurt Lewin's assertion, in the 1940s, of, "No action without research; no research without action" (Adelman 1993). Action research, therefore, emphasises the assembly of 'situated knowledge' (Haraway 1991) starting with everyday experience (Reason and Bradbury 2008) as a place to understand broader political and global processes (Katz 2004).

Participation is also key feature of socially just knowledge-building. Participation is political as it asserts people's right and ability to be involved in decisions in creating knowledge about themselves that effects their lives (Reason 2005). The dissembling and blurring of hierarchical research roles of the 'researcher' and the 'researched' (Kindon et al. 2007) means that ideally collaborators should be integral in all elements of action inquiries including the "questioning and sensemaking"; not doing so limits the emancipatory qualities of collective possibilities risking co-option (Reason and Bradbury 2008) and re-inscription of marginalising certain groups (Wakeford et al. 2008). Fals

Borda (1988), describing early characteristics of what is now called Participatory Action Research (PAR), highlights how *ownership* of research shifts through 'subject–subject' alliances with outside researchers as all participants develop self-reliant political reasoning. This *co-enquiry* aspect of action research with community groups and social movements initiated by academic researchers or otherwise entails "ongoing acts of solidarity" (Kemmis et al. 2014, Anderson and McLachlan 2016).

In summary, AR centres lived experience, practical action, multiple ways of knowing, and participation in aiming for cognitive justice as essential for social justice in the wake of, "the failure of the European system of 'post-enlightenment' science" (Wakeford 2017). While AR endorses that knowledge is socially-constructed (Brydon-Miller et al. 2003), challenging objective science's 'conquering gaze from nowhere' (Haraway 1988), its centring of situated knowledge within social power dynamics means that it also aims to move beyond relativism, which, "is a way of being nowhere while claiming to be everywhere equally" as the "perfect mirror twin" to universalism's "god trick" (Haraway 1988). This approach *on the other side* of modernity's binary thinking engages organically with ontology, knowledge, power and politics, and can be seen immersed in Santos' (2016) *ecologies of knowledges* which, "focuses on the relations among knowledges, on the hierarchies and powers emerging among them". In advocating for this perspective Santos (2016: 220) asserts that:

"To acknowledge the relativity of cultures does not imply the adoption of relativism as a philosophical stance. It does imply, however, the conception of abstract universalism as a Western peculiarity whose idea of supremacy of the interests that sustain it."

A final consideration in this section is the relationship of the epistemologies rooted in action research with *how* these shape contributions to knowledge in this thesis. Traditionally in western science, theory is made in making a knowledge claim beyond the bounds of a situation or case out of which it surfaced (Gustavsen et al. 2008) while AR (and agroecology) centres local knowledge as 'situated' in its social context (Haraway 1988) and aims to integrate diverging experiences into illuminating narratives which are necessarily formed from the specificities of origin (i.e. place, life history of co-enquirers) (Gayá Wicks et al. 2008). At the same time, since the 'local' is "constitutively global" (Katz 2001), action research must necessarily engage with social, historical and economic analysis beyond its locality so that meaningful solutions can be tested in response to social issues (Herr and Anderson 2005). The bind here is that sometimes in AR the influence of the knowledge generated is limited to the group of people involved as a contribution to human practice (Gustavsen et al. 2008) whilst social structures and hegemonies that create and maintain social injustices remain.

This tension in AR linked to knowledge, power and scale of social transformation effectively touches on the 'theory of change' underlying this thesis and how learnings within it might

contribute to social change. With this in mind I share the process and learnings of the enquiries, acknowledging the straw-man of positivism and that, "to reach out in society it is necessary to travel a far more complex road" and aim instead to contribute to a 'slow constructivism' (Gustavsen et al 2008). Thus, I emphasise the agency of local actors to generate knowledge based in their own contexts and consider external cases as a source of ideas. To this extent, while there is responsibility to share learnings in places of knowledge exchange beyond the local context, the way in which these may be translated and integrated into new contexts may be different from place to place, given local conditions – as is the case in this thesis which reflexively applies principles of political agroecology in the context of London, UK. Networks and social movements have been identified as rich places to bring together different local knowledges (Anderson et al. 2017). This approach of 'slow constructivism' through networked 'places' has correlation with brown's (2017) writing on 'emergent strategy'. The author (brown 2017: 45) refers to a fern in relation to scale and knowledge:

"Ferns are a form of fractal. A fractal is an object or quantity that displays similarity, which means it looks roughly the same at any scale. Small-scale solutions impact the whole system. Use similar principles to build at all scales."

The quote highlights how local-based learning can influence scales beyond itself without falling into universalisations, by observing the *relations* of different scales and how principles can move beyond locality with, as I interpret, a tacit acceptance that these principles in *moving* have different ramifications and actions in diverging 'situated' contexts. This can lead to different textures and strategies across social movements that come together around core values, as in the agroecology movement. Therefore, in considering how the narratives, reflections and perspectives of this thesis relate to new knowledges I aim to highlight fractal learnings that are in dialogue with broader social dynamics and may be applied in new local contexts across scales in evolving urban agroecology through praxis. This discussion of the qualities of AR and understanding of knowledge makes up this thesis' epistemological position. I now turn to critiques of action research in building a deeper understanding of the research approach.

4.2.1 Critiques of action research, dialogue and a transformative agroecological learning framework

Scholars have described participatory research as tyrannical in homogenising communities' experiences with a universal conception of participation and harmfully hollow in claims of community control of research (Cooke and Kathari 2001). Terms such as 'participatory' and 'empowerment' integral to action research have been found to be used in watered-down initiatives (Cornwall and Brock 2005) that generate emancipatory tokenism (Greenwood 2002), and leave "underlying structural issues of colonial power, patriarchy and positivist modernity" unchallenged

(The People's Knowledge Editorial Collective 2016). One way that processes gloss over power relations and reinscribe dominant ways of knowing in the name of transformation (Gaventa and Cornwall 2008: 180) are conservative and liberal models of multiculturalism. These conceptions disavow critical understandings of structural power, which Santos (2016) describes as "new forms of cultural imperialism", and hooks (1996) summarises as a:

"comforting "melting pot" idea of cultural diversity, the rainbow coalition where we would all be grouped together in our difference, but everyone wearing the same have-a-nice-day smile. This was the stuff of colonizing fantasy, a perversion of the progressive vision of cultural diversity."

Further to this, early forms of popular education and action research have been challenged for lacking critical analysis of the complex relations of oppressions between colonialism, racism and gender (Lykes and Mallona 2008). This is seen of Freire's work with a blanket term of "the oppressed", which has been constructively critiqued for subsuming, "women into his male assumptions about oppression from a class perspective" (Ledwith 2015: 91) and generating essentialised discourses of "the poor" and "women" (Cooke and Kathari 2001, Maguire 2001). Critical feminist pedagogies that acknowledge people's different experiences in relation to race, class, gender, sexuality, for instance, considering structural oppression (Weiler 1994) has evolved AR to engage with more complex understandings such as that outlined in "intersectionality" (Collins and Bilge 2016) which focuses on the intersection of gender and racial oppressions within a "matrix of domination". Freire's pedagogical work has also received critical feedback from scholars in the suggestion that it was tailored towards a selection of "liberated pedagogues" to develop education initiatives working with oppressed peoples, thus securing dependency on the role of external change agent and curbing autonomous transformations (Esteva et al. 2005).

These critiques of participatory modes of research highlight the importance of making visible, acknowledging and engaging with power dynamics in order that they can be collectively navigated (Levkoe et al. 2018a, Kesby 2005) towards transformative social relations and knowledges. hooks (1996: 131) highlights the transformative potential of dialogue in learning practices when educators of different kinds begin to "cross boundaries" that, "may or may not be erected by race, gender, class, professional standing, and a host of other differences." In terms of where dialogues across different positionalities may be dynamic, Santos (2016: 212) points to social movements as, "contact zones … in which different cultural life worlds *meet, mediate, negotiate and clash* [emphasis added]" engendering *reciprocity* in cross-cultural sharing of knowledges and practices, "with the purpose of strengthening the struggles against capitalism, colonialism, and patriarchy." This idea that collaboration includes conflict which cannot always be easily resolved (Isenberg et al. 2004), relates to aforementioned approaches to (deep) food democracy where, "politics is the arena in which we deal with disagreements over values. Such conflict is not something to shy away from;

conflict leads to change" (Hassanein's 2003: 79). In orientating the enquiry into urban agroecology through action research the vitality of dialogue on power in participatory research echoes the earlier identification of *diálogo de saberes* (DDS) as critically important in the development of agroecology in working towards social justice (in section 2.2). Considering this, this thesis aimed to generate dialogic spaces with the view that dialogue holds potential to be an active place where knowledge, culture and identities become 'verbs' (Bhabha 1994) and maintains peoples', "right to be different because they are equals" (Mignolo 2000: 311).

In terms of "steering [agroecology] from within" (Anderson et al. 2019) towards its political roots in a Western European context, Anderson et al. (2018) include DDS as a key feature of a 'transformative agroecological learning framework' (aforementioned in section 2.2.1). The framework developed through action research with European agroecology practitioners (see Figure 14) is rooted in four pillars of: *diálogo de saberes*; horizontal learning; combining the political with the practical; and building and strengthening networks (orange), which supports and connects with the elements of the political project of food sovereignty (yellow) (Anderson et al. 2018). This critical pedagogy approach mirrors action research epistemologies.

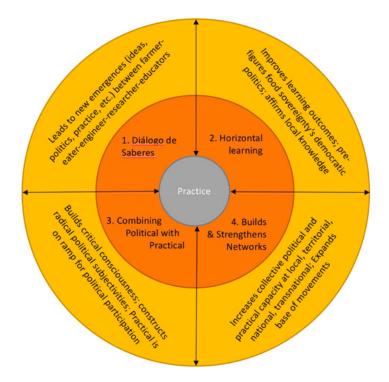


Figure 14: A framework for transformative agroecology learning in Europe (Anderson et al. 2018)

One reflection on the framework is to suggest that the *political* yellow section includes political agroecology, rather than becoming purely the realm of food sovereignty and divorcing the political from agroecology. I suggest this in the spirit of conceiving and connecting the *practical with the political* – rather than *doing* the practical learning of agroecology and/or the politics of food

sovereignty – as *agroecology is a political project* (see section 2.1). The WLHC enquiry and research objective 3 (see section 4.1) particularly speak to the evolution of the transformative agroecological learning framework and steering from within through an experiment in participatory governance (Anderson et al. 2019) by co-producing food policy at a food hub with praxis engaging the four pillars. With engagement of a wide diversity of actors in democratic learning spaces (Anderson et al. 2018) this thesis builds on a transformative agroecological learning framework with adaption in the territory of London. The learning tools and details of this process is outlined in section 4.5 and discussed in chapter 5.

With action research being "unpredictable, exploratory and relational" in nature, as a non-linear form of enquiry (Kindon et al. 2007), and at times, "a messy, difficult and partial, yet exciting and entirely necessary, process of transformation" (Anderson and McLachlan 2016), I now turn to considerations of validity, positionality and ethics concerning the praxis, so as to evaluate this thesis' methodology.

4.3 Validity, positionality and ethics

As with qualitative methodologies, the use of different techniques in AR can strengthen validity as findings are overlaid in analysis (Hemming 2008), and the combination of separate methods enhances rigour for the whole study (Herr and Anderson 2005). In its challenge to rational universality of positivism, and ultimately as a different paradigm, AR demands different values in evaluating knowledge validity and scope (objectivity in the case of positivism). Measures of validity and quality in action research also emphasise the co-operative character of collaborative relationships in understanding significance and ambition of the study (Reason and Bradbury 2008). This approach evaluates 'truth' as a concern of internal consensus and "dialogical argumentation", rather than external authentication (Moser 1980), pushing for a research cultural shift from "validity as policing toward 'incitement to dialogue" (Lather 2001). This connects to understandings of validity as catalytic, which centres the action research principles of participation and ownership whereby all parties are involved in all stages of an enquiry and develop critical consciousness, thus building democratic validity (Lorenzetti and Walsh 2014, Herr and Anderson 2005). This conception of democratic validity is particularly relevant in generating deep food democracy.

Having personally had mixed experiences with researchers over the years working with groups I was involved in, where on occasion time and information were taken with promises of sharing research content falling fallow, I strongly felt it important that the research benefitted the organisations it was set within if there was capacity and interest for this (Tax 1975). This meant within a PhD timetable and evolution of key research aims and questions, that I maintained a flexible approach that prioritised social equity and reciprocation (Sbicca 2015). This practical step

of member-checking (Lincoln and Guba 1985) and openness to the direction of the research meant that there was catalytic validity, particularly in the early and middle stages of the research. Participatory analysis of the content generated occurred to varying degrees, with integrating analysis into methods and co-presenting at an academic conference, for example (detailed in sections 4.5 and 4.6). Despite these efforts, the latter more heavily analytical stages of the enquiry were comparatively lighter in democratic quality, and hence validity. The time required to write up the research into this document is a barrier to catalytic validity, and something I reflect on further as part of recommendations in chapter 7 as to how to shift the solo nature of the PhD framework to encompass action research sensibilities. Due to the relational nature of catalytic validity in building knowledge constructions, research ethics have a strong role to play in this.

Whilst the PhD process followed Coventry University ethical guidelines and peer-reviewed approval process, the nature of action research working towards social justice meant there were further ethical values I tried to anchor in the work, prioritising relationships to evolve trust and care. With multi-dimensional power relations linked to disparities subjectivities (Badwall 2016), I tried to work towards an 'ethic of care' in how relations developed in the enquiries (Denzin 2003: 122), with guiding principles of attentiveness, responsibility, competence, responsiveness and solidarity (Brannelly 2016: 5). Interestingly, through the WLHC process core principles emerged in regard to the food policy that linked to an 'ethic of care', such as respect for people's knowledges and experiences (see Chapter 5) - a basic value underlying AR (Brydon-Miller et al. 2003: 15). In reflection on disproportional power embedded in processes of representation and on how everyday experiences are shaped into knowledge (Katz 1994), I have tried to share diverging expressions of experiences in the thesis without manipulation from transcripts, refer to co-writing with colleagues and organisational documents, and for colleagues to write descriptions to identify their own representations. One key ethical consideration is that the analytical themes and experiences inside the organisations brought to light in this thesis were consented to by my organisational colleagues, so that there was opportunity to act on them before being published as 'oppositionally new' in academic discourses (Bradley and Herrera 2016: 103). This has meant that drafts of the thesis have been shared for feedback, for instance. One technique for deepening awareness of power in relation to knowledge production is reflexivity on the part of a researcher.

4.3.1 Reflexivity and insider positionality

Reflexivity is an ongoing process of critical introspection of the self that aids researchers to comprehend their role in a learning project and vice versa (Lipp 2007, Bauder and Sharpe 2000). Reflexivity is an essential element of any researcher role (Liamputtong 2008), particularly when arguing that all research and knowledge is 'situated' and requires engagement from researchers with where, how and why they are positioned in a study project (Frankenberg 2004). In this sense

researchers have *responsibility* in exploring their own subjectivity and clarity in their values and power (Grant et al. 2008). Positionality as understood with reflexivity is, "one's position in the organisational or social hierarchy and one's position of power vis-à-vis other stakeholders inside and outside the setting" (Herr and Anderson 2005: 41). Bettez (2014) expands on Puar's writing (2007) in applying "assemblage" to describe a compilation of subject-positions framing fractional and continually becoming positionalities; asserting that self-inquiry into these can lessen potential inclinations to essentialise ourselves and other people in relation to oppressive structures. In warning to overly relying on reflexivity, Rose (1997) argues that in geographers assuming validity through reflexivity, they resort to new forms of 'god-trick' (Haraway 1991) in smudged objective knowledge claims. Rather, in acknowledging Bettez's (2014) assemblages of positions that are constituted in inter-relations and power hierarchies this finds the researcher 'dancing' but mostly 'stumbling' *between* roles (Holtom 2015) in shifting power, perspectives and positionalities.

Herr and Anderson (2005) write that a "continuum of positionality" of insider/outsider is useful to evaluate relations between research participants/community members and the action researcher who is arriving at communities and/or organisations. As I am part of the organisations in which the knowledge processes occur, this would assume an insider perspective; certainly the research speaks to this position, through my having pre-existing experience of the setting, being committed to the wellbeing and flourishing of the organisations, and having existing relationships with my colleagues. This positionality and associated perspectives and power would be different for a researcher who was not involved in running the organisations to approach members to be part of a research project. Certainly, one consideration would be trust, although not assumed with colleagues because I am an organisational insider, but certainly something I would suggest had a factor as I have known many of them for years and consider them friends as well as people I work with. In this sense, with reference to Pulido (2008: 342) description of the commitment on the part of academics to "talkplus-walk" in researchers' developing mutualism with the community members, I was already walking to the extent that I was embedded in the work of the organisations before the PhD. This does not mean, however, that I could kick back rest on my laurels and assume the research was in interest to my peers as I was one of them, thus homogenising the inside, rather this dynamic threw up new considerations for reflection as my identity and role shifted in relationship with the academy and ultimately a personal qualification.

In regard to a constant tension between my role as a practitioner (activist) and as a PhD researcher (Pulido 2008) my feelings of outsider in academic settings softened through the four years, with early stumblings to understand academic journals, whilst I was also aware that the time, funding and support the PhD offered was in part *outside* the organisations and spaces of which the research and my usual life was situated. I certainly agree that being an insider is not a fixed state of being as

subjectivities relocate and are fluid and move with the development of the study (West et al. 2013, Griffith 1998). This is reflected in that:

"action research dissertations are often done by organisational insiders who see it as a way to deepen their own reflection on practice toward problem solving ... in such cases, the *researcher and the practitioner may be one and the same* [emphasis added]" (Herr and Anderson 2005).

In the action-reflection cycles concerning LGWC, as a co-operative member my positionality is focused on "insider in collaboration with other insiders" as the study aims to reflect on mine and colleagues' experiences as worker-owners setting up a new agroecological enterprise (objectives 1 and 2). Through the research process's cycles at WLHC my positionality moved from "insider in collaboration with other insiders", in primarily working with colleagues at the centre, and also "insiders in collaboration with outsiders" as members of the public new to the centre were involved in popular education exercises that I facilitated as part of an insider team (objective 3).

This perspective of 'insider' is especially from an organisational sense, and as a participant in broader food movements, in considering insider research as, "that which is conducted within a social group, organization or culture of which the researcher is also a member" (Greene 2014: 1). The continuum of insider-outsider becomes more complex in considerations of who is the 'local community' around the sites where the organisations are based. For instance, members of the local community who participated in the workshops around WLHC may not be have been involved in the weekly organisational activities of the site, and in this sense are 'outsiders', whilst 'insiders' to the local area. In terms of objective 3, and developing a *people's* food policy at WLHC, the aim was to make space where divides of insider-outsider were shifted, as trust, care and respect were built in new relationships through designing the food policy. Although I had lived in London most of my life and had previously worked in the area around the two sites (PG and WLHC), I was a comparative outsider as I had moved to live in the area relatively recently in 2016; this shifted as I built relations and got to know the area better.

Overall, compared to more traditional AR approaches, where external change agents engage insiders in collective enquiries (Herr and Anderson 2005), this thesis is born from tacit knowledge of a setting from the perspective of an organisational insider with a desire for the research, "to make a contribution to their own setting ... and bring about organisational change" (Herr and Anderson 2005 referencing Anderson and Jones 2000). This is highlighted for instance with my knowledge of the WLHC management consortium wanting to develop a food policy by being part of the group, and with my participation in the setting up of London Grown Workers' Co-operative.

Benefits to insider research include; being close to the 'sticky materiality' of everyday interactions in which global neoliberalism is constructed (Tsing 2005), ability to engage with avenues of enquiry which are inaccessible to outsider researchers based on tacit knowledge (Oliver 2010), and

achieving greater depth in learnings as participants can be more frank thanks to their feelings of shared experience (Corbin Dwyer and Buckle 2009). Existing relationships between an insider researcher and participants build personal knowledge for understanding, "the cognitive, emotional, and/or psychological precepts of participants" in a way that outsider researchers may not understand (Chavez 2008: 481). And Rooney (2005) asserts that these elements of insider research enhance validity of study. With previous studies on food democracy light on insider research particularly in the UK, and the need for empirical research to evolve urban agroecology (as highlighted in chapter 2) the insider perspective this thesis offers supports new knowledge generation.

The closeness of *insiderness*, however, has led to warnings of knowledge distortion (Sprague 2005) and becoming entangled in the partial and changeable nature of insiderness (O' Connor 2004). This insider captivation can mean insider researchers discount perspectives and features of a situation because of their intimacy and familiarity (Oliver 2010), which an outsider observer may perceive more clearly. In response to this, alongside the aforementioned steps to build democratic validity in the study to integrate heterogenous perspectives in the shaping and content of the research, I have engaged with critical friends and the supervisor team to discuss problem-solving and get feedback on research decisions from more external parties.

Further to considerations of insider-outsider is my social positionality. In a draft article with coresearchers of the WLHC enquiry we shared and later discussed short descriptions of who we were as individuals coming to the research. In this I wrote: "Rob is a white, cis-male, gardener, 'plastic paddy', Saturday footballer, PhD student, community practitioner, born in Croydon, South London into working-class and middle-class family backgrounds. He has worked and volunteered in social justice movements, creative youth programmes, and community-based projects for over 15 years. A resident in North-East London for three years and has worked in the area for seven years" (Field, Woods and Logan 2019, personal communication). I have had material opportunities that I would associate as middle-class (i.e. some financial support to complete a degree) and through the years have reflected on connections of class identities in relation to roles in manual, service and journalistic work, housing status, family background with different values, codes and cultures and how these are passed on generationally. I recognise as important the different lessons and experiences around class and ethnicity from growing up close with Irish diaspora family. With increasingly complex considerations of class around labour, income and cost of living generating multiple class identities for people (Dorling 2014), I reflect that these tensions in my own identities and values I can find motivating as to engage, listen, learn, reflect, participate and take action towards just and equitable social dynamics.

As the power structure underlying social order can be seen as, "imperialist white supremacist

101

capitalist patriarchy' (hooks 1994), the inequitable social constructions of race and gender for example enable me with unearnt advantage (Diangelo 2019). So, in working in community and agroecology spaces that face inequitable distribution of resources and raise questions of neoliberalism's inequity and exploitation around land and food, I acknowledge within this I have blind spots in experience and how oppression manifests. In finding ways to engage with this I feel that Scrap (as cited in hooks 1994) highlights a beginning of reflexivity – with 'classroom' applicable to different social situations – when he says, "as a white university teacher in his thirties, I'm profoundly aware of my presence in the classroom as well, given the history of the male body, and of the male teacher. I need to be sensitive to and critical of my presence in the history that has led me there."

In this sense I am motivated in forming mutually supportive, caring and solidaristic relations, and through this action research PhD have engaged in different approaches, considering catalytic validity, ethics, and reflexivity, aiming to:

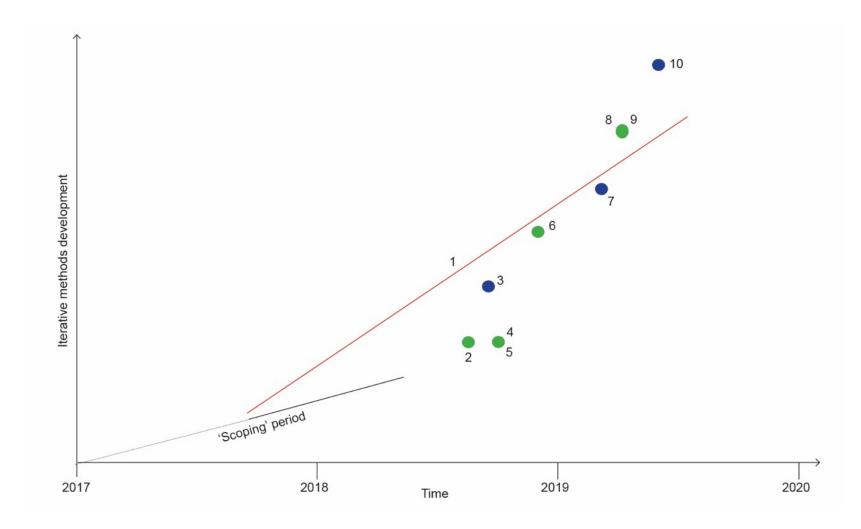
- Acknowledge and reflect when *I do not know* and consciously try to practice listening with 'raw openness' (Keating 2007) as a key feature of PAR
- Reflect, be in touch with, and share personal experiences developed through the PhD and previous years when relevant in co-learning processes
- Collaborate on the direction of the research through the process
- Design with capacity of colleagues
- Direct use of resources (time, money, materials) transparently with groups
- Discuss ways that the research is communicated and work in collaboration if capacity to create these
- Engage in equitable distribution of different forms of labour
- Share all research content with colleagues i.e. interview transcripts, photographs, wordles
- Write up the enquiries in this thesis to reflect the divergent perspectives expressed with full quotes and that drafts are shared for feedback with co-enquirers

Finally, with the complexities of positionality, power and knowledge, Light et al. (2011), I feel, offer some good advice, when suggesting, "get involved, be flexible, make friends, stay honest, choose sides (selectively), muck in and deliver." Having outlined the research approach in sections 4.1-4.3 I now give more detail on how the dual enquiry developed and why different methods and analysis were chosen.

4.4 Overview of research activities and data collection

A combination of eight different participatory and qualitative methods were used (see Figure 15 and Table 1 overleaf) across the two enquiries. Through the research period I engaged with 67 people, in different kinds of interactions from participating in a community mapping exercise at a public market, to reflecting on photographs taken by participants on food themes, to taking more of a co-researcher role in designing and facilitating workshops. These roles and relationships are clarified in the next sections. A 'scoping period' was completed between August 2017 and May 2018 when I reflected on developments in the organisations as to potential action research and discussed opportunities and suitable processes with colleagues. This included meeting up with colleagues outside work time to talk through options and dynamics related to insider PhD research.

I include myself as a participant in Table 1, as a member of the organisation and since I contributed to discussions and method inputs. The methods include, for example, three focus group sessions integrating creative popular education techniques, three two-hour analytical interviews with LGWC co-op members, and analysis of 70 LGWC organisational documents. At WLHC the methods of the cookery workshop, graphic harvest and photovoice were integrated into focus groups that functioned as 'workshops' to develop collective food principles for the community food hub. I have included these as separate methods to a 'focus group', since they reflect the intention behind the process to facilitate space that engaged with people's different ways of knowing and learning, were designed with participants' input, and were creative processes in their own right.

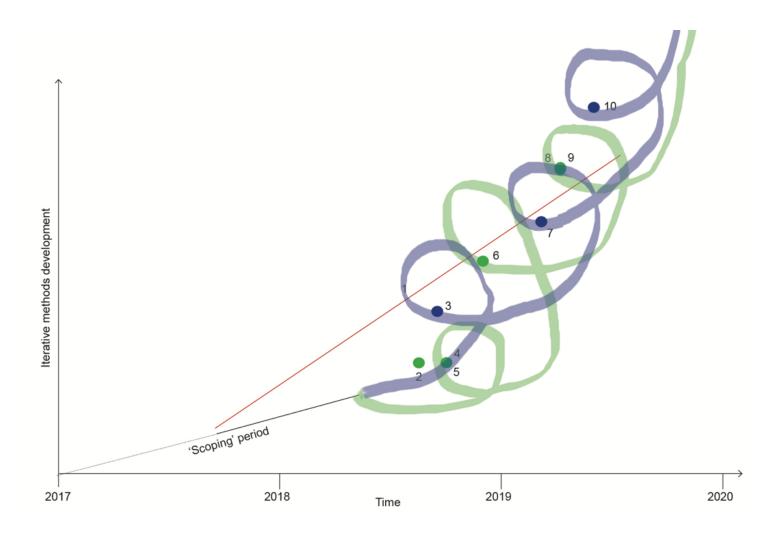


Key: Green = WLHC, Blue = LGWC, Red = both WLHC and LGWC

Figure 15: Map of iteratively developed methods through the research period

No.	Dates	Research Process	Method	Materials for analysis	No. of participants
1	August 2017 – May 2019	WLHC and LGWC	(Auto) ethnography	71 journal entries	1 (myself)
2	August 2018 – October 2018	WLHC	Photovoice	Over 100 photographs, photograph maps	12+
3	September 2018	LGWC	Mobile Focus group	Notes, photographs	4
4	October 2018	WLHC	Focus group	Audio recordings, graphic harvest, notes	15
5	October 2018	WLHC	Graphic Harvest	Graphic harvest	1 (artist)
6	December 2018	WLHC	Community map	Community map, flipchart thought showers	23
7	February-April 2019	LGWC	Document analysis	76 documents	1 (myself)
8	April 2019	WLHC	Cookery workshop	Photographs, audio recording, food	21
9	April 2019	WLHC	Focus group	Photographs, audio recording, notes	21
10	April 2019 – May 2019	LGWC	(Analytic) Interviews	Audio recordings	4

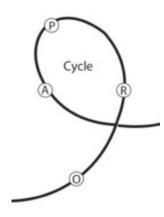
Table 1: Timeline of methods to expand on Figure 15



Key: Green = WLHC action-reflection cycles, Blue = LGWC action-reflection cycles

Figure 16: Dual iterative enquiry with overlapping action-reflection cycles

Figure 16 (above) highlights three key action-reflection cycles in each research process that are orientated around key methods events/actions after periods of observation, reflection and planning (see Figure 17 below) i.e. the first action-reflection cycle in the WLHC policy enquiry involves the photovoice exercise that was integrated into a focus group workshop. At this workshop we discussed as a group what could come next in the process; the cookery workshop had a lot of support, along with sharing the photographs at the December festive market at hub. And so the next action cycles spin off from this first workshop, with increased, "knowledge and capacity for action as questions are identified, addressed and resolved" (Anderson 2013: X).



Key: O = Observation; R= Reflection; P = Planning; A = Action

Figure 17: Close-up of action-reflection cycle within an action research project (Source: Anderson 2013) I wanted to highlight these three key movements in the research in cyclic form because this was the period of high activity, with the action in the research beginning to spiral from the scoping period. I was trying to make sharp-looking cycles but found that to reflect the messy realities of action research a hand drawn cycle would be more fitting. The method of keeping a reflective journal runs through the two enquiries, with its linear straightness more representing its continual presence as a place to go back to rather than structured regularity.

Another intention with Figure 16 is to observe how although the two processes were separate and focus weighted on different sub-questions within the research, they were also interwoven in how they iteratively developed. In terms of what knowledge is generated in relation to analysis of findings, the interconnected processes through places and people have had symbiotic relations, as a cycle of one process may influence, support and inform the other and vice versa. This process entailed observing the emergent analytic themes within each enquiry together, as part of a whole study, and experimenting with connecting sub-learnings towards generating symbiotic learnings that loop with principal literature and research objectives i.e. a key quote from WLHC Workshop 3 can inform a point of co-analysis in a LGWC interview on a question that was prompted by an

observation in the document analysis process. Essentially, I challenged myself to deepen the analysis in asking, *where is there strong correlation around particular themes across the two enquiries?* and, in keeping with the goal of deep listening, *where are the learnings that might not be shouting and in a quieter space within the enquiries that speak to the overarching thesis?* This overall analysis happened consciously and unconsciously through the PhD period, with the reflective journal a key space in noting connections between theory and practice. A more concerted process of analysis across the two enquiries occurred once both enquiries had come to an end after June 2016. I completed this cross-analytical stage of the enquiry on my own, with feedback from colleagues, in writing up this thesis being a hallmark of PhD education (Levin 2008) and a key output for the PhD programme. I outline further the analytical processes within each enquiry in sections 4.5 and 4.6.

As a method underlying both research enquiries, I describe auto-ethnography here, as well as the focus group before going into more detail in how and why particular methods developed in the LGWC inquiry and the WLHC inquiry.

3.2.1 (Auto) ethnography

Acosta et al. (2015) suggest that auto-ethnography is an effective research technique for practitioner-based 'insiders' engaging with an action research approach, since the method supports the research of action that brings change and develops understanding and theoretical connections. Auto-ethnography engaging in an analytic approach is defined as being carried out by researchers who are members of the research setting/group (Acosta et al. 2015). Auto-ethnography enabled me to reflect on my own practice as a 'reflective practitioner' (Bochner and Ellis 2002), in an effort to 'learn to learn' so as to improve or have a more holistic, connected practice (Schön 1983). My own motivations for the research can be recognised, such as my desire to have agency in my workplace, with experiences of bullying bosses and gardening companies paying me two-thirds of what they charge clients for my time; and so involved myself in setting up a workers' co-operative.

The diary underlying both the LGWC and WLHC enquiries included 41 digital entries and 35 written entries, from August 2017 to May 2019 (26 months). This journal outlined reflections on my experiences of daily involvement in the organisations and learnings through the process, emerging key issues, relationship between theory and practice, and contextualising AR within a PhD setting for example. The diary journaling was unstructured as I did not have a routine per se; I would write when I felt moved to or had felt something important had happened. This journal process was paired with reading academic journals and grey literature, attending meetings, trainings and workshops on relevant issues, which correlated in building on my understandings of action research, agroecology and associated discourses. Journal entries developed as the most appropriate method for finding a way to document learnings and reflections in trying to work and record data

at the same time (Anderson et al. 1994).

In my involvement in the organisations I took on a "participant-as-observer" role, in forming relationships and participating in activities with openness so that I was attentive to happenings for research purposes (Burgess 1984). The ethnographic diary gave me a structure to observe and reflect on first-hand day-to-day experiences in the settings, and talk with colleagues about their feelings and interpretations (Cassell and Symon 1994). With practitioner reflections and also *participant-as-observer* notes the journal is mixed in its ethnographic approach, hence the brackets in (auto)ethnography. Participant observation can, "retain a strong notion of the author as expert" (Foley and Vlaenzuela 2005: 219), as the lead researcher sets the research agenda, collects data, and writes up analysis based on their experiences linking praxis to theory. The use of a qualitative method of document analysis in the LGWC enquiry complements the ethnography, as there is clear documentation of individuals' and the collective's voice(s) alongside my first-person voice drawing on different perspectives. Using multiple methods in this way can enable a more complex picture of organisational life to be developed considering the strengths and weakness of different techniques.

3.2.2 Focus Groups

Both enquiries use the method of focus groups in different ways as part of collective processes with participatory and creative elements; at WLHC in working towards a food policy for the centre, and with LGWC as a tool to make space for reflecting and evaluating on the previous work we had done together in thinking about the future. This flexibility in how I employed focus groups highlights how the method is, "adaptable to a range of research approaches and designs" (Parker and Tritter 2006). (Bloor et al. 2001) Bloor et al. (2001) describe focus groups as:

"a type of group interview where, amidst a relatively informal atmosphere, people are encouraged to discuss specific topics in order that underlying issues (norms, beliefs, values), common to the lives of all participants, might be uncovered."

A key difference in describing the focus groups in this research, and especially in the case of WLHC, is that the sessions were working towards commonalities for *future action* as well as making space for exchange and listening of people's perspectives on particular subjects. We called the focus group sessions 'workshops', not focus groups, as this is a more common label in my experience in social movement or community-based organising. The facilitated discussions enabled myself and colleagues/participants to reflect on the meanings that began to emerge through group intercommunication (Bryman 2008) which was intentionally created as material and related questions were brought back into the space from previous sessions in both enquiries.

Focus groups have been described as helpful in policy related research, as is the case with WLHC in generating a food policy, because large amounts of qualitative data are produced in short periods of

time (Parker and Tritter 2006). Focus groups have been shown to support research on sensitive concerns (Hoppe et al. 1994) generating new ideas through deeper and complex interactions (Arksey and Knight 1999). The choice of method also fits with popular education aims, as it can support empowerment and education for those involved (Bowie et al. 1995).

Data produced from focus groups, however, is on a level of the group as a whole and also at the individual level, meaning that it can be hard to decipher which is which(Hyden and Bulow 2003), especially in cases where there are dominant voices within the group. In the case of WLHC this meant documenting the work of smaller group discussions within the larger group through notes and vocal feedbacks and facilitating the sessions in a way that encouraged diverging opinions if they were there and felt like an appropriate facilitation decision. In terms of the people that attend the focus groups as representative of a particular community, Krueger (1994) notes that recruitment can fall into a matter of 'convenience' sampling if this is mainly led by people who are non-researchers and results in people attending being relatively unknown to the research team. With the focus group in the LGWC enquiry, recruitment was focused on co-op members as a space to reflect on internal working dynamics and project goals, while publicity and research methods were focused at different layers of community in and around the centre in the WLHC processes (as outlined in more detail in 3.4). In the next section I focus in on the methods development in the WLHC policy-making process.

4.5 Wolves Lane Centre methods and analysis development

During the scoping period of the thesis I was involved in the development of WLHC as a community food hub with the consortium including; running a weekly gardening programme, discussing operational matters, producing natural foods, setting up community market days, and clearing and organising the site post-council handover. Discussions in the consortium management group during the scoping period pointed to the need for a 'food policy', with guidelines for what kinds of foods were to be grown, cooked, and sold at the centre. This would be a practical document to be shared with all users at the centre and manifest underlying food values on what 'good food' is as linked to production processes, meat consumption, and environmental considerations, for example. Conversations around creating a food policy surfaced different ethical and cultural values as linked to *how* a food policy might be generated at a community food hub – if this would include people outside of the management consortium – with questions arising around *to eat meat or no meat? local food or transnational food?* and how decisions around a food policy connected with class differentials and poverty were experienced locally.

In discussions with Deirdre and Yvonne (introduced in Chapter 3) we wanted to ensure that the values which informed a WLHC food policy did not replicate unjust social power dynamics, and to

consider and reflect the borough's diversity of people, food cultures and experiences. In our discussions we reflected on what the twinning of 'local food' with 'ecological' meant in a global city like London with socially and culturally diverse boroughs such as Haringey, and which food cultures were *de facto* defined as local? I understand that between us the sense was that this questioning of how ecological approaches and social justice could meet, through food intentions and principles at WLHC, was best answered with people in and around the centre as to collectively move towards understanding of what 'local food' meant in our context. With agreement in the consortium we set about developing a proposal for a participatory process and can be seen as the birth of the process and the initiating of a facilitation team for the enquiry, consisting of myself, Yvonne and Deirdre.

In thinking about what sessions might be like and an overall approach we (the facilitation team) agreed to aim for the process to be:

"creative, participatory, emergent, iterative, practical, and enable personal development with new knowledge and skills" (Field, Logan and Woods 2018, personal communication).

Whilst developing the proposal we spoke with volunteers and organisation workers at the centre to see what they felt about a workshop series exploring food at the WLHC, and what methods might be fun and desirable. Through these informal check-ins there were suggestions that using photography would be an engaging way to begin the process. We committed to reviewing decisions in design as it unfolded and discussing this with participants; drawing on tools and methods from our different experiences and bringing together varied skill sets, knowledges, and educational motivations. Through the development of a project proposal and the enquiry itself, values of community development kept cropping up: namely, "equality, social justice, collective action and empowerment" (Asenjo Palma 2019: 277), and an intention that the process contribute to a democratic, empowering and equitable culture at the community food hub. In this sense the policy process is an emergent piece of unfinished work relating to a longer journey towards developing transformative cultures and systems at the WLHC.

The facilitation team also drew on participatory action research (PAR) and popular education approaches through the process, such as in the use of community mapping, with correlating values with community development: namely, pedagogy as method (Walsh 2015: 15), agency of the individual, and communities aiming at understanding and changing social structures as connected to their own immediate situations (Emejulu 2016). Thus, I suggest that the food policy process, based on core working values, iteratively drew from a triad of praxes (see Figure 18) which share common philosophical underpinnings and creative tools enabling the process to manoeuvre between these drawing inspiration and frameworks for action, learning and reflection.

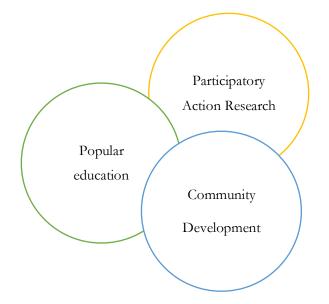


Figure 18: The triad of praxes the WLHC food policy process were inspired by and drew on in its iterative development

Symbiotic elements of these pedagogies supported the facilitation team's efforts to make space for democratic dialogue as part of a process of, "forming, testing and improving knowledge" (Hale 2008: 13). The methodological values and iterative approach reflected our intention to reflexively engage with power; its machinations within, through and externally influencing the process. This is reflected in the name of the enquiry, *Conversations from Seed to Plate and Beyond!* – the 'Beyond!' recognising critical questions linking power and justice with space, food and social systems, and *how* the evolution of a food policy at WLHC might speak to these in transformative ways. Through the thesis I refer to the policy process as the *Conversations*.

During the proposal-making process we agreed to facilitate three workshops together, the first one focused on using the photovoice method to open up discussions of underlying food values, the second one using a community mapping exercise to be discussed with people at the first workshop, and the third left empty to be decided with participants. The strongest agreement for the third and final workshop was to do a community cookery session together, and so through the *Conversations* multiple qualitative and participatory methods were used that were iteratively developed and recognised people's different *ways of knowing*. The overarching development of methods and analysis with research outputs is presented in Table 2 (overleaf). As we committed to three workshops over a six-month period the facilitation team discussed aiming to generate common food values in the first instance and see how this developed in the process towards a policy per se – thus enabling further development of policy development in follow up workshops beyond our remit.

Publicity for the first workshop (October 2018), which was run on a weekly volunteering Tuesday,

was primarily focused towards consortium members, existing volunteers, and organisational workers at the centre, and posters were placed around the centre for visiting members of the public. The second workshop (December 2018) was planned for the 'Wolves Lane Festive Market' which was a public event with markets at the centre usually attracting between 100 and 300 visitors. The third workshop (April 2019) included many participants from Workshop 1, and some local residents who wanted to find out more about the community food hub, having found out about the process at the festive market and wider online publicity. This meant that participation through the process increased in numbers, and also enabled more relationships to be formed as existing WLHC members worked with people wishing to become more involved in the centre's activities. Workshops 1 and 3 were both 2 hours long, and Workshop 2 on the stall at the festive market was 4 hours long.

As key instigators of the Conversations the facilitation team of myself, Deirdre and Yvonne held positions of power in the process. We had been privy to the need and discussions for a food policy as members of the consortium which managed WLHC. These management roles were unpaid at the time, as was most of the work across the site during the development of a culture of different people coming together and 'getting their hands dirty', with minimal resources, passion for the centre, and excitement at the possibility of what could be post-council management. This meant that members of the facilitation team were also volunteers at the centre, having taken on a host of roles such as cook, gardener, cleaner, market stall holder or fundraiser. Further to these complexities of roles we also participated in the methods such as photovoice and the community mapping as members of the centre and recognising our motivations, voices and stories as part of the unfolding community. Therefore, as volunteers, consortium members, facilitators and participants, the facilitation team's positionalities shifted through the process as we aimed to bridge a key decision from the management consortium into the centre so that a *people's* food policy could be at the heart of the food hub. I note here that in forming the facilitation group and developing a proposal we did not develop the facilitation team with anyone outside the consortium management team- and explore this further in reflections on food democracy in Chapter 5. Finally, I made two funding applications for resources for the Conversations which were rejected, and so materials and contribution for Deirdre's and Yvonne's time came from my PhD budget, with open discussion about the dynamics of the connection between the process and my PhD programme.

Phase	Scoping exercise	Workshop 1	Workshop 2	Workshop 3	Article writing	Presentation
Time Period	August 2017- May 2018	September – October 2018	December 2018	April 2019	May 2019 – June 2020	August 2019
Methods		Photovoice Focus group (FG) Graphic Harvest	Community mapping	Community cooking Focus group		
Research Output	Project proposal	Graphic harvest FG audio Participant notes FG photographs Photovoice photographs 'Wordle'	Community map Participant notes Photographs	Food FG audio Participant notes FG photographs Poster of process 'Worlde'	Draft article	Visual and verbal presentation
Analysis phase	Generated aims, values and WK 1 method for process in context to emerging enquiry	Prepared methods for Wk 2 based on Wk 1	Prepared methods and food value 'clusters' for Wk3 based on Wk1 and Wk2	Edited principles from Wk 3 for poster	Analysis of power in 'food', 'participation', 'space'	Reflections on key learnings in relation to 'emancipatory politics' and 'transformative governance'

Key: Wk = Workshop

Table 2: Outline of iterative methods, analysis development and research outputs in WLHC enquiry

4.5.1 Photovoice and Workshop 1

Photography was an activity that people at the centre were already engaging in: taking photographs and sharing them with each other, thus effectively documenting the evolution of the community food hub. Photovoice was a fitting method to open up the *Conversations* as uses:

> "ethnographic techniques that combine photography, critical dialogue, and experiential knowledge, [so] participants reflect on and communicate their community's concerns to represent their culture, to expose social problems, and to ignite social change" (Sutton-Brown 2014).

The method also aims to traverse linguistic barriers to participation (Krieg and Roberts 2010) and supports visual learning which met the facilitation team's values of 'creative' and 'practical'. Furthermore, photovoice aims to promote critical dialogue and to enable community improvement through policy-making that engenders social change (Wang and Burris 1997). Photovoice can, however, produce an authoritarian research model if conducted in a controlled way as directed by researchers (Sutton-Brown 2014).

Five cameras were distributed to WLHC volunteers in September 2018 and people were asked to take photographs, and pass on, with the questions:

What activities would you like to see and contribute to around food at Wolves Lane?

What foods do your family and friends eat or may have eaten in the UK and countries of origin?

People were also invited to share previously taken photographs and digital versions. In distributing the cameras, a one-page summary of the process and the workshop timetable was shared with volunteers and organisational workers (see Figure 19 below), displayed at the centre and emailed to the 'WLHC e-list' of people who had signed up to hear WLHC news. As the facilitation team wrote the questions for the enquiry, albeit with member-checking and as members ourselves (organisational insiders), this limited the ability of all participants to self-identify needs and inclinations in *all phases of the process if possible* (Booth and Booth 2003).

Do you want to create the shared food values and intentions at the Wolves Lane centre?









LONDON GROWN

ORKERS CO-O

What kinds of foods do you want to

grow, cook, eat?

STEP 1

To keep the conversation going in developing values and intentions around food at Wolves Lane cameras will be distributed on **Tuesday 18th September 2018** for people to take pictures reflecting on:

What activities would you like to see and contribute to around food at Wolves Lane? Eg growing, cooking, eating, food choices

What foods your family and friends eat or may have eaten in the UK and countries of origin?

*You could also take pictures on your own camera/phone

STEP 2

Take pictures!

STEP 3

Cameras + digital photos will be collected by Tuesday 9th October volunteer session to be printed for a discussion with illustration and mapping about the photographs on Tuesday 16th October, 2-3pm (after lunch): to support shaping activities at the centre and planning what we might do next with these ideas

The mapping will continue at the Festive Market December 9th 2018

Content removed on data protection grounds

Figure 19: Flyer advertising the first WLHC workshop using a photovoice method

Over 100 photographs were submitted and printed for the workshop in mid-October 2018, which suggests that the method had inspired and engaged some people (see Figure 20 below for sample photographs). With participants sharing cameras we cannot know exactly how many people participated, but our enquiries suggested that there were at least 12, including those who had submitted digitally; 15 people then attended the workshop to reflect on the photographs together.



Figure 20: Photographs submitted as part of photovoice exercise in prior to WLHC Workshop 1

The workshop began with people, who had participated in the photography, sharing their experiences of the process, before introducing an exercise of participants each choosing three photographs 'that spoke to them' and discussing the photographs generally with each other as they did so (see Figure 21).

Content removed on data protection grounds

Figure 21: Image of participants looking at the photovoice photographs at WLHC Workshop 1 (October 2018)

Smaller groups of 3-5 people were formed with participants sharing why they had chosen the photographs before reflecting together on commonalities and differences between the photos and produced maps to connect these (see example map in Figure 22 below).



Figure 22: Result of the exercise for one of the small groups mapping commonalities and differences between the images at WLHC Workshop 1 (October 2018)

With the whole group we collated learnings from the breakout groups and noticed core values that had emerged in open discussion, while exploring some of the tensions between them, such as 'locally-grown' and 'culturally-appropriate' foods.

4.5.2 Graphic Harvest

The conversations in Workshop 1 were documented through a graphic harvest (see Figure 23) by an invited artist connected to the Ubele Initiative. Graphic harvesting, also known as Graphic Recording or Graphic Facilitation is, "the process of listening and synthesizing information into hand drawn images in real time" and supporters of the method say it, "adds engagement and energy to a room, increases group learning and supports participants' memory retention of the content over time" (Graphic Harvest 2019).

We chose a graphic harvest to document the process so that the discussions could be shared with people who couldn't attend the workshop, such as other consortium members, volunteers and interested members of the public, and to engage with different ways of learning including visual methods. The graphic harvest now lives on the wall next to the reception at WLHC.



Figure 23: Graphic harvest from WLHC Workshop 1 (Credit: Drew Sinclair)

4.5.3 Community food mapping and Workshop 2

The second workshop took place at the Wolves Lane Festive Market in early December 2018 to enable community engagement with members of the public and residents that didn't usually attend weekday activities at WLHC. In a busy marketplace with other stalls we wanted to use a method that was visual and interactive, so we chose community mapping as discussed with participants at Workshop 1. This met with pedagogical instincts and aims for the Conversations as:

"Community mapping embodies the central principles of PAR: it honours community voices; builds from the needs and strengths of the community; and supports community development as a process goal" (Amsden and Vanwynsberghe 2005).

We felt that by engaging in a mapping exercise the *Conversations* could focus on what people value around food in generating a collective vision for the centre where everyone's story matters (Lydon 2003). With an overarching aim of the *Conversations* being, "recognising diverse food cultures in the region" (Field, Logan and Woods 2018, personal communication), and previous experiences of how a focus on 'local foods' can be exclusionary, we felt that the mapping of people's food cultures could open up discussions to deepen learning of what community food cultures are the area in developing a *community* food hub and relatable food policy.

People contributed to a world map with drawings and writing to the question;

What foods do your family and friends eat or may have eaten in the UK and countries of origin?

People were also invited to trace the journey of different foods across the world using materials provided, such as string and stickers (see Figures 24 and 25). Photographs from the September photography exercise were also displayed so that people could see what the process had explored previously, and two flipcharts were available for participants to share through writing and drawing to the same questions from the photovoice exercise:

What activities would you like to see and contribute to around food at Wolves Lane?

What's the most important thing about food for you?



Figure 24: Deirdre (left) engaging with a participant at WLHC Workshop 2 (December 2018)



Figure 25: Responses to the community mapping exercise at WLHC Workshop 2 (December 2018)

4.5.4 Communal cooking and statement writing in Workshop 3

In planning the third workshop (communal cooking) for mid-April 2019, we chose a recipe from the community food map at the festive market, a Polish dumpling dish called Pierogi. The method, as chosen with participants, spoke to the facilitation team's original aims for the *Conversations* to be practical, respond to participants' suggestions, and enable opportunities to learn new skills. In the

first half everyone made Pierogi for the collective lunch, with an introduction to the cultural history of the cuisine by an Ubele Initiative worker with Polish background (see Figure 26). Over 20 people attended the workshop.

Content removed on data protection grounds

Figure 26: Making Pierogi as part of WLHC Workshop 3 (April 2019)

Prior to Workshop 3 the facilitation team had created five thematic 'clusters' of the food values generated from the first two workshops, and the second half of the workshop involved clarifying these clusters and drafting a series of food principles from them. In reflecting on our changing roles and positions within the process as the facilitation team, and not wanting to dominate analysis, time was embedded into the workshop for discussion between all participants about the food values clusters presented and physical rearrangement of them (see Figure 27).

Content removed on data protection grounds

Figure 27: Participants rearranging the five clusters of food values the facilitation team brought to WLHC Workshop 3 based on Workshop 1 and Workshop 2

Once the clusters had been rearranged, groups of three to five people each took a cluster away and wrote a statement synthesising the different values, that would make up the beginnings of a food principle (see Figure 28). Each group then shared this with the whole group, with time for participants to share any reflections on the statements and also about the process as a whole. After the more formal element of the workshop, we ate the Pierogi we had made as part of the weekly communal lunch. Participants were also offered the opportunity to talk or write to us with any feedback on the process.

Content removed on data protection grounds

Figure 28: Participants rearranging the five clusters of food values the facilitation team brought to WLHC Workshop 3 based on Workshop 1 and Workshop 2

4.5.5 Twelve principles and a poster

From the five statements co-produced at the last workshop the facilitation team found 12 principles with some slight edits in separating out long statements. This is a reflection of the values 'clusters' connecting diverse values within these, and we felt in some cases this could be clearer in separate principles. The 12 principles are a key element to a poster documenting the process (see Figure 29 overleaf); that is displayed at the centre, with copies distributed to participants, shared with site users and the consortium management group. The full principles are outlined in 'Appendix B'. As the process developed the food policy became a series of principles, rather than rigid rules, with the suggestion that a culture of support is created to work collectively towards them acknowledging this as a learning journey. The participatory aims of the *Conversations*, within the limited time of the three sessions, encouraged a pace to invest in community building rather than rushing to reach a goal of a detailed policy. The aim as advertised in the poster is that these principles are a *living document* that will change shape and content with participatory processes, ideas and suggestions. This is reflected in Yvonne's summation of the process at the end of Workshop 3:

"The whole idea about engagement, participation, hearing the voices from across diverse communities and ensuring that any policy we produce is a living policy... anyone could write a policy on paper, but it stays just that. It doesn't get implemented - its disconnected from the people that it's meant to serve."



Figure 29: Poster documenting the WLHC Conversations (Credit: Drew Sinclair) (zoom for detail)

4.5.6 Analysis in the WLHC enquiry

As highlighted in Table 2, analysis was built into the research as the facilitation team met after each workshop to plan the next, reflecting on learnings and interactions and how these linked to the aims of democracy, community development and empowerment. In reflecting on power dynamics in our roles as instigators and facilitators of the enquiry, there were reflexive discussions as to how people were responding to our facilitation approach and methods, as well as how we were working together internally. This reflexivity meant particular attention was paid to, "the dynamic aspects of interaction within the group, for it is this dynamic nature which is at the heart of focus groups and which endows them with the power to generate insight often negated by other [traditional qualitative] methods" (Parker and Tritter 2006).

In developing an analytical framework for co-writing an article, Deirdre, Yvonne and I chose the lens of 'power' as running through the intentions and values of the process, experiences of the workshops, and iterative analysis in the facilitation and focus groups. We agreed as a basis for the article to each spend time reflecting on the outputs of the workshops (see Table 2) and personal experiences on the themes of 'power and food', 'power and space' and 'power and participation'. Personally, I went through the research outputs highlighting what I felt had been indicative and pivotal moments in shaping relations and direction of the enquiry in regard to the three 'power' themes, and how the 12 principles subsequently connected with these. We each sent written texts on each theme before meeting up to discuss these and find common threads, and developed reflections in relation to different theory we shared as connected to practical learnings. This analysis makes up the basis of the co-written article that we are attempting to publish in 2020. As a group we had a second wave of post-analysis in August 2019, in preparation for presenting at the RGS-IBG Annual International Conference. The panel theme we applied for supported reflection on the Conversations as to how our enquiry as intervention related back to developing an emancipatory culture at WLHC in connection with 'transformative governance' in the intersections of community, food and (urban) space.

In writing up the data and discussion chapter for this thesis I applied elements of the thematic analysis that had emerged in writing the article and presentation, with expansion of my own analysis, to the frame of urban agroecology and food democracy. In the next section I outline the method's development in the LGWC enquiry.

4.6 London Grown Workers Co-operative methods and analysis development

Interest was expressed in engaging in a PAR process, but because of limited time and capacity the methods generated in the LGWC enquiry were ultimately what became available to me and the coop members through the process (Heron and Reason 1997). Because we did not necessarily make classic action-reflection cycles together as a group, the enquiry is not a piece of traditional PAR research, and it became necessary to introduce qualitative methods, led by myself as the PhD researcher. Nevertheless the work we did together through the research period did take on AR qualities, as "is common in action research, just raising the research question and designing a way to study it is often already an intervention into the setting" (Herr and Anderson 2005).

The methods of mobile focus group, interviews, and document analysis with (auto-)ethnography meant that the research was able to move into understanding the dynamics of the organisation beyond more traditional qualitative methods, such as a questionnaire which Gustavsen et al. (2008) find an unsatisfying method, as workplace research, "is a question of *relationships:* something that exists *between* people."

In following up informal discussions with co-op colleagues about the possibility for participatory research, I tried initially to add the project as an agenda point in co-op meetings up until March 2018. During this period there was too much on the agenda to get to it, as other co-op business was also rolled over to the next meeting. An element of this slow start in the process was also related to my own confidence and knowledge with action research, as I was working to deepen my understanding through workshops and reading coupled with feeling unsure of strategies of how to begin the process. I met up with colleagues one-to-one in March and April 2018 to discuss possibilities and see what might be feasible within the time and financial constraints (Grant et al. 2008), and discuss any concerns as regards the research being part of the PhD.

From these check-ins there was encouragement to make time to be together as a group, and broadly reflect on *What have we learned together?* as linked to considerations for the present and future development of the organisation. This 'loose' space of collective reflection seemed to be related to expressions of 'isolation' within the group (myself included), as our time together had been having limited and usually focused on existing projects. We hadn't made time previously to reflect on the journey of the organisation and take stock of what we had done in the first couple of years. In this sense the research was a collective intervention, an action, in what can feel like an unrelenting process of funding cycles, monitoring, running education and community programmes, and political work.

The idea generated was that the four co-op members would walk together in the area around the site, rather than be at the site, for a 'reflections walk' (mobile focus group) and the time available for this was five months later, in September 2018. There was also agreement to do a follow up session a couple months after, but this wasn't possible due to busy diaries. As a result, I suggested one-on-one interviews in a conversational format, which worked with members' capacity better. This change of plan gave opportunity for colleagues to see what each other had said in their personal reflections (as interview transcripts were shared) and highlights the need in AR to be ready

to alter research designs as context changes in, "maintaining an ongoing dialogue in a process of learning and change between the actual and the possible" (Martin 2008: 404). Between the mobile focus group and the interviews, I completed analysis of the organisation's documents to complement my own ethnographic notes in generating topics to discuss. With changes in direction leading to diverse methods and textured understanding of LGWC's development with limited capacity and time, I am reminded of (Gibson-Graham 2006) Gibson-Graham's (2006: 194) assertion that in generating transformative economies it can be useful to approach, "existing conditions in a spirit of experimentation and generosity, we are encouraged to view them as conditions of possibility as well as impossibility."

The process as a group of individuals coming together to set up and run a workers' co-operative has felt like what would be described as a series of action-reflection cycles since 2015, as we have learnt through experiences together and changed our approaches and collective endeavours. In this sense the co-designed spaces make up an approach of participatory evaluation as we reflected on the past as to learn for the present and future. This collective ethnography of reflecting as a group engages in active memory as knowledge as:

"this is how anything imaginational grows in our minds, is transformed, socially transformed, from something we merely know to exist or have existed, somewhere or other, to something which is properly ours, a working force in our common consciousness" (Geertz 1983: 47).

The myriad of qualitative methods with elements of participatory evaluation are summarised in Figure 30 below.



Figure 30: Methods used for insider action research for the LGWC enquiry

The research timeline for the worker co-operative enquiry can be summarised as follows (with the underlying ethnographic diary);

- Scoping period; August 2017-May 2018
- Mobile Focus group; 23 September 2018
- Document Analysis; February April 2019
- Semi-structured Interviews; April May 2019

The iterative development of these methods as a form of participatory evaluation is shown in Figure 31 below in context to the informal action learning that happened in the development of LGWC.

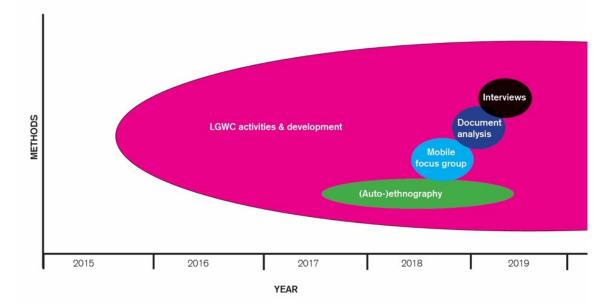


Figure 31: Iterative methods used with participatory evaluation in relation to the development of LGWC as a broader process of informal action learning

4.6.1 'Reflective walk' (mobile focus group)

At the beginning of the walk we met at a Colombian restaurant in Seven Sisters, Haringey, where we had previously had meetings with each other and partner organisations. The café is part of Pueblito Paisa (the Latin Village) which is under threat of being evicted by Haringey council – what is being called a threat to cultural life through gentrification (Pueblito Piasa 2019) – and where some of the co-op members had attended campaign events and demonstrations.

We aimed loosely to walk southwards towards Hackney down the canal (Lea Navigation), catching up with each other and not really talking about work. The canal moves through Hackney, Haringey and into Waltham Forest and in this sense it has connected the people in the coop who live in boats on the canal or close-by in flats, and also organisations that LGWC has worked with, such as Organiclea, are situated close to the waterway. These boroughs are also predominately where volunteers coming to the garden live and where (as well as with Enfield) we aim to build relationships; in this sense walking down the canal felt appropriate as representing a connective thread in the co-op's history and territory of activity. The journey took us through places related to socio-economic changes happening in the area the coop is based and have been the point of political discussion in the organisation and our approach. One such example is an industrial estate where we picked up cardboard for mulch, which is now becoming a 'creative quarter' with art cafés and studios replacing manufacturing businesses (see Figure 32).







Figure 32: Photographs from 'reflective walk' through an industrial estate in Tottenham, September 2019

I felt nervous about how the reflective discussion would begin and felt that I didn't want to necessarily prompt the beginning of the exchange as I had already led in organising the day to happen. I had recently written up a first draft chapter on the LGWC enquiry, and after dwelling in my perspectives for weeks I was interested to hear those of my colleagues, as well as the tone of *how* we would have this collective conversation. Prompted by another co-op member, what began was a largely unstructured dialogue in which people mainly shared their experiences of the last years in the organisation, barriers, and ways the organisation could develop in response to these. There was a question at the beginning that we worked through together: *what do we want to talk about in this time?* and this was generally agreed to be broad enough not to disallow any topic/experience within an underlying intention of exploring *what have we learnt together? how does this feed into what we are doing now and next?*

Once in Hackney, we chose a warm public place by the canal and stayed for around four hours. In this time coop members began to make notes and drawings in the meeting, and so did I as a record. I typed my notes up and shared them with the co-op. This open and informal beginning to the process with movement through our local area meant that we could reconnect in our relationships after a period of isolation and enter into group reflections at a co-generated pace, literally walking through memories of recent years.

4.6.2 Document analysis

I chose to use document analysis (DA) in this research as:

"Documentary records constitute a rich source of insights into different employee and group interactions of organisational life, because they are one of the principal by-products of the interactions and communication of individuals and groups, at all levels, in organisations" (Cassell and Symon 1994: 148).

Organisational documents can be considered to be useful as they are integral parts of systems and structures and highlight understandings of particular problems, prescribe appropriate behaviours and different ways of getting things done (Cassell and Symon 1994: 149). Because such documents exist in a particular context it is important not to take them at face value; thus, DA is combined with other methods in order to develop textural insight into the life of LGWC. I focused on collectively produced documents: minutes of meetings, business plan, project plan, and strategy workshop notes. It is important to note that as a co-op member I was involved in producing some of the documents that I analysed, and why 'member-checking' and interviews aim to generate a co-analysis with layered perspectives.

The analysis of documents was completed alongside analysis of the mobile focus group and my own journal notes (see Analysis section 4.6.4 for the full process). As with the latter methods I employed a thematic analysis approach as I looked in the data for overarching themes and emerging questions. I went through the document highlighting what I deemed pertinent moments, discussions or pieces of information, making short notes in a separate document summarising these in short descriptions and also copying and pasting the original text if it was particularly vital.

To support the process of developing analytical themes I created word frequency figures for meeting minutes, strategy sessions/project plans, and business plans, and then all documents combined. This enabled a clearer picture of how in the different kinds of spaces the co-op interacted, this shifted LGWC aims and cultures such as in a strategy session to a monthly meeting, and if there was differentiation between project plans and business plans for instance. I also printed the written summaries of key points derived from the original documents so I could write in the margins emerging 'theme labels' for each section, attaching sticky labels with any comments and questions for the interviews on these. In doing so, topics either built frequency or remained unusual in the documents with *louder* and *quieter* themes, and I was able to integrate these with topics emerging from the reflections walk notes and my own journal to develop initial theme maps. Through the process I noted how the mission, values and aims of the organisation evolved through learnings, and also created an income/expenditure analysis document (part of the business plan) to gain more insight into elements of the co-op's business.

4.6.3 Interviews

The interview method enabled dialogue with co-op members one-to-one with opportunity to shape the interview, engage more with their personal experiences, and focus on topics according to their wishes, as opposed to the mobile focus group where there are more interwoven relationships, needs and desires. The interview, therefore, offered a way to generate a deeper and more layered analysis rather than breadth and coverage in the research (McDowell 2009) complementing other methods, especially as participant observation, "is not essential in the effective production of a descriptive-analytical account of a social grouping" (Hockey and Forsey 2012: 74). In planning the interviews these were discussed with colleagues as more of a two-way conversation, with them bringing questions and topics too. Printouts of the 'wordles' prompted discussion on the differences in topics between our regular meetings and the reflections walk as related to what people cared and were passionate about, and an analytical map was edited through dialogue. During the interviews the discussions at times became discursive and developed by building on reflections, and so the questions acted as a basis rather than something to be followed strictly, making the interviews semi-structured. Each interview was roughly two hours long, totalling six hours of audio which was transcribed, and the interviews took place in a café (J and Dunya) and at WLHC before a gardening session (anonymous market gardener).

Although monthly meetings began with a short 'check-in' to hear how people were arriving at the

meeting, we hadn't managed to organise sessions to share emotional experiences of the co-op, to discuss how the co-op was making us feel, or to engage in working through any internal tensions. This meant that the interviews were also potentially loaded with a background of feelings that had not necessarily been expressed through co-operative structures. This is echoed by McDowell (2009) who writes that what distinguishes interviews from other methods, "is the scope they provide for probing meanings and emotions: interviewing is an interpretative methodology."

4.6.4 Analysis in the LGWC enquiry

I approached the LGWC documents, my diary, and notes from the reflections walk as if they were live documents – almost like interviews with the organisation. I tried to be reflective of my own biases in reading the documents and to engage with these instead of ignoring them by feigning objectivity. I completed the same process described with the DA method as with the reflections walk notes and my own journal. In highlighting sections of the documents and doing numerous passes, this meant analysis was developed *close* with the data rather than being derived from abstract theory (Ryan and Bernard 2003). Instead, theory was connected through analysis of the material as themes emerged with similarities and differences; and linked to work in the literature review. The analysis takes an inductive and dialectical approach whereby:

"Data is dissembled into elements and components; these materials are examined for patterns and relationships, sometimes in connection to ideas derived from literature, existing theories, or hunches.., or perhaps simply common sense suspicions. With an idea in hand, the data are reassembled, providing an interpretation or explanation of a question or particular problem" (Jorgensen 1989: 110).

In writing up the thesis the stages of analysis of data can be summarised in the following steps:

Thematic Analysis 1

- 1. Completed Document Analysis as described in section 4.6.2.
- 2. Highlighted pertinent sections of my reflective journal and reflection walk notes with short descriptions of these decisions or moments in a separate document
- 3. Wrote summary key words ('theme labels') for the short descriptions of the highlighted text, and noted emerging questions for interviews
- 4. Produced word frequency diagrams using Nvivo as a tool to support identifying themes
- Compared and integrated 'theme labels' from the DA, reflective journal and reflection walk notes in seeing where correlation, difference and contradictions were and developed these through thematic maps
- 6. Produced a graphic theme map linking emerging themes with territorial dynamics in

London, and social structural considerations

7. Linked emerging themes with draft questions for interviews sending these to co-op members with 'wordles' and the graphic theme map

Thematic Analysis 2

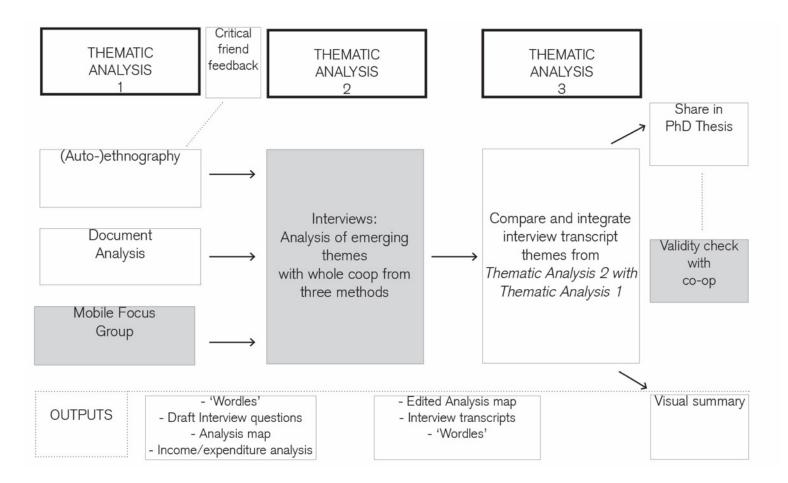
8. Conducted semi-structured interviews with co-op members generating reflective dialogue with reference to the above materials and editing the graphic theme map

Thematic analysis 3

- 9. Transcribed interviews using Nvivo and highlighted different sections that were pertinentwriting short descriptive phrases next to the highlighted area
- Compared these short descriptive phrases to the themes produced from 'Thematic analysis
 1' editing these and adding to them
- 11. Created a spreadsheet inputting interview quotes into cells according to the analytical themes (y axis) and the three interviewees (x axis)
- 12. Compared the different perspectives within the spreadsheet and my own journal to see where commonalities and differences were in generating overarching themes

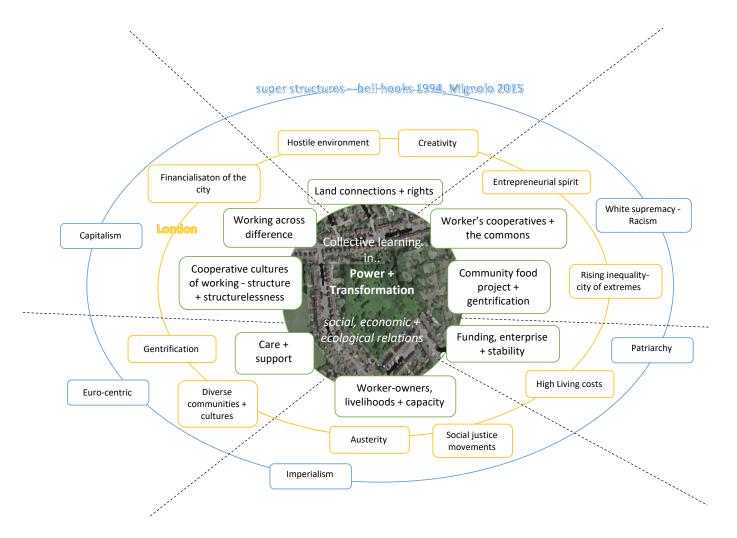
This analytical process interacting with methods and research outputs is laid out in Figure 33 (see overleaf), and the graphic theme map that was shared with co-op members prior to interviews, discussed and edited particularly with J is shown in Figure 34 (see overleaf). This latter diagram frames the thematic learnings with characteristics of London and broader social structures so as to begin to analyse collective and individual transformations (social, ecological and economic) in developing an agroecological workers' co-op.

The majority of the methods and analysis labour was done by me as a PhD researcher. Given the collective capacity of co-op members for a participatory process and how the enquiry developed, the approach of developing initial codes (themes) myself and then refining them with the expertise of members of the community is a technique sometimes used in AR processes to generate new analysis (Tandon et al. 2001). This is not necessarily preferential to more democratic analysis in terms of generating transformative knowledge, but does go some way to challenge a dynamic of leaving analysis to researcher 'experts', and instead engages in a, "collaborative and constructive process of reflection" (Cahill 2007: 183). Holtom (2015), in a PAR PhD, describes this analytical approach as a "participatory grounded theory approach" whereby unfolding themes reveal and connect with theories highlighted in thesis literatures.



Key: Clear box - methods/analysis on my own, Grey box - methods/analysis with coop members

Figure 33: Analysis in the LGWC enquiry



Key: Green boxes- emerging LGWC themes April 2019; Yellow boxes- London characteristics; Blue boxes- social structures

Figure 34: Analytic tool for co-analysis to explore how learnings through LGWC related with broader social dynamics in London and social structures

4.7 Summary

In this chapter I have outlined this thesis's research approach and methods. I have shown how AR is an appropriate overarching methodology for agroecology research, and that I have drawn on different elements of the family of practices across two separate yet connected research processes. In terms of critiques of action research and considerations of validity, I highlighted reflexivity and dialogue recognising power as ways in which to build rigour into the study. The latter speaks to understandings of deep food democracy (section 2.3) and to *diálogo de saberes* being a critical feature of political agroecology and a transformative agroecological learning framework being developed in a European context (section 2.3). Therefore, the democratic validity of the study is also bound up with the content of the questions being explored, in relation to the evolution of urban agroecology with food democracy. The outlines of methods development highlighted the flexible approach required in AR in generating varied research tools for a textured and valid analysis, with participation in all areas of the research considering resources and capacity available. This experience reflects that different participatory tools and approaches are required in each given context, "because any participatory initiative contains a unique mix of people and institutions" (Light et al. 2011; Wakeford et al. 2008), and call for a flexible practicality whereby researchers call on whatever strategies, methods, and materials are at hand (Denzin and Lincoln 2005).

What seems clear is that the enquiry does not follow a typical PAR model as the kind of action research was shaped as iterative methods coalesced between insider practitioner research, to participatory evaluation, to popular education methods and community development, with qualitative methods used to support participatory elements. The community has not been fully involved in the research process in terms of the writing of this thesis for my PhD programme, although there was participation to varying degrees from inception to analysis within the two enquiries and sharing of the work in the academic community. There is further reflection on the evolution of the food policy process in chapter 5 in terms of participation and power, and I return to the relationship between action research and a PhD framework in the final chapter 7. With critical consideration through the PhD, in terms of first-person action research and my own practitioner action-reflection, I aim to learn from how the methods and approach manifested and choices made in future praxis, or as Chrisp (2004: 92) expresses it: "my hope is that maybe I will get more right than the last time ... The tensions require constant deconstructing, complexities explored and acknowledged openly, and dilemmas made transparent." Having outlined key literature (chapter 2), the organisations where the research is situated (chapter 3), and the research approach and methods in this chapter, I now introduce the findings from the WLHC enquiry and discuss these in relation to research objectives and key concepts.

Chapter 5: An experimental intervention in food democracy towards urban agroecology at a food hub

This chapter aims to share findings of the Wolves Lane Horticultural Centre (WLHC) enquiry described in chapter 4 and discuss these in relation to gaps in knowledge presented in chapter 2. These discussions of learnings from the *Conversations from Seed to Plate and Beyond!* process are connected back to research questions, aims and objectives of the thesis. This chapter is predominately focused on the research objective, 'To co-produce a just democratic process in shaping foundational principles of a food hub with urban agroecological intentions', and the connected research question, '*How can a food hub develop urban agroecology with a central tenet of food democracy?*' The chapter argues that integrating creative popular education into a transformative agroecological learning framework (Anderson et al. 2018), and embedding a 'critical lovingness' within organisational structures, can support urban agroecology to develop with food democracy. These two key findings are connected to emergent *diálogo de saberes* (DDS) (see section 2.2.) within the enquiry that challenges parochial elements of the 'local trap' (Born and Purcell 2006), and centres lived experience in knowledge approaches beyond 'bringing good food to others' (Guthman 2008).

The term 'critical lovingness' is built on two findings in the enquiry. Firstly, in acknowledging the importance of supporting an emergent transformative culture, where translocal foodways are expressed and centred through DDS, an anti-oppression framework is suggested to be embedded within organisational structures. Secondly, it emerged that relationships of trust, respect and love are a bedrock of deep democratic cultures, and a critical pedagogy of lovingness is proposed to support these relational characteristics in the development of solidarity in transforming oppressive ideologies (Darder 2002, hooks 2000). This combination, of lovingness practised as fundamental in building solidarity among peoples and underpinned with an anti-oppression framework to support dialogues on power, makes up a 'critical lovingness'. Ultimately, 'critical lovingness' emerged as a way to build on the work of the enquiry with signs of emerging DDS as central to agroecology transformations (Martínez-Torres and Rosset 2014, Anderson et al. 2019).

Section 5.1 focuses on data and discussion highlighting how creative popular education (PE) supported horizontalism and different ways of knowing in the *Conversations* towards characteristics of deep food democracy and agroecological transformation. Section 5.2 outlines the holistic approaches to food and health that surfaced through the PE tools, emphasising how shaping understanding of food and health based on lived experience can challenge top-down missionary complexes (see 2.4.2). As well as holistic approaches to health, translocal foodways also emerged

through the *Conversations*, and these are discussed in section 5.3 in relation to participants' commitment to practical dialogue of these in building community, tensions with ecological concerns for food miles, and a proposal for anti-oppression frameworks. Section 5.4 shows how love, trust, and respect were identified as characteristics of underlying relationships in deep democratic cultures and suggests that a lovingness based on critical pedagogical perspectives be integrated into organisational structures to support these. Section 5.5 connects the action research findings back to the question of how a food hub can develop urban agroecology with a central feature of food democracy highlighting contributions to gaps in knowledge. As agreed with participants, all quotes are anonymous.

5.1 Creative popular education and deep democratic knowledges for urban agroecology

As described in Chapter 4, Workshops 1 and 2 had the same questions asked in different contexts, these were: "What activities would you like to see and contribute to around food at Wolves Lane?" and, "What foods do your friends and family eat or may have eaten in the UK or countries of origin?' In Workshop 2, we also had an additional question of, "What is the most important thing about food for you?" intended to get input on underlying core food values that were explored in Workshop 1. Workshop 1 was the photovoice process in a focus group, and Workshop 2 implemented a community mapping process with opportunity to write down answers to the questions on flipchart in a public survey approach. In comparing what emerged from these two processes I was struck by the difference in depth of emotion and everyday experiences that I observed and felt, being in and transcribing the recording of Workshop 1. The exercises reflecting on the photovoice images as a group including active listening pairs brought out expressions of memory, colour, relationships around food identities and cultures with a depth and honesty that I found very moving. Although for instance "culturally-appropriate and diverse" food was written down as something important at Workshop 2, the way in which food cultures were expressed in Workshop 1, with stories and emotion and descriptions of flavours, really began to paint a picture (and literally through photographs and the graphic harvest) of what culturally-appropriate might mean for different people. Examples of participants sharing connections to different photovoice pictures and highlighting memory, colour, community and culture as important in Workshop 1 are as follows:

"James liked fish and chips because he felt nostalgia and it reminded him of his childhood. I guess that was a common theme in our group."

"And Alem did a really really interesting thing of seeing things in sequence so its growing and then it's harvesting and it's healthy its natural and it's a sort of childhood memory this picture here of my father working in the allotments." "And then a common theme was childhood memories and a lot of these foods or pictures made us nostalgic and brought up childhood memories."

"I liked them [the chosen photographs] because they showed people coming together and eating and I really like that it's a big part of my culture. And then I liked seeing what those ingredients turned into."

"I just saw these pictures and I just went for the green colour I really like the colour green it's a really natural kind of organic colour for me."

"Just the actual seed sowing and it what it turns into. Rows of new life, how colourful they are and the order of them and just planting out and measuring."

"This is about eating together so we've got the picture of us about eating together. That's about sharing knowledge and passing on knowledge and skills."

"The things that connect are sharing foods and knowledges, conversations and community"

Deirdre summarised this section of Workshop 1 at the time by saying:

"I think we saw some really clear themes emerging. So, connection was an important one. Memories, learning, and that's you know learning from each other, across generations, and passing on and sharing knowledge" (Deirdre 2019, Workshop 1).

Yvonne, who was helping to organise the market for Workshop 2 had more of a birds-eye perspective of the creative activity of community mapping and noted:

"The mapping session appeared to offer a vibrant, visual and fluid encounter within a contained space. Participants were able to step in and out of the conversation and offer their insights through conversation and posting post it notes on the world map. I noticed that participants were highly animated when describing and locating the origins of their favourite foods. This less boundaried session allowed for a wide diversity of people to be included in this highly creative yet quite momentary process" (Field, Logan and Woods, 2019, personal notes).

The above quotes give an overview of the tone of dialogue prompted by creative popular education methods, and the themes that emerged are explored in more detail in the subsequent sections: holistic approaches to food (5.2), practical dialogue of cultural food practices and translocality (5.3), and the importance of democratic relationships (5.4).

The visual and creative element of the PE tools used was particularly important in generating a horizontalism in the co-pedagogical environment, as it valued different ways of learning and communication enabling new knowledges and skills. This is highlighted in feedback on the photovoice process with participants reflecting on the photographs, "I like them because I learnt new things so I didn't know that purple corn existed" and, "James is interested in learning about different foods and we didn't quite know what that [picture of food] was and we were interested in learning what that is." The host of creative and practical tasks in the *Conversations* supported a

democratic learning culture, which is not always the case with more top-down knowledge approaches that some PE tools, such as panels, can bring (Choudry 2015, Clennon 2019). Deirdre, for instance, reflected on the process that, "photovoice and cookery enabled the participation of disabled people, including those with neurodiverse, physical and mental disabilities. These voices are often excluded, facing many barriers to participation including inaccessible methodologies in workshops, but also in decision making" (Field, Logan and Woods 2019, personal notes). In relation to the transformative agroecological learning framework (TALF) in Europe (see 4.2.1) the enquiry suggests that *creative* popular education should be included in the second pillar of 'horizontalism' (Anderson et al. 2018), as this is not currently present, and the methods support equitable democratic communication (Sitrin 2006).

5.1.1 Translation in dialogue of practices

Another pillar of the TALF to which the enquiry speaks is 'Combining the Political with Practical', and also with 'Practice' at the core of the framework (Anderson et al. 2018). Rather than framing the dialogues on memory and cultural meanings of food as 'merely cultural', as is often the case with practical community arts projects, it is important to emphasise these as social and political in nature (Butler 1997), since they express everyday experiences embedded with meaningful knowledge of social dynamics. The connection between artistic methods, everyday experience and social justice is expressed by ERINMA (2020):

"Often the arts can consider & express, without words, the powerful truths that research can discover yet not express to policymakers. What exclusion feels like, what it does to humanity & precisely how inequality is bad for society, and how this translates into everyday realities."

The practical act of cooking together was also repeatedly referred to as an important way to exchange knowledge in the workshops. As one participant shared at Workshop 1:

"Yeh cos we have most of this stuff, we have the passion and the joy in the growing and the community, we have the connection with the community - it's this - I think it's this section - I think we need - we eat together but we don't cook together - so we're not sharing that knowledge" (Workshop 1 participant 2018).

And also, in response to a suggestion that we should cook at the next workshop, a participant said, "and then that's kind of sharing knowledge isn't it" (Workshop 1 participant 2018). This desire for practical collective learning was often expressed with the value of cross-cultural exchange, acknowledging the diversity of backgrounds of the people who attended activities at the centre. Through the photovoice exercise participants generated values of, "bringing people together to learn about new foods" and, "different foods from different cultures" (Workshop 1 flipchart notes 2018); thus the cooking element in Workshop 3, with a centre worker sharing their Polish pierogi recipe, meant that the *Conversations* began to embody the evolving collective values.

In terms of generating *diálogo de saberes*, as a critical feature of agroecology and a pillar in the European TALF, I note that wisdom expresses itself in mundane tasks such as the "operations of calculation, measurement and weighing" (Leonel Santos 2002: 81 as Santos 2016). These practices, often seen in cooking, were part of learning the pierogi recipe in Workshop 3. The enquiry highlights how cooking, as a point in the food cycle, is a moment of potential transformation in dialogue: building understanding, relationships, and ultimately the exchange of practical knowledge across different cultural perspectives. This contrasts with 'bringing good food to others' (Guthman 2008), since the activity, recipe and facilitation of the cooking came from participants, and was an important way to learn and build community together. I return to this analysis more comprehensively in relation to community self-definitions of health in section 5.2.

The photovoice exercise and cooking workshop can be seen, in particular, as "intercultural contact zones" where ,"it is possible to enter in visual and existential contact with different kinds of present as experienced by different social actors" (Santos 2016: 234). The potential of food as an intercultural contact zone was supported with clapping from the whole group in Workshop 3, when a small group fed back their principle of: "Foods bring together diverse communities, cultures and generations through exchange of knowledge skills and recipe". A feature of intercultural contact zones being 'translation' means that DDS can be supported by the different languages opened up by creative PE tools, in this case photography and cooking, to express and share forms of knowledge. The emphasis on exchange between different cultural practices from participants, with holistic conceptions of knowledge exchange challenging European positivism, highlights the emergence of some qualities of *diálogo de saberes* in the development of collective foodways at WLHC. Through the three workshops, however, there was little direct discussion of power in terms of food, although tensions between culturally appropriate foods and food miles *was* discussed for instance, as well as relationships between food growers in the Global North and Global South were touched on in Workshop 3.

The *Conversations* focused largely on affirmative features of food democracy and food justice, such as building solidaristic relationships as a basis of community, understanding food in cultural, social and ecological, and demands for community participation in WLHC decision-making. In the first three sessions it seemed that trust and understanding had been deepened, with points of conflict starting to emerge (i.e. culturally appropriate and food miles), and that further dialogue of these initial interactions would be possible, as well as of issues concerning power at the centre and more widely in society. Whether forms of cultural diversity develop along transformative lines or slip into essentialised impositions of a 'melting pot' (Singh 2016) will become clearer as the project develops, and section 5.3 refers to this in terms of enabling and defending a transformative culture. Importantly, the centring of practical exchange of cultural food traditions, recognising different backgrounds and experiences, emerged *from the participants* through the PE tools, as a way to build community, relationships and knowledge at the centre. Although it would be a stretch to say that in the three sessions *diálogo de saberes* developed by definition, transformational emergences (Anderson et al. 2018) did begin to arise, with democratic foundations built as relationships were strengthened, food cultures and memories expressed, and practices shared. In relation to evolving a European TALF, therefore, the emphasis of creative popular education in 'horizontalism' can support the emergence of the critical agroecological pillar of DDS. The 'combining political with practical' pillar of the TALF is also central to translation in dialogue and the creation of deep food democracies as, "the aim of translation between *practices* [emphasis added] and their agents is to create the conditions for global social justice from the standpoint of the democratic imagination" (Santos 2016: 234).

Although the enquiry did not build and strengthen networks (the fourth pillar of TALF) beyond the community in and around WLHC at a sub-territory level, a theme that emerged was developing relationships at a critical feature of building food democracy. The process itself also involved building relationships through action, and in this sense the enquiry strengthened the network at the centre. One participant in Workshop 1 shared that:

"Because I've worked with these and we're normally working but we're sat down and you're normally in the kitchen and normally wandering around everywhere and you're all part of something else – you're all quite disparate – it's quite nice to be meeting and just have everyone sat in the same place" (Workshop 1 participant 2018).

And another participant sharing what they were taking away:

"The link between community and food I think was very powerful. We're all on the same page really" (Workshop 1 participant 2018).

The workshops, with the collective tasks of cookery, photography and turning emerging values into food principles, highlight how creative PE can support building relationships *and* skills in a symbiotic way –with direction, importantly, from participants. This perspective challenges recent food democracy studies that find the development of skills as a secondary aim to building relationships (Prost 2019; McIvor and Hale 2015). Therefore, although the enquiry did not fully meet the fourth pillar of the TALF, (building and strengthening networks across scales), the enquiry did this at a sub-territory level (see chapter 3) with creative and practical PE tools supporting the strengthening of democratic relationships and skills. In section 5.4 I go into more detailed analysis

of the *kinds* of relationships that can be building blocks of deep food democracy in evolving urban agroecology.

As highlighted in the above analysis in relation to a European TALF (Anderson et al. 2018), the creative and practical exercises in a PE tradition, introduced by the *Conversations*, strengthened the conditions for critical features of the framework to be present in interconnected ways. The deepening of horizontalism by enabling varied languages of learning, for instance, supported translation in intercultural contact zones focused on practice (as political), thus budding emergences of DDS. Creative and practical popular education, therefore, is an approach that can support the progression of urban agroecology with, "a questioning of the logics and accounting that underpin the dominant modes of agriculture through learning processes that force ruptures in conventional thinking and practice" (Anderson et al. 2018). And notably is well placed to enable a complex, place-specific approach (Warner 2007) in understanding how agroecology can evolve 'from' the city – as the tools centre lived experience within that territory. As the production of the city is a contested process, and as progressing new collective ways of learning can enhance communities' claims to the city (Yap 2018), creative PE can be a valuable approach in developing urban agroecology as a *way of conceiving* the city towards an emancipatory sustainable development (Tornaghi and Dehaene 2019).

This section began with my reflection of how, compared to the consultatory approach of people writing answers to questions in Workshop 2 at the community market, the creative PE tools within the enquiry supported a depth of emotion, memory and cultural heritage. Whilst the photovoice and community mapping across the workshops complemented each other well, the written answers to the questions on flipcharts lacked, relatively, dynamism and depth in creating understanding of the content and breadth of foodways. This exercise also gave the facilitators (Deirdre, Yvonne and myself) a central role, through hosting the flipcharts, holding the knowledge generated in the conversations with market-goers as the main points of contact, and literally by keeping notes. Although this section of Workshop 2, unlike the PE tools, did not generate knowledge in a relational and embodied way, what it did do was allow for ideas about the future of the centre to be expressed in a public space (at the market). Whilst there had been a survey completed of predominately existing users of the site, when Organiclea took on the management of the space, and a collaborative process with local community organisations in 2017, there had not been public engagement in such an open fashion until this point. Furthermore, there had been no local referendum about the council's decision to grant Organiclea the management of WLHC. Against the backdrop of undemocratic council planning decisions in London (Granville Community Kitchen 2018, Chakrabortty 2014), a democratic process in developing WLHC becomes even more vital in shaping who uses and benefits from the space, and how the space is used. The opportunity

to document ideas through the flipcharts at the public market, although certainly not exhaustive in a community consultation, provided a space for people that could not or did not want to participate in the workshops to feed into shaping the direction of the centre.

At Workshop 2 market-goers' responses to the question, "What activities would you like to see and contribute to around food at Wolves Lane?" included food-related activities, as well as: "tap dancing (dancing) for over-50s, art classes, movie nights, dance, embroidery and sewing" (Workshop 2 flipchart notes 2018). What this uncovers is that within the development of the community food hub there are voices calling for activities unrelated to food in questions focused on food. One conversation I had at the market was with a local resident who expressed clearly that they didn't want the centre to be all about food, and that there should be activities open to the public. Therefore, whilst there was a lot of positive engagement in the food aspect of the hub set within the growing greenhouses, allotments and café infrastructure, the data from Workshop 2 was a reminder that in creating a democratic space, non-food-related activities were also important. This speaks to the mission statement of WLHC as a "food hub plus" (see Chapter 3) and in particular the intention to offer, "space for community groups and social enterprises to run activities that benefit the community" (Organiclea 2017). Responding to democratic expressions of the desire or need for non-food-related activities at WLHC can also support long-term viability, with one study noting that UK community hubs with, "a lively mix of complementary activities, centred strongly on core mission" were more likely to thrive sustainably, while also warning not to overstretch with too many activities (Trup et al. 2019).

So, in asserting that, as compared with the survey-type method of Workshop 2, creative popular education methods enabled a more holistic and emotionally grounded understanding of food across social positionalities, such survey-type tools in developing food democracy should not be written off entirely. Rather, while questionnaires and information-gathering tools can be useful if used in tandem with creative and collective group work, the enquiry suggests that without the latter a threadbare form of food democracy is likely; namely, one that lacks the enduring and dialogic relationships of deep democracy (McIvor and Hale 2015). Creative popular education, as was found in the *Conversations*, requires more time and resources than more consultancy-type approaches in decision-making, and risks not being utilised because of a lack of resources as shown with urban agriculture and funding cycles in section 2.4. Taking more time in developing building blocks of food democracy through collective creative processes was considered at the end of Workshop 1, when participants were asked how they were feeling, with one participant responding, "Optimistic, because I think seeing the process and looking back at how it's began – and it's not happening overnight, it's happening over a period of time – it's not being rushed." This important issue, of investing time and resources in food democracy within the neoliberal city, is explored further in

chapter 6 where it is connected to the generation of cultures of care. After the following summary of the benefits of utilising creative popular education approaches in developing food democracy, shown in Figure 35, I turn to critical considerations of the *Conversations* in terms of developing learning process embedded with horizontalism.

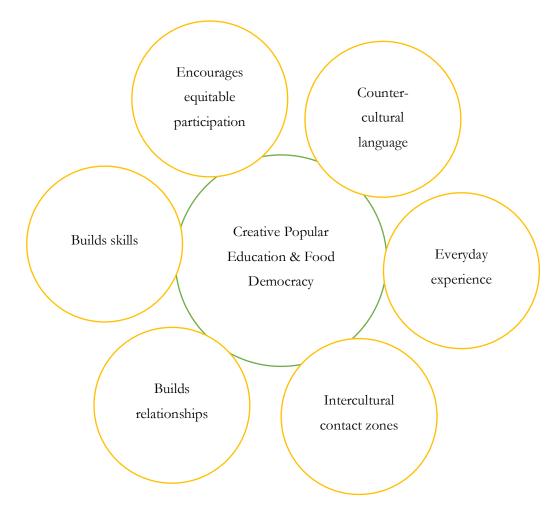


Figure 35: Benefits found in the study of creative popular education tools supporting food democracy

5.1.2 Critical Conversations

Anderson et al. (2019: 17) highlight some critical questions of governance processes in

agroecological transformations:

"Which actors are involved? Who has the final control over decision-making processes? Whose perspectives, knowledge, values, and aspirations are embedded in governance, and whose are excluded? Where is 'governancemaking' actually taking place? Through which avenues can governance be improved? Whose interests are served and is someone held accountable?"

In applying this to the Conversations, questions arise around the formation of the facilitation team

and its leadership. As described in Chapter 3, Deirdre, Yvonne and I formed a facilitation team in order to design a community-generated food policy with the aim of supporting a democratic and transformative culture in the formation of the food hub.

As the enquiry came from an issue in the consortium management group (the need for a food policy) and was led by the facilitation team, all of whom were in the consortium management group, this highlights a dynamic where the issue explored came from the top-down led by people in leadership positions. The *Conversations* speaks to the 'realism' observed in consultations: as there were efforts of member-checking and collectively deciding the format of the final workshop with participants, in working towards a, "more two-way process where both top-down and bottom-up priorities can be addressed" (Wakeford et al. 2008: 348). Despite these efforts and considering elements of an unclear and unelected management that motivated the enquiry in the first place (see Chapters 2 and 3), a facilitation team made up of consortium management members guiding the process can be seen to reinforce the power dynamics at play. With the intention to shift decision-making towards a more bottom-up approach and choosing critical pedagogies, such as PE tools, as a way to do this there is risk that the facilitation team critically fall into a role of "liberated pedagogues" (Bowers et al. 2005) imposing 'emancipatory' methods.

What confuses this analysis of power, however, is the different roles that members of the facilitation team played alongside their positionality of 'management'. As described in Chapter 3, the Conversations happened at a time when the centre had little funding or resources, and so there was a general 'mucking in' to maintain the building and run events and social programmes. The facilitation team worked voluntarily in, for instance, improving the infrastructure, cooking, cleaning, organising events, and building community partnerships. Thus, the facilitation team were also insiders to the weekly running of the space from different perspectives, experiencing something that they wanted to change together: namely to create equitable, democratic decision-making. At a time when people were doing all sorts of work with minimal resources, the facilitation team came together to contribute to the development of the hub around a shared motivation and interest. In aiming to support a more democratic culture at WLHC we had discussions in the facilitation team about the roles we were taking, as reflected by Deirdre who relayed in contributing in the small group work in the first workshop that she was conscious about her own voice dominating or inadvertently influencing the direction of outcomes (Field, Logan and Woods 2019, personal notes). The proposal of the *Conversations* also came with the backdrop of supportive relationships having be made and strengthened across the hub's community through the collective 'mucking in', placing the process in a web of relationships that are not just defined by management member and non-management member binaries. These relationships and their qualities are explored further in section 5.4 as a vital underpinning for food democracy.

With the vast majority of volunteers and workers attending the sessions, this also reflects an interest in the topic and method of discussion. This was highlighted when the group were asked if there was anything important missing from the emerging food values at Workshop 1, when a participant who so far had hardly spoken said, "It's kind of what we're doing here now but it's not written down just like decision-making, democracy, consensus and this kind of thing" (Workshop 1 participant 2018). Another participant followed up with, "Food democracy!" (Workshop 1 participant 2018), with sounds of approval from the rest of the group. The moment highlights how: there was desire for food democracy within the group in actually naming it, that the process had democratic features for the participant, and to some extent embodied this value whereby a quieter member of the group was able to express their desire or need in the collective space. So while analysis of power in the generation of the food policy enquiry shows a top-down process led by members of the management group, the positionalities of the facilitation team confuse this, as well as the relationships built in previous months, with participants stating that the process had democratic qualities that should continue to be strengthened.

A practical step to challenge the power dynamics of decision-making held within the unelected management consortium, and extended into the facilitation team, would have been to make opportunities for non-management community members to be more heavily involved in decisions, to work 'behind the scenes', and ultimately to open up participation in the facilitation team. Of course, people might not have wanted to be involved in this work but democratising key decisions, beyond members of the consortium management group, would have met facilitation team values and improved the enquiry's democratic qualities. Such an approach would have integrated different perspectives into the decision-making process of enquiry design beyond member-checking and workshop discussions. Such an integrated facilitation team of management and non-management members, combined with increased in-depth member-checking in designing the enquiry, could have supported a more democratic, mutual agreement of, "protocols and pedagogies based on horizontalism to pre-empt the emergence of exploitative hierarchies" (Anderson et al. 2018). And the network at WLHC could have been strengthened with opportunities for political learning to be applied in leadership:

"By providing opportunities for learners to begin to provide active input and leadership in organizations (rather than only provide instrumental input or token involvement) through applying their political learning in organising campaigns or becoming facilitator-teachers in learning initiatives, these networks can be expanded and strengthened" (Anderson et al. 2018)(Anderson et al. 2018).

This deepening of democracy would require more time and resources to work towards more equitable participation. Both were already limited, and the latter was just enough with two failed funding bids creating a reliance on my PhD time and expenses to make up for this. In summary, the enquiry highlighted that opportunities for **democratic leadership**, in the design and planning of processes, is important to create a transformative agroecological learning framework (TALF) in which horizontalism is embedded from the outset.

In terms of what democratic leadership means, learnings from the enquiry point to three suggestions. Firstly, democracy means opportunity for stakeholders – beyond management in the WLHC case – which could be people connected and involved with the space geographically or actively, whether a volunteer, enterprise worker, local resident, or young people attending activities. Secondly, *democratic* leadership can mean in terms of broader social positionality and experience within the territory of the space. For example, in evaluating how the leadership of the process shaped participation in the *Conversations*, Yvonne reflected that, "The process actively engaged a culturally diverse group of participants which reflected the local community. Our team of two black women and one white male seemed to offer a broader message that this was designed to be an inclusive process" (Field, Logan and Woods 2019, personal notes). This is an important point, since planning literature often underrepresents spaces that are deliberately designed around heterogenous cultural perspectives and fails to acknowledge difference between social experiences in working towards culturally inclusive spaces (Kumar and Martin 2004).

A third consideration is that in the verbal feedback section at the end of Workshop 3, one participant said, "One more suggestion is, would it be good to possibly get the younger generation to see this and get some feedback from them?" This suggestion came about because only one person under 20 years was present. Yvonne later reflected on this:

"Practical hands-on activities allowed for inter-generational participation, sharing and learning. Our youngest participant was seven years old, accompanying his mother. However, the timing of the workshop sessions, use of social media for conveying young people friendly messages, the use of more creative processes and outreach to local schools- could have increased the engagement of young people" (Field, Logan and Woods 2019, personal notes).

After Workshop 2 Yvonne also shared that despite the general popularity of the community mapping stall that she had unsuccessfully encouraged two older Caribbean women to participate, and that it felt like a lost opportunity to document some of the food stories from members of the Windrush generation (Field, Logan and Woods 2019, personal notes). This led us to reflect whether our approach was a useful way to engage with older people who were unfamiliar with the process and space. As urban gardens are excellent sites for intergenerational learning (Della Valle and Corsani 2010) the *Conversations* could have enabled this to greater degree. With the hub potentially being awarded a 25-year lease, the centring of young people's voices in the initial food policy was an overlooked dynamic as these will be the people of future years potentially involved in the centre.

Therefore, a learning from the enquiry is to build in opportunities for **democratic and intergenerational leadership** in design and implementation of knowledge enquiries, thus supporting horizontalism and quality of learning.

This principle connects with encouraging discussion of practical knowledge so as to generate intercultural contact zones in the leadership, design and implementation of learning processes. This contrasts with Prost's (2019) suggestion of engaging in a tactic of careful language to build community interest in alternative food systems (based on food democracy research at a UK food hub). My argument is that food democracy should be rooted in horizontalism from the beginning of learning and community processes, within the available resources, so as to build 'power with', rather than careful language which suggests a knowledge deficit and risks cementing a charitable 'power for' others. This critical learning from the *Conversations* can be applied to the management consortium itself, for example by appointing a young people's representative on the board. This point also connects with the LGWC enquiry, in terms of opening up the co-operative decision-making structure beyond 'worker' identities and broadening democratic participation in the leadership, structures and strategies of the organisation (see Chapter 6).

I now introduce a final critical reflection of the enquiry, concerning the use of the English language in workshops. In the cooking activity of Workshop 3 the recipe was shown practically, thus reducing reliance on the use of the English language, but the latter part of the workshop, held in with small groups and summarising a food principle based on food value clusters, gave a literary focus on the English language. This gave power to the written word and also to people more confident in writing, reading, and speaking in English. In the feedback at the end of Workshop 3 one participant said: "I think it's beautiful and lovely to see everyone come together to discuss what they think with just words, it opens so many conversations" (Workshop 3 participant 2019). the vocal feedback in a group of 20 people did not necessarily provide a way to express a different opinion, and no one spoke to us afterwards about this issue. Considering that over 180 languages are spoken in Haringey and that 30% of Haringey residents do not speak English as their main language (Haringev council 2019), in creating an equitable space for knowledge exchange across different cultural backgrounds, the final and key stage of the process in writing up principles could have been less centred on writing English sentences. Popular education tools could be helpful here such as theatre techniques building images from the values (Boal 2002) as building blocks of sentences, or translation methods across languages. Therefore, alongside finding that creative popular education can support key pillars of a TALF in Europe, the enquiry finds that integration of methods that support equitable use of language, with democratic and intergenerational leadership in design of learning processes, can support horizontalism and ultimately deepen food democracy.

I now introduce a theme that emerged from the PE tools, namely, **holistic approaches to food and health** in relation to generating community self-definitions that challenge 'bringing good food to others'.

5.2 Community definitions of health and holistic food beyond the 'missionary complex'

One of the aims of setting up a food hub at WLHC, according to the founder, Organiclea (2017), was to establish, "a centre for promoting healthy eating" that, "grows and distributes sustainably produced food to local residents and businesses". What 'healthy' meant at the centre was not defined until the suggestion that the management consortium would write a food policy for the hub. This section reflects on what the *Conversations* uncovered through popular education techniques concerning food and health, as an attempt at creating community self-definitions.

A strong theme in the workshops, supported by the PE methods, was a holistic approach to food as integrated in cycles of life, culture, health, and community-building. One participant in Workshop 1 encapsulated participants' perception of 'healing' as an important feature of food and community:

"We had healing as an overarching thing that was quite a strong theme for us because whether it be the food you put into your body that can promote healing and that kind of thing or if its physically working and connection that this space brings. All of that are aspects of healing – being around plants, being in a community space is really healing drawing people together" (Workshop 1 participant 2018).

All elements of the food cycle were connected together by another participant at the same workshop:

"And it's all about, as Amin said, the birthing process and the start of life. So, it's about the importance of the soil that you grow the seeds in. Just the actual seed sowing and it what it turns into. Rows of new life, how colourful they are and the order of them and just planting out and measuring. This about eating together so we've got the picture of us about eating together" (Workshop 1 participant 2018).

In Workshop 3 the food cycle was a strong theme, as participants contributed food values of how life and death are connected in the food cycle, and how respectful, mutually supportive relationships between humans and plants can lead to good health and life-force:

"What we did, we tried to put all the posts in a way as a circle of life. And what we found difficult was what comes first" the chicken or the egg. So what we done was put it as.. so a circle of life" (Workshop 1 participant 2018). "The circle of life is birthing, growth, the process of regeneration and respect leads to the relationship between plant life and human life, and this leads to good health and source of energy" (Workshop 3 participant 2019).

"Basically, ours naturally fell into a cycle of going from growth and conception all the way to cooking and eating. Ours has ended up as a circle. Yeh, it just naturally felt like that." (Workshop 3 participant 2019).

"But it is a cycle, I mean that was what we were talking about with the compost. You know you start with the compost and you end with the compost" (Workshop 1 participant).

Numerous photographs in the photovoice exercise were of plants and green spaces in the city (see Figure 36 below) in response to the **food-related** questions, reflecting the holistic connection that emerged in the workshops with food and humans as part of natural life-cycles.





Figure 36: Participants' photographs of plants and green spaces as part of the LGWC photovoice exercise

This emergent theme from the *Conversations* reflects agroeocology perspectives of whole system thinking and holism between living beings (see section 2.2). The discussions of foodways in the workshops outlined symbiotic approaches with nature and respect for life-cycles, as is echoed in Antonio Gonzales's (from MAELE – the Agroecological Movement of Latin America - and indigenous peasant from Guatemala) description of agroecology as being able to, "ensure sustainability and biodiversity. Biodiversity for us is the beginning and the end of life, of cultures and of peoples" (Anderson et al. 2015). Responsibility and respect were discussed in relation to human interaction with land for growing food, and tension between human need and non-human life, as shown in the participant extracts below:

"These are about nature. Trees and the tension between trees and people and how we take over the land for food-growing and our responsibility for that" (Workshop 1 participant 2018).

"So, the things that connect are sharing foods and knowledges, conversations and community. Respecting the processes like composting, seed sowing, planting. And the tensions between nature, food growing and human necessities." (Workshop 1 participant 2018).

The holistic socio-nature perspectives around food in the *Conversations* (Alkon 2013) highlight relationships and understandings with nature that begin to transcend logics of financial production through human solidarities and deeper relations with the earth, that move UAGC towards a radical process of social transformation (Prizendt 2017). Making space within agroecological initiatives for building on these more-than-human solidarities (Tornaghi and Dehaene 2019) is explored further in

the LGWC enquiry in the theme of 'learning and listening with the land'.

Another feature of the holistic approach to food in the *Conversations* was on the specific topic of health. During Workshop 1 the issue of health was raised by a participant: "What about unhealthy food? I mean we're about healthy food, but a lot of people eat unhealthy food; should we bring that to people's attention, what is the difference between healthy and unhealthy?" This section of the focus group came up unexpectedly, drawing attention to the issues of meat and of cake, relating each to health and to the environment. On the topic of meat one participant said:

"Is it something that if you look at the community there's all these places where you can get meat available. But are we as we're promoting veg are we excluding parts of the community? Who'd be put off by ah no it's just a vegan/vegetarian thing" (Workshop 1 participant 2018).

And a participant raised the relationship of meat-eating to ecological values:

"But then there's lots of environmental issues - the environment is a big issue at the moment and it would be nice not to eat [meat] as much. Maybe this is a place where people can learn about ... because some people eat it three times a day and we can't sustain it" (Workshop 1 participant 2018).

To which Deirdre added, "Which links back to health, because you don't need to eat meat three times a day."

Another participant suggested WLHC as an educational space on this topic:

"...or even if people wanted to eat meat they could learn here how to eat sustainable meat and the rest of it...because some people need meat because of their blood group" (Workshop 1 participant 2018).

Meat had been raised as a question in the consortium management group when meat had been sold at community markets and was a live issue in relation to agreeing collective foodways, especially as the lead founder, Organiclea, does not sell meat through their business. At Workshop 2, six out of 21 foods noted on the community map exercise involved meat or fish, emphasising how meat dishes were part of people's food cultures. We agreed to hold over the discussion of meat for future collective exploration, and it was noted in the graphic harvest by the artist, Drew Sinclair, as a key theme (Figure 37). In Workshop 3 meat was not explicitly mentioned in any of the food principles generated, although Principle 7 perhaps implies an approach to inform future decisions: "7. We value and respect the cycle of life as an interconnected, regenerative relationship leading to positive health and wellbeing for all life forms" (Food for thought; towards food principles at Wolves Lane 2019).



Figure 37: Section of graphic harvest highlighting a key question of "How do we feel about Meat?" at Workshop 1 (Credit: Drew Sinclair)

In relation to health, the issue of cake was also discussed. One participant reflected on emerging food values, "There's no cake there!" Deirdre replied that, "For me cake represents celebration, and that's celebration of life", to which another participant agreed: "A little bit of joy and enjoying it, it's always healthy" (Workshop 1 participant 2018). Despite these considerations of joy and celebration, another participant was of the opinion that, "I think it's not healthy" (Workshop 1 participant 2018). This highlights the participants' ability to listen to each other and to share their own, at times, differing perspectives. A holistic approach to health was summarised by one participant at Workshop 3: "I was going to put let food be your medicine." (Workshop 3 participant 2019). This approach to foodways combined with the group's social and cultural values, such as "memory", "family", "joy", "celebration" and "community" (Workshop 1 transcript 2018), reflect an agroecological approach beyond silo thinking, and enabling of a strategy that links food to the economy, ecology, and public health (Anderson et al. 2019, Altieri and Toledo 2011).

The *Conversations* highlighted the complexities and connections between food and health and served as reminder that who defines what is healthy shapes the culture or foodways of an alternative food network. The way food and health are defined has potential to bring different people together in *diálogo de saberes* or exclude and reinforce social hierarchy to varying degrees. In this case the creative popular education methods, being an attempt at co-generating understandings of food and health, highlighted different dimensions (i.e. social, cultural, part of life cycles) and the potential of food as 'healing' within the food hub as a boundary space between different peoples coming into dialogue. Such dialogues as those about meat and cake were not necessarily resolved but exist between different principles generated as an ongoing point of learning and understanding.

The difference between imposition of 'good food' values and community generation of understandings of food and health is highlighted in the relationship between WLHC food principles, "8. We value food and avoid waste" and the previously mentioned, "7. We value and respect the cycle of life as an interconnected, regenerative relationship leading to positive health and wellbeing for all life forms" (Food for thought; towards food principles at Wolves Lane 2019). In combination these beg the question: why you would waste food if you valued the process it's been through, as collectively acknowledged, to arrive in contact with you? This challenges moralising top-down approaches of 'Food waste is bad', for example, while community selfdefinitions of foodways, sustainability and health allow for praxis to be developed through consciousness-raising and collective action through dialogue. The strength of agroecological themes in the workshops show that there were already agroecological perspectives and principles in people's ontologies and epistemologies of food and the city, namely that urban agroecology is being practiced without it being called that, just as agroecology was being practiced before it was labelled as agroecology (Altieri and Holt-Giménez 2016).

In connection with the section 5.1, creative popular education supported building *from* these existing agroecological perspectives, rather than imposing notions on processes, and as shown in the *Conversations*, you don't know what will emerge as important until engaging in democratic process. This perspective of communities defining food and health for themselves as part of community empowerment is reflected in a word-frequency analysis, or 'wordle', of the transcript at Workshop 1 (Figure 38). The keywords highlighted could form a sentence such as, 'people know community food [when they] think together.' This finding in the enquiry challenges 'bringing good food to others' (Guthman 2008), by questioning assumptions about what people know and what knowledge is valuable, and by stressing that defining 'good food' is done through community process.



Figure 38: Word frequency of WLHC Workshop 1 transcript

The Conversations, through generating community understandings of food and health based on people's everyday experiences, challenged hierarchical and class-based definitions of 'good food' by working towards, "collective, local responsibility over health and nutrient flows that can help to mend the metabolic rift" (Dehaene et al. 2016). This stresses the importance of different positionalities within the food cycle, including non-producers, taking responsibility in urban agroecology processes, as found in a 'reverse CSA' in Chicago, USA, with, "the eaters determining what they want to eat. And they're creating a system to support that ... that way I only have to get what it is that my community recognises they need" (Figueroa 2015). In summary, the Conversations highlight how working towards community definitions of food and health can support the emergence of existing agroecological knowledge, through collective consciousness-raising in dialogue, thus challenging inequitable missionary complexes (Slocum 2006). By forming democratic processes open to holistic understandings of food, this can support the development of urban agroecology in reality, as is seen in the development of the WLHC food policy; it can also work towards building network cultures with practical examples to shift 'bringing good food to others' at territory policy level. Building on the holistic, whole-system approach to food outlined in this section, I now present findings on the translocality of foodways that emerged in the Conversations in regard to the 'local trap', and tension in how this relates with ecological values also present in the enquiry dialogues.

5.3 Translocal foodways, embedding anti-oppression frameworks and breaking out of the 'local trap' – 3,563

In acknowledging the limitations and sometimes exclusionary connotations of 'local' food (see section 2.4.3), a motivation for the facilitation team was to contextualise what local and sustainable meant, through participatory methods in relation to different values that might arise in the process (Levkoe 2011). The community food map showed foods from all over the world, most from outside the UK and Europe (see Table 3). Furthermore, some foods were eaten in the UK, and imported from other parts of the world such as mangoes from India. The community food map begins to highlight some of the stories of people present at WLHC that relate to food and culture (see Figure 39).

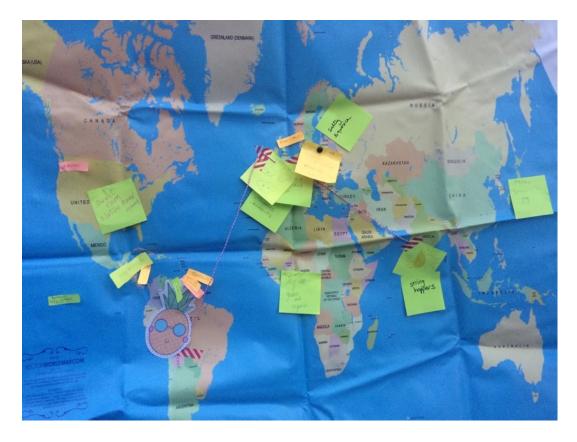


Figure 39: Community food map (WLHC Workshop 2, December 2018)

Food	Place
Bananas	Latin America

Cacao	Trinidad
Cassava Bread	Venezuela
Curry crab and dumplings	Tobago
Fish and Chips	UK
Jolof rice	Senegal, Ghana and Nigeria
Lemon and Chill Kale soup	UK (Imported: Lemon – Mediterranean, Chilli - Latin America / Caribbean)
Mangoes	UK (Imported from India)
Nachos	USA
Oranges, Olives, tomatoes, chestnuts	Spain
Pepperpot (game, cassareep, chillis)	Venezuela
Pierogi	Poland
Pineapples	Latin America
Plantains	St Lucia
Potatoes	Ireland (originally from Peru)
Potatoes, cabbage, dumplings	Poland
Potatoes	Ireland (originally from Peru)
Salty liquorice	Finland
Steamed fish	Jamaica

String hoppers	India
Sushi	Japan
Sweetcorn	USA (Native American)

Table 3: Results from the community mapping exercise in response to the question: *What foods do your friends or family eat or may have eaten in the UK or countries of origin?* (In alphabetical order of food)

The foods from all over the world reflect that Haringey borough, where WLHC is situated, is very ethnically diverse in its population (see chapter 3). If the community map hadn't shown recipes and foods from all over the world, it would have suggested that the community market was attracting a narrow segment of Haringey's communities, or that the mapping tool was ineffective in engaging the different people that visited the event. That is not to say that the map was entirely representative of the borough's population, but it did go some way to reflect the different food cultures of the surrounding area.

Through the workshops there were strong expressions of food embodying culture and a desire to build "community connections" through "learning with diverse cultures" (Workshop 1 flipchart notes 2018). The stories that food carries and enable to be told is reflected in this quote from a participant at workshop 3:

"We kept coming back to the idea around through the use of cooking and communal cooking and how through that you can learn and discover things about each other not necessarily centred around cooking and how that can bring communities together: different cultures, backgrounds, generations." (Workshop 3 participant 2019).

In written reflections after the *Conversations*, Deirdre highlights how food and culture are connected across places from her own experiences:

"Spending my late childhood and teens in Trinidad and Tobago, with a farming father and family members in various food professions from bakers to chefs, or experiencing the multicultural foodways and traditions, I have always been fully immersed in the multiple dimensions of food. Even as a young child growing up in London my memories are of food, and how the preparation and consumption of these traditional foods maintained cultural heritage and built community within the diaspora" (Field, Logan and Woods, Logan, personal notes).

Through the *Conversations* and in writing this section I have reflected on growing up with foods that my grandparents would bring back to London after trips home to Ireland, whether it was Kimberly biscuits or Tayto crisps; these foods and tastes connected with the photographs and paintings on the walls of their home and with the stories we heard growing up. It's also in the plate of food when I sit at my grandparents' table with potato cooked three ways and, on occasion, cabbage and butter by its side. At an Irish music session in North London a few years ago, the pub sent round triangle-cut sandwiches on aluminium trays, and as I took a cheese-and-onion mix triangle I remembered doing the same as a child at Irish dances in Croydon. These foods and places connect across each other to contribute to a sense of family, identity, community and memory.

In combination, the descriptions of memory and culture by participants in relation to food (see section 5.1), the community food map, and participants' desire to learn about each other's cultures and backgrounds through food, shows that trans-local stories (see section 2.4.3) are present in the community around WLHC and through the popular education processes they began to be expressed. Therefore, in designing a food policy that reflected local foodways we discovered an array of foods with origins around the world. The foods cooked and grown in the surrounding area, shown on the map and discussed in the workshops, are in effect local to the food hub (Valiente-Neighbours 2012). Importantly, the connection between the building of community at the hub with the sharing of food practices from diverse cultures offers conditions for a reflexive translocality to be embedded in the culture of the WLHC. In reflection of the map and the expression of diverse diaportic foodways through the *Conversations*, these are specifically mentioned in the food principles: "9. Sourcing and growing healthy, nutritious and affordable food that embraces the food ways of diverse diaspora communities" (Food for thought; towards food principles at Wolves Lane 2019). When one of the foods listed on the food map was introduced, with the recipe's Polish background, by a Ubele worker at Workshop 3, the Conversations began to embody the desire to build community through sharing translocal food stories.

By engaging in cultural place-making through the centring of culturally-appropriate and translocal foods, these began to be written into the foodways of the centre, the land and the local landscape (Mares and Peña 2011, Agyeman 2013). This approach is held in the principle from the *Conversations:* "2. We believe food brings together diverse communities, cultures and generations through exchange of old and new knowledge, skills and ways of growing and preparing food" (Food for thought; towards food principles at Wolves Lane 2019). As foodways are fundamental to individual and collective identities and cultural histories, the cooking session, community food map and food principles 2 and 9 begin to embed these, acknowledging that their location is as important as their expression (Agyeman 2013: 69). Therefore, the *Conversations,* in which participants focus on diverse food cultures and knowledges from the locality in an emerging *diálogo de saberes,* takes a step out of the 'local trap' and towards a more socially transformative politics. A tension with the centring of culturally appropriate and translocal foods, however, was how these principles relate to emergent ecological values if the foods cannot be grown, even in small quantities, in the UK.

At the end of workshop 3, where participants were sharing their final reflections, one participant said:

"Well, for me personally where my food comes from is very important. I always look at the label and I want to know where it's come from. Because if it's come from the UK then it's much more likely to be seasonal and it hasn't travelled so far. So, for me you know that really is the most important thing" (Workshop 1 participant 2018).

This quote reflects a priority value of short food miles and locally *produced* food. When participants were asked if eating seasonal foods just meant eating kale in the winter one person said: "It really narrows down your food choices" (Workshop 1 participant 2018). This second quote highlights how a focus on 'local food' as locally grown can narrow the foodways of a project, excluding from the narrative foods produced outside the UK that relate to expressions of culture and identity. The first quote prioritises food grown in the UK as environmentally sound as the key narrative, and in effect de-prioritises other elements of food considerations raised through the workshops such as affordability, food access, and culturally appropriate foods. This attitude reflects the 'local trap' (Born and Purcell 2006). In discussing practical steps to enable culturally appropriate food values and ecological elements of sustainability to work together, there were suggestions of allocating resources at the centre towards this: "Maybe one of the glasshouses should be heated and so we can grow food normally grown abroad?" (Workshop 1 participant 2018). This was met with some support, with a participant replying:

"Yeh the carob - so maybe that could be something for the middle one [glasshouse] because it gets very hot in there - where the rainforest was maybe we should think about having a specialist way to show people how they can grow more unusual foods instead of importing them all from abroad – to cut down on the eco thing" (Workshop 1 participant 2018).

As regards to the impacts of importing food or not, another perspective was raised in Workshop 3, highlighting the impact of consumer demands in the UK on growers and land in other parts of the world:

"We discussed that on our table as well about – that's why we put about be considerate about the food growers around the world because for example superfoods and we get really carried away – we want superfoods for ourselves and some growers, for example avocado in Peru, there are serious water shortages because we want avocado here, so we have to be very careful about what we want in that sense as well" (Workshop 3 participant).

This global thinking and solidarity with food growers created a group statement in the workshop that became a principle for WLHC: "Taking into consideration that our food habits do not have an adverse impact on food growers around the world" (Workshop 3 flipchart notes 2019). This contribution in the workshop, as situated in the territory of London as a 'world city', highlights how consumer demands, tastes and decisions as shaped by trade deals and advertising, have impacts beyond London as a 'place'. The principle that evolved in discussions asks that decisions at WLHC consider this dynamic in how food is grown, cooked, eaten and sold at the centre, responding to Massey's (2007: 15) question, "If the economic sectors upon which the local economy of a place is founded entail unequal relations with elsewhere, with other places, how can this be acknowledged?" Considering this principle, the impact of shunning imported goods through organic and fair-trade schemes as part of the local food narrative has impacted growers' livelihoods in the Global South as they are exposed to the exploitative characteristics of the dominant food system as a consequence (Mosely 2007). This is not to say that 'fair trade' is always fair, just and equitable towards growers, but more to highlight that trade between territories also has potential to support farmers' livelihoods in solidarity, economies, and agroecologies beyond 'place', while also encouraging culturally appropriate foodways. An initiative that has commonalities with this suggestion is the Zapatista coffee that is sold by solidarity groups to support worker co-operatives in the Zapatista zone (Active Distribution n.d.).

The Conversations did not resolve the tension between living within ecological means and recognising the importance of food as part of local cultures; the tension has, rather, been opened up for dialogue as to future possibilities. The nature of this PhD is such that the next steps cannot be reported on, although connotations may be discussed. As well as the principle, mentioned above, concerning diverse diasporic foodways, another principle included was: "10. We aim to source foods from localised systems as much as possible" (Food for thought; towards food principles at Wolves Lane 2019). The tension between these two can frame future decision-making and dialogue, while eschewing a flat-line 'local food' towards developing localised food systems that aim to generate affordable, culturally appropriate foods for all (Levkoe 2011, Goodman et al 2012). The principles aim to embrace the possibilities of translocalism in celebrating cultural diversity as much as biodiversity (Agyeman 2013), and thus to emphasise local foods as much as possible. Such an approach engages with a framework of 'just sustainabilities' (Agyeman 2013) in attempting to connect environmental sustainability, social justice and community health, in an emerging food democracy at the food hub; a challenge faced by civic food networks in general (Prost 2019). Considering the centring of dialogues around translocal food practices to build community in the *Conversations,* and this being in tension with ecological values as part of an emerging 'just sustainability' at the food hub, in the next section I outline reflections on how these transformative roots and cultures might sustain in breaking out of the 'local trap'.

5.3.1 Supporting deep democratic cultures with anti-oppression politics

The importance of centring translocal and culturally appropriate foodways in an ethnically diverse

territory is highlighted in Yvonne's reflection in facilitation team discussions post-Conversations:

"New community led spaces can quickly become the domain of the group that secures it, who then erect invisible barriers acting as gatekeepers. A critical awareness and analysis of this dynamic and how race, gender and class intersect as social and racial cleansing, does not just happen by default, but is a clear outcome of systemic exclusion" (Field, Logan and Woods, 2019, personal notes).

This reflects that wider social contexts, together with informal and formal power, shape any governance system (Anderson et al. 2019), and in the context of Global North food movement food discourses these can reproduce white, middle-class subjectivities ignoring race, class, gender and colonial legacies (Alkon & Agyeman 2011). In contextualising the emergence of translocal food practices as a critical feature of the *Conversations*, this is set within a dominant culture of a 'hostile environment' in the UK, and 'everyday bordering' in 'super-diverse' London (Berg 2019, Yuval-Davis et al. 2017), reflecting broader UK dynamics around injustice at the intersection of race and class (Runnymede 2017) (see section 2.5). As Woods (2019) notes, the policy measures contributing to a hostile environment, "can only be seen as modern British imperialism, where the overarching political, social and economic systems of domination are white, normative and/or supremacist" and where, "race, ethnicity, gender and 'othering' are the tools of colonizing bodies, and ways of being and knowing". Therefore, the embedded approach of building community through solidaristic dialogue of practices, and centring translocal and culturally appropriate foodways at WLHC, can support an urban agroecology embedded with *diálogo de saberes* as a way to challenge dominant white, colonial cultures linked to food injustice and beyond.

As a backdrop to the emergence of translocality in the *Conversations*, Yvonne shared in a magazine interview, "I think one of the things about Wolves Lane that is different is that it is not a white space. It's a space for everyone. And people notice..." before going on to say, "We have co-developed this culture and created an open engaging space. You will find all sorts of people at the centre. At the same time, we have to continuously keep on defending this culture and intention" (Gamauf 2019: 37). Whilst acknowledging that the legal structure of a food hub often influences its operation and function, particularly in such areas as capital investment and risk management (Berti and Mulligan 2016), I would also emphasise that organisational structures shape cultures through the way these are set up. Because democratically-shaped institutions can support the conditions of self-governance (Buchanan 2019), and "the importance of democratic formal and informal institutions to promote equity in agroecological transformations cannot be underestimated" (Anderson et al. 2019: 14), the organisational structures of groups and institutions can support the development of transformative cultures. If we understand 'culture' to be relational (Clifford 1986: 15), then the question arises, in terms of developing a deep and just democracy as part of urban

agroecology: how might a transformative culture be supported by organisational structures so as to enable the embedding of culturally appropriate and translocal foodways at WLHC?

An example of defending and generating a transformative culture comes up later in the same interview with Yvonne, concerning how a threat of loss of space led to a POC-led growers group being set up:

"Yvonne refers to a recent incident when an organisation was invited to take over parts of the growing fields. The decision put the employment status of two black food growers at risk. Yvonne and the Ubele team intervened and working closely with the growers, the team set up a new POC-led growers movement at the site. Black Rootz are now an integral part of the Wolves Lane community centre" (Gamauf 2019: 37).

The situation and action taken to set up a new group at the centre, in response to two black foodgrowers having their employment status put at risk, highlights how anti-racist and anti-oppression action is not something that is to be brought out every now and again, but needs to be embedded into organisational structures in support of ongoing deep democratic cultures that confront inequities in power and resources. As Maughan et al. (2020) suggest, that in considering the racisms and inequities laid bare by Black Lives Matter mobilisations in recent years, it is entirely clear that policy makers must intensify commitments to centering anti-racism and food justice in their work. This is relevant from national government (where their study is set) to community scale policymaking, i.e. an emerging food hub. Anti-oppression approaches to social inequality and inequity include anti-racism and feminism, with structural and critical approaches, to rebuild existing systems so that everyone shares the benefits and opportunities of the system (Springtide Resources 2008). These characteristics reflect political agroecology principles (see section 2.2). In terms of developing UAGC with deep food democracy at WLHC, where there is an opportunity for long-term development of a community space, Anderson et al. (2019) warn that, when there is agency for community self-organisation, if intersections of inequities are not confronted then who profits from this upturn in agency will follow dominant forms of power. An organisational commitment, therefore, to "anti-oppression by which movements educate themselves to understand how their internal cultures and practices might be oppressive, exclusive or exploitative" (Haiven and Khasnabish: 140) can support equitable allocation time, space and resources to nourish the Conversations in support of surfacing diálogo de saberes and centring of translocal food cultures. An embedding of anti-oppression politics opens up responses to historical and structural injustices - as essential preconditions of food sovereignty and agroecology - rather than an 'additive property to a sustainable food system' (Patel 2009; Figueroa 2015).

In the USA anti-oppression politics has been present within food movement and research material to a greater degree than in the UK (Sbicca 2012), and was recently identified as a key revolutionary

element in working towards transformative food system change as part of urban agroecology (Siegner et al. 2019: 588). Beth Stewart, a London food grower, found that after a research visit to food projects the USA:

> "Our relationship with systemic oppression lies at the centre of who we tell stories about in our movements, who we train and support into leadership positions, who we employ vs. who volunteers, and where power lies and gathers in our organisations. Without questioning and opposing norms in relation to these factors, we end up with movements that recreate some of the systemic oppression of wider society and the mainstream food system we seek to change" (Stewart 2019).

In supporting a deep and just food democracy at WLHC, in the context of a hostile environment and recreation of social injustices in food movement spaces (Woods 2019), an anti-oppression framework provides a, "multi-lens approach that recognizes the diversity of cultural experiences and histories involved" (Agyeman 2013: 72). This holistic and multitudinal approach is in keeping with food principles that emerged in the *Conversations*. Woods (2019) highlights intersectional feminism and de-coloniality as frames to support analysis in identifying and challenging oppressive power in working towards socially just food systems in the UK. In terms of the tension between culturally-appropriate foods reflective of local foodways and ecological concerns with the importing of foods, as highlighted in the previous section, an embedded anti-oppression framework supports discussions aimed at retaining holistic understandings of food beyond the fetishisation of local food miles, and from slipping into parochial sentiments of the 'local trap'.

In this section I highlighted the emergence of translocal food cultures through popular education methods in the enquiry, and how participants emphasised the importance of dialogue in culturally appropriate food practices as a way to build community. This challenges 'local trap' inclinations sometimes present in food movements, by identifying and building a food culture at the centre which promotes translocal foods as local foods and works towards a localised food system. In terms of supporting and defending a transformative culture that underpins a burgeoning diálogo de saberes, centring local and translocal foodways, an embedded anti-oppression framework is to be encouraged in organisational structures. In the light of translocal foodways identified in the enquiry, within the context of the 'hostile environment' in the UK and re-embedding of social injustices in food movement spaces, this suggestion as part of building deep and just food democracy at the food hub, "is a pragmatic - not a utopic orientation" (McIvor and Hale 2015). Importantly, the framework can support engagement in the tension that arose between values concerning culturallyappropriate foods and ecological considerations of food miles, with holistic understandings of food towards developing a "just sustainability" (Agyeman 2013). In continuing to aim to understand how transformative cultures can support deep food democracy I now introduce a theme of the Conversations which emphasises the foundational importance of relationships.

5.4 Transformative cultures, relationships and 'critical lovingness'

In this section I highlight how relationships are foundational for deep democratic cultures and urban agroecology before outlining a suggestion that organisational structures can support transformative relationships by embodying a 'critical lovingness'. I begin by reflecting on how existing relationships of care and support enabled the *Conversations* to go to personal places of family, memory and culture.

As previously referred to in section 5.1.2, in the months prior to the *Conversations* people had come together with very little funding to fix up the centre, to start running social programmes, grow food, and run events and open days so that the space was open to the public. Through this a community spirit emerged, with people getting to know each other through a shared care for the community. I certainly feel like I made friends in this time and have a lot of respect for the way people showed so much care and dedication with little resources to give love to a community space. So, before the enquiry began there was already a willingness to work and pull together within the community at the centre. This was shown when a participant gave written feedback about why they came to the workshops, "I was asked to attend and wanted to support whatever you were doing" (Workshop 3 participant 2019). One element of relationship and community-building that was shown in the *Conversations* was the appreciation and acknowledgement of people and the work they put in. Workshop 3 was a rare opportunity for so many people to be in a collective forum at the centre, and at the end of the focus group there were broader reflections about how people were working together. As facilitator, Yvonne shared:

"Yeh, I think Wolves Lane site has been really led by fantastic leadership people have just stepped up, you know everybody here - there's nobody here that's paid to run Wolves Lane - nobody. But we've also had some people that have stepped into leadership and of course Ariana has been absolutely especially on the volunteer side has been an absolute anchor and we really appreciate and love her" (Yvonne 2019).

As the conversation continued one participant said explicitly, "And I think we should also acknowledge each other" (Workshop 3 participant 2019), while another added, "Absolutely – everybody" (Workshop 3 participant). Such exchanges highlight the culture of relationships that had kept the centre going in the first couple of years, with minimal resources and paid work, and exemplify, "the small acts and kind words" (Horton and Kraftl 2009) that are difficult to quantify but essential in relationship-development within community building.

The pre-existing relationships with those attending the workshops meant that at times the sessions could become self-faciliatory, with participants taking ownership of the *Conversations*, noticing key topics, asking questions of the group or looking for commonalities. This is shown in the

introduction of meat-eating on site, with one participant asking, "Well, I suppose there's one glaring [thing] on this sheet – that's meat. Is that an issue?" (Workshop 1 participant 2018), and in a later discussion, "we could have chickens here and produce eggs, goats – milk – is that acceptable to people?" (Workshop 1 participant 2018). The *Conversations* showed, therefore, how relationships at the hub supported democratic qualities to emerge, with dialogue and listening encouraged and appreciation of people's work celebrated.

One principle that emerged from participants' was, "We aim to create a healthy, growing, food community with integrity" (Food for thought; towards food principles at Wolves Lane 2019), with a participant expanding on this to say, "growing, as in food growing as well as community growing" (Workshop 3 participant 2019). Within this commitment to growing community was building relationships. As described in section 5.3 a *way* to do this was through dialogue of culturally appropriate food practices, and in this section, I focus on the *qualities of relationships* that were identified through the enquiry. "Love" came up numerous times and also "respect" and "healing" (see Figure 40 below). One participant fed back in Workshop 1, "that was a big part - there was love in all the pictures we had" (Workshop 1 participant 2018). And as part of the theme of "healing", referred to in section 5.2 as part of a holistic approach to food and health, this is also related to building community as shown in the quote, "All of that are aspects of healing: being around plants, being in a community space is really healing, drawing people together. Yeh - companionship" (Workshop 1 Participant).



Figure 40: Cut outs from the LGWC Workshop 1 graphic harvest and flipchart notes highlighting different relationship characteristics

In regard to developing understandings of food democracy and urban agroecology, these characteristics of relationships interact with academic discourses in different ways. Young's (2011: 51) definition of respect is helpful here: "To treat people with respect is to be prepared to listen to what they have to say or do what they request because they have some authority, expertise, or influence." As listening is a key feature of dialogue, especially in engaging in conflicts and tensions, then respect amongst relationships is a grounding element for urban agroecology to evolve with diálogo de saberes (DDS). As seen in the Conversations, the prior building of relationships exhibited respect when discussing contentious issues and supported intercultural contact zones in the enquiry. Trust has also been identified as an essential part in the development (and breakdown) of networks (Buchanan 2019: 174) that are an essential structure of agroecological practice-sharing and action. In connection to trust, as communicated in the Conversations, is "Love" which Freire (2000: 50) describes as essential in building solidarity beyond individualistic gestures, that is, when a person, "stops making pious, sentimental, and individualistic gestures and risks an act of love. True solidarity is found only in the plenitude of this act of love, in its existentiality, in its praxis." This thesis finds, therefore, that if listening is a fundamental part of respect, if trust is essential to building networks, and if love begets solidarity, then urban agroecology must evolve with the aim of harnessing these elements in relationships as a foundational force in building deep food democracy. brown (2017: 159) highlights how relationships are foundational to collaboration, especially when different experiences and perspectives come into contact as transformative moments:

"Meaningful collaboration both relies on and deepens relationship – the stronger the bond between the people or groups in collaboration, the more possibility you can hold...notice who you feel drawn to, and where you find ease. And notice who challenges you, who makes the edges of your ideas grow and fortify. I find that my best work has happened during my most challenging collaborations, because there are actual differences that are converging and creating more space, ways forward that service more than one worldview."

Trust, respect and love in deepening relationships, therefore, supports meaningful collaboration across difference, which connects with how UAGC can evolve with the critical feature of *diálogo de saberes* (Martínez-Torres and Rosset 2014), and mapping of power as part of generating deep democracies (McIvor and Hale 2015).

This focus on relationships as fundamental to deep democracy, agrees that lasting democratic organisations place emphasis on developing abiding relationships where individuals build a sense of their own capacity to influence and change conditions (Stout 2010). The emphasis on trust, love, healing, and respect as part of relationships supports the approach of social transformation that builds for shifts in power culturally, institutionally and economically as a, "long game –one that does not involve quick wins" and techno-fixes (Prizendt 2017). Just as I asked in section 5.3, how organisational structures can support transformative cultures, I now explore this in terms of how relationships characterised by respect, love, trust and healing can be nurtured as the foundations underpinning a long-term transformative culture.

Love" can be seen as a binding link between the other characteristics of "respect", "healing" and "trust" that were expressed in the Conversations as, "When we are loving, we openly and honestly express care, affection, responsibility, respect, commitment, and trust" (hooks 2000). In terms of seeing urban spaces as prefigurative places for urban agroecology (Tornaghi and Dehaene 2019), Darder's (2002) evolution of Freire's "lovingness" in the classroom is useful in understanding how love' in organisational structures can support transformative relationships at the young food hub. The same author (Darder 2002: 91) says that if teachers approach the classroom as an act of "profound love", then "teachers could find the strength, faith, and humility to establish solidarity and struggle together to transform the oppressive ideologies and practices of public education." What happens if the food hub at WLHC is approached with a practice of "profound love"? How might this nourish the relationships needed for diálogo de saberes, long-term food democracy and social transformation? And so, in WLHC's continuing evolution of relationships of respect, trust, and healing, I suggest that organisational structures must embody 'lovingness'. The anti-oppression framework suggested in section 5.3.1, also embedded in organisational structures, brings a 'critical' element to lovingness, so as to analyse how power operates in the emerging systems and cultures, and in dialogue embody a 'critical lovingness'. In considering holistic approaches to life-cycles in relation to food systems outlined in section 5.2, 'critical lovingness' also relates to "more-thanhuman" solidarities (Tornaghi and Dehaene 2019). In terms of how to encourage a 'critical lovingness' practically, creative popular education methods have been shown to support deep democratic relationships (section 5.1), while anti-oppression as a praxis focuses on both process and outcome (Wong and Yee 2010), and has a host of tools to support organisational change (Springtide Resources 2008, Institute of Race Relations 2015).

In this section I have highlighted relationships as a critical underpinning of generating socially transformative cultures and deep democracy. Building on McIvor and Hale's (2015) assertion of enduring relationships linked to deep democracy, the enquiry found that trust, respect and love are important characteristics to support collaborative dialogues across different social experiences and perspectives. With critical pedagogical work finding 'love' to be a connective element across trust, respect and care, and a way to build solidarity in changing oppressive practices, I suggest that organisational structures can be embedded with a 'lovingness' to support the evolution of transformative relationships and cultures. In dialogue with anti-oppression praxis (see section 5.3) embedded in organisational structures, I propagate 'critical lovingness' as an approach and a supportive "frame" (Anderson et al. 2019) to foster deep food democracy with *diálogo de saberes* at WLHC.

5.5. Summary

This chapter has been presented data, analysis and discussion on the research objective, To coproduce a just democratic process in shaping foundational principles of a food hub with urban agroecological intentions', and the connected research question, How can a food hub develop urban agroecology with a central tenet of food democracy? Through action research the Conversations developed democratic relationships and had signs of *diálogo de saberes* centring practical dialogue of translocal and culturally appropriate foodways, although discussions of mapping power were limited – which curtailed the depth of democracy. In three workshops implementing popular education and community development approaches there was a shift towards a more democratic culture at the young food hub, with foundations deepened for future work to engage with mapping of power. The process produced four key outputs: a document outlining co-produced food principles for WLHC; a poster sharing how the enquiry unfolded and what was found; a graphic harvest documenting dialogues on food values at Workshop 1; and a collection of photographs taken by participants reflecting their attitudes to food. The poster, graphic harvest and photographs are on the walls of the hub and available for public viewing; while the principles have been shared with the management consortium, as ways to embed the learnings into the development of the centre. The action research produced learnings as to how a food hub can develop urban agroecology with food democracy in terms of practices that worked, and also critical reflections for the future. I summarise these below.

With the need for a transformative agroecological learning framework (TALF) identified as necessary to develop cognitive justice approaches in Europe (Anderson et al. 2018) as connected to building just food democracies in challenging missionary complexes (see 2.4.2), the *Conversations* contributed new empirical research to this framework. The enquiry found that creative popular

education (PE) should be integrated into the 'horizontalism' pillar as supports holistic, equitable knowledges towards forming intercultural contact zones as part of *diálogo de saberes*. Whilst a recent food democracy study at a food hub in the UK found that democratic relationships should be prioritised over generating democratic skills (Prost 2019), this thesis finds that creative and practical PE approaches can support both developing skills and relationships in food democracy process. Critical reflections of the *Conversations* emphasised the importance of democratic and intergenerational leadership in the design of a learning enquiry, and of using methods to support the equitable use of language towards deepening food democracy.

In utilising creative PE tools to generate community understandings of food and health as a foundation of a food policy, existing agroecology knowledges emerged strongly, as well as translocal foodways as local food cultures. In centring diverse lived experiences in shaping policy, the enquiry challenged missionary complexes that perpetuate epistemic injustice, and took a step out of the 'local trap', with participants centring dialogue between culturally appropriate and translocal food practices as critical in building community. In consideration of a structurally racist 'hostile environment' and re-entrenchment of social injustices in food movement spaces, the embedding of an anti-oppression framework into organisational structures is suggested as a way to support an ongoing transformative culture where translocal food practices as local cultures are equitably exchanged in *diálogo de saberes*.

In connection to this, and building on McIvor and Hale's (2015) assertion that enduring relationships are the bedrock of deep democratic cultures, the enquiry found that characteristics of trust, love, and respect within these are critical in enabling listening and dialogue in the formation of agroecological networks. The thesis suggests a connective "lovingness", inspired by critical pedagogies (hooks 2000, Freire 2000, Darder 2002), to be embedded in organisational structures so as to support these characteristics and build solidarities towards shifting oppressive social structures; with the underpinning of anti-oppression frameworks enabling mapping of power towards spatial justice. I describe this interaction as a 'critical lovingness', with tools from popular education and anti-oppression praxis offering ways to engage practically with this supportive "frame" (Anderson et al. 2019) in aiming to foster deep food democracy and *diálogo de saberes*.

In zooming in on local practice at the food hub and identifying a democratic deficit, the experimental intervention in generating a community-based food policy, therefore, found that **creative popular education as part of a transformative agroecological learning framework**, and **'critical lovingness' underpinned by an anti-oppression framework** can support the evolution of agroecology from the city with deep food democracy. Considering the limited extent of dialogue on power within the enquiry, and specificity of the research in the locality of North-

East London, further research is needed into how *diálogo de saberes* can be developed in urban food movements as a critical feature of urban agroecology.

As for next steps at WLHC, ultimately a nice poster on the wall doesn't achieve food democracy, and clarification of the underlying principle of the *Conversations* – "All this [the other principles] can be achieved by people working together and making decisions in a democratic way" (Food for thought; towards food principles at Wolves Lane 2019) – is a potential pathway to build on the democratic work of this enquiry. For instance, accepting the importance of democratic and intergenerational leadership within learning process applies not just to food policy processes at the hub, but the organisational structure as a whole. With creative popular education and anti-oppression tools, the hub can build on the *Conversations* to deepen clarity on the questions of, "where is 'governance-making' actually taking place?" (Anderson et al. 2019) as to *who* is involved in decision-making, *how* they come into that position, and what the, "democratic rules for decision making are" (Berti and Mulligan 2016).

With deep democracy needing time and resources to build enduring relationships in the *Conversations*, especially in recognising the various material and social barriers to participation (Allen 2010), the next chapter moves on to London Grown Workers' Coop (LGWC). It focuses on the economic experiences of the young agroecological group in terms of generating fair livelihoods, as well as evaluation of the worker co-operative structure as an elevating model for deep food democracies.

Chapter 6: Urban agroecology and a workers' co-op; livelihoods, care and viability

This chapter aims to share findings from the enquiry on London Grown Workers Co-operative (LGWC), described in chapter 4, and discuss these while considering viability and potential organisational structures to evolve urban agroecology (UAGC) with deep democracy. While chapter 5 analysed a specific food policy process within a food hub in terms of urban agroecology, this chapter considers four years' experience of a workers' co-op (WC) while focusing on the objectives:

- To explore with colleagues our individual and collective learnings in developing a workers' co-operative as an elevating organisational structure for urban agroecology
- To develop understanding of how urban agroecology can be viable in a neoliberal city economy

These are explored through an insiders' perspective in UAGC practice emerging in London with the formation of, "workers co-operatives to build anti-capitalist urban farming livelihoods" (Tornaghi and Dehaene 2019: 9). Learnings in this chapter on the LGWC enquiry are connected with the findings in the WLHC policy process. In the sections I refer to 'sweat equity', which is the physical labour, mental effort and time put into to develop a business or project, and is often seen in cash-poor start-ups where employees accept salaries below market value in return for a stake in the company (Kenton 2020). Overall the chapter finds that a **'prefigurative compromise'** with the market is necessary to make fair livelihoods and cultures of care in the neoliberal city and proposes that this **in combination with** *diálogo de saberes* (DDS), can support viable and democratic agroecologies. The chapter also finds that the agency experienced by worker-owners should be broadened to include stakeholders beyond worker identities in decision-making processes, so as to support dialogue across different positionalities within the food system, especially in working towards commons-creation on public land.

The chapter begins with an overview of LGWC's financial development, and in defining what a fair livelihood is with co-workers it is found that the organisation took limited steps towards generating these (6.1). Section 6.2 seeks to understand why this was with analysis of contextual conditions and internal factors, and in doing so makes connection between the co-op's experiences and Daftary-Steel et al.'s (2015) conception of the "unattainable trifecta of urban agriculture" without sufficient external investment. Section 6.3 analyses the impacts of the unviability of the coop in relation to the organisation's intentions to create cultures of care, equitable opportunities for worker ownership, and spaces to discuss power relations. In finding that a lack of viability and financial resources hindered these aims, I agree that wages for workers must be a key strategic aim in the development

of UAGC if anti-capitalist livelihoods and equitable cultures of care are to be generated (Pimbert 2017, Soler et al. 2019). In expanding this finding in 6.3, section 6.4 explores the question, *where does long-term financial investment come from without undermining social justice principles?* with evaluation of different income streams that could have supported LGWC towards a more robust financial position. The chapters' resultant strategic proposal, with the aim to evolve viable urban agroecologies in connection with the praxis' political roots, is compared with existing suggestions in the literature (Pimbert 2017, Tornaghi 2017). In light of this strategic position, section 6.5 analyses whether the worker cooperative (WC) is an elevating model to evolve UAGC, with a particular focus on LGWC's aim to evolve 'community space'. Section 6.6 relates the findings of the enquiry back to the thesis objectives and provides a summary of practical learnings and suggestions from co-op's formative years.

6.1 Co-op business development and livelihood generation

In this section I analyse LGWC financial information as a means to highlight that LGWC was unable to make steps towards generating livelihoods as defined by the workers themselves. Table 4 shows the profit and loss accounts for the organisation from 2015 to 2020. Background information on the figures can be found in 'Appendix C'.

	2015–16	2016–17	2017–18	2018–19	2019–20	TOTAL
Deferred grant from previous year		7,187	5,131	18,013	4,398	
Grants	11,115	7,000	37,966	6,300	14,300	76,681
Food sales			4,053	3,744	4,219	12,016
Education services				2,500		2,500
Hires + Corporate volunteering			3,755	2,115	1,200	7,070
TOTAL INCOME	11,115	14,187	45,9763	32,672	24,117	98,706
Growers' Wages			14,013	7,533	7,657	29,203
Infrastructure Wages	300	2,616	1,121	1,030	254	5,322
Organisational Wages		300	6,731	6,480	6,728	20,239
TOTAL WAGES	300	2,917	21,865	15,043	14,639	54,764

Site infrastructure materials	3,154	2,084	498	1,371		7,107
Garden infrastructure materials i.e. netting		1,700	924	300	505	3,429
Tools	136	919	1,293	471	193	3,012
Transport + growing sundries (seeds,	313	1,376	944	962	571	4,166
Rent			960	1670	200	2,830
Insurance				413	245	658
Water			454	368	77	899
Additional grant programme expenses	25	60	562	8,708	981	4,281
Administrative			537	1,230	556	2,323
Accountancy			440	440	90	970
TOTAL ORGANISATIONAL COSTS	3,628	6,139	5,652	14,263	3,218	32,900
TOTAL COSTS	3,928	9,056	27,517	29,306	17,857	87,664
Deferred grant for following year	7,187	5,131	18,013	3,148	4,873	
PROFIT / LOSS	0	0	233	218	137	

Table 4: Profit and loss for London Grown Workers Co-operative, 2015–2020

Our business plan resembled Organiclea's in that we aimed to run education and volunteering programmes connected to a commercial market garden, generating social and ecological benefits associated with urban agriculture (UA) such as skills-building, outdoor learning, and community development (see section 2.4). Therefore, the volunteering and education programmes were in part reliant on the commercial activities and the commercial activities were in part reliant on funded education programmes. 2017–18 was the co-op's test trade year and a business plan was written during that time with support from a social enterprise start-up grant programme. Table 4 highlights that after the test trade year 'Total income' decreased in the following two years by at least £10k each year. This was a result of food sales staying the same around the £4k mark and grants income decreasing by 26k in 2018–19 compared to 2017–18; and although they increased to a total of 14k in 2019–20 that was still less than half of grants generated in 2017–18.

During the writing of the business plan the social enterprise advisor highlighted that there was a risk to the viability of the business because wages expenditure was not matched by trading income,

leaving the co-op exposed to a lack of funding. In response the co-op commented in the business plan:

"The long-term strategy for sustainability is to move away from grant funding and towards commissioned work from public bodies and community partners, whilst maximising the earning potential of the produce we grow" (LGWC Business Plan 2018).

While the co-operative did run a public volunteering programme three years in a row, schools' activities, and community events thus building a track record for commissioned work, the latter long-term aim of maximising the earning potential flattened in the three years of food sales. Table 5 highlights how growers' wages were consistently substantially lower than food sales, this being roughly a third in 2017–18 and roughly a half in 2018–2020. Value generated from the Growers' Wages but not represented in Food Sales are the learning opportunities, relationships and community development that happened through the education programmes integrated into food growing at the sites. Thus, the role of the growers was not just to grow food for sale but also to facilitate supportive community learning environments.

	2017–18	2018–19	2019–20	TOTAL (£)
Food Sales (£)	4,053	3,744	4,219	12,016
Growers Wages (£)	14,013	7,533	7,657	29,203
Difference (£)	-9,960	-3,789	-3,438	-17,187
Total Trading Income (£)	7,808	8,359	5,419	21,766
Total Wages (£)	21,865	15,043	14,639	51,547
Difference (£)	-14,057	-6,684	-9,220	-29,781

Table 5: Comparison of LGWC trading income and wages, 2017-20

The observation still stands, however, that in terms of the organisation's viability in a neoliberal marketplace, expenditure on wages did not amount to income to cover these as well as

organisational costs. This is reflected in the fact that during the period 2017–20 the co-op generated a total of £21,766 Trading Income and spent £51,547 on Total Wages, with a difference of – £29,781. This shortfall was made up by funding grants and by a lot of volunteering by co-op members who completed basic roles from gardening, to managing the growing plan and financial administration. Table 6 does not include other running costs of producing food such as seeds, water bills, packaging and transport. Those costs were relatively low compared to wages, since agroecological growing meant that we had low inputs and, importantly, a free supply of compost from municipal green waste to set up new growing beds and mulching each season while we set up our own composting systems.

With the 2017–18 growing season involving the set-up of growing beds, production and distribution systems, and volunteer programmes, the co-op had projected that food sales in the following years would increase with more stable systems and expanding growing space (see Table 6). However, as Table 5 shows, Growers' Wages in 2018–19 and 2019–20 were half of those of 2017–18, which meant also half the paid labour in the garden for improving systems and growing food for sale. The 2017–18 growers' wages were largely covered by a start-up grant, which included £7,000 for gardeners running volunteer sessions. As Table 6 (below) shows, the co-op consistently produced food sales income below business plan targets, with a difference of almost £10k in 2019– 20. In terms of developing the education aspect of the organisation with a volunteer programme, schools outdoor play and a gardening training programme, the co-op had estimated that it would need to generate £40k per year in revenue grants to cover costs, based on the test trade year. This meant that the income targets highlighted in the business plan were not met after 2017–18, with total shortfalls of $f_{.4}$ 4k in 2018–19 and $f_{.4}$ 9k in 2019–20 (see Table 6 below). Also, also a result of LGWC's decision to step back from operations at WLHC in 2018–19 there was a renewed need for infrastructure investment at Pasteur Gardens (PG) (Strategy Review 2018), on improving toilets, setting up a polytunnel, and building a multi-functional covered space, making up a grants target of f_{40k} in 2019–20. Thus, with a shifting business plan the Capital Grants difference for 2019–20 meant a shortfall in the region of f.75k compared with what we thought was needed to work towards the aims of the organisation.

	2017–18	2018–19	2019–20
Food Sales Target (£)	4,187	9,500	13,500
Food Sales Actual (£)	4,053	3,744	4,219

Food Sales Difference (£)	-134	-5,756	-9,281
Revenue Grants Target (<u>f</u>)	36,000	40,000	40,000
Revenue Grant Actual (£)	36,466	6,300	12,300
Revenue Grant Difference (£)	466	-33,700	-27,700
Capital Grants Target (£)	1,500	5,000	15,000
Capital Grants Actual (£)	1,500	0	2,000
Capital Grants Difference (£)	0	-5,000	-13,000
TOTAL DIFFERENCE	332	-44,456	-49,981

Table 6: Comparison of March 2018 business plan targets with actual food sales and grant income

The co-op's business approach, of integrating funded education programmes with commercial agroecological growing, did not intersect in such a way that both aspects became more viable; as was seen in food sales remaining the same and funding grants not reaching the levels required to meet the co-op's costs. For instance, for 'full cost recovery' of the 'seed to plate' volunteer programme required an annual budget of f_{20} k, a target we never reached, with the co-op generating £9,800 for a volunteer programme in 2019–20. This lack of funding limited time to grow the programme, in terms of partnership building, publicity, and volunteer support outside sessions, with workers filling in these gaps as much as possible voluntarily. The non-profit and profit elements of the organisation not fitting together, in terms of the identity of the coop as a commercial food growing enterprise and/or a community education project, were visible on the gardening days where the focus between running sessions with quality learning and also the speed at which harvesting and planting out needed to happen did not match. Sometimes it felt that we were not working fast enough, but rather opted for enjoyable gardening sessions which resulted in coop members having to catch up with tasks later. Whilst at other times harvests were large and the speed at which we needed to work meant that the pace was too fast for appreciative learning. Anonymous Market Gardener (AMG) reflects on this tension in running a not-for-profit business:

"The money that we raise isn't raised to make more money. You know we're not running it as a business even though we are a business. You know the volunteer programme has no [financial] return apart from labour on the land which is valuable but effectively when you think about the food income it's not... but that's where all of our efforts are going and I guess that's just a reality of the project is that we're funding reliant because we do - it's basically like a bottomless pit."

Having given a broad overview of LGWC's business development, I now turn to look at the extent to which the co-op was able to generate livelihoods, with information on how my co-workers understood what a livelihood means, and co-op aims around this.

6.1.1 Livelihoods

A clear aim for the co-op was to make livelihoods as seen in the 2016 Project Plan as it says that, "Pasteur Gardens aims to generate livelihoods for members of the project for their roles and responsibilities." In the co-op's strategy documents the description moved from 'co-operative livelihoods' (LGWC Business Plan 2017; Project Plan 2016) to 'equitable livelihoods' (LGWC Strategy meeting 2018). The description of 'Co-operative Livelihoods' developed through 2015–17 to read:

"The organising structure will be not-for-profit and co-operative, everyone will be paid at the same rate so that we value all work equally. We are committed to skill share across all areas of the project for long-term sustainability, with the possibility of long-term rotation of roles and responsibilities. All Decisionmaking will be made by consensus" (LGWC Business Plan 2017).

With a strategic review at the end of 2018 and two growing seasons together the co-op edited this aim to:

"run a democratic workplace that is transparent in decision-making, values all work and has an equitable pay structure at a minimum of London Living wage. We aim to provide training and skill-sharing for roles in the co-op to enable equitable management experience" (LGWC Strategy meeting 2018).

The shift in the understanding of the livelihoods partly came about after conversations considering how opportunities of paid project management roles were distributed, and with who felt confident and had skills to do these. Aiming to embed skill-sharing and training opportunities into co-op cultures was seen as one way to challenge power dynamics and enable equitable opportunities in the distribution of paid work. The commitment to a flat wage structure in the initial aim in 2017 highlights a challenge to market valuations of labour and includes all work which includes care work for instance. The commitment to a living wage reflects a value that people should be able to meet their needs through their labour at a minimum in contrast to exploitative labour practices in the food system and across society. Themes of the aim of co-operative / equitable livelihoods are

'transparency', 'equity' and 'respect' in valuing all work equally. These intentions of the co-operative highlight some of thinking and approach to the, "anti-capitalist urban farming livelihoods" developing in London, and the commitment to skill-sharing expresses a political desire for challenging unjust social structures as part of peer-to-peer learning within an emerging agroecology in the cityscape (Tornaghi and Dehaene 2019: 9).

To get a better sense of what it meant for the co-op to provide livelihoods for its workers I asked members in interviews. AMG responded:

"It means full time work five days a week and any less than that is difficult, like really difficult in terms of momentum and all the rest of it. There's not a lot I'm due that isn't gonna be because of my labour - so to have guaranteed labour is my guaranteed time and income. And I think one of the reflections that we all know from the last three years is that this food growing thing demands a lot of sacrifice... so the shift would have to be all or one. You know I couldn't go to two to three days a week at the co-op."

This highlights the issue experienced in being able to offer coop members enough work to pass up or give up their other employment, and that in this case full-time work was what was needed to give up other income from labour. J outlined what a livelihood means to her:

> "It means not having to worry about where my rent's coming from or paying the bill,s just those normal things, and just having some money in your pocket to do the things that you want to do. Even if you have to save for them. Yeh, the things that everybody wants, ya know: have a roof over your head, pay the bills, go to the cinema, go on holiday or buy yourself those great boots!"

My thoughts about the meaning of 'livelihood' would be similar to AMB's and J's: something that would enable me to meet material needs, which would likely be a full working week considering that wages for gardening are historically lower than the average. It would also mean job security with pension, sick pay, holiday pay and the ability to save for a rainy day – especially pressing after over a decade of self-employment on a relatively low income in both national and regional terms. I now analyse whether we managed to generate livelihoods or how close we came to this in the first three years of operation of LGWC since 2016.

Table 7 shows the number of paid days in different areas of work the co-op was able to pay per month from 2016 to 2020. The paid food growing work was predominately seasonal, since we shut down growing operations from November to March each year. The four days' paid fundraising work in 2017–18 was a LGWC worker paid by Organiclea to fundraise for FarmStart initiatives, with LGWC included. Gradually more non-gardening work was paid for, such as using a \pounds 4k unrestricted grant in 2019–20, but roles still required volunteer time, while director's meetings about operations, business planning and strategy were never paid, though food and travel expenses could sometimes be reimbursed. Table 7 shows that the greatest number of paid days per worker was in 2017–18, with six days per month, going down in 2018–19 and 2019–20 to 3.5 and 4.6 days respectively. In practical terms this meant that seasonally (April to November) the co-op generated one to 1.5 days paid work per member per week from the beginning of trading. The seasonal element resulted from the funded gardening volunteer programme happening in those months, and from food sales being unable to cover wages alone, as discussed in relation to Table 5.

Work role	2016–17	2017–18	2018–19	2019–20
Food growing	2	18	10	14
Lead Grower + Infrastructure	0	0	1	1.5
Fundraising	0	4	0	2
Finance	0	0	1	1.5
Volunteer + Communications co- ordinator	0	2	2	2
Business Development	0	0	0	2
TOTAL	2	24	14	23
Number of co-op members	5	4	4	5
Average number of paid days per worker per month	0.4	6	3.5	4.6

Table 7: Average number of paid days per month in different areas of LGWC work (N.B Food growing work seasonal March to November)

As regards to how much the co-op could pay ourselves in 2016, we set a flat rate of \pounds 12.50 an hour for any paid work for the co-op, so that for an eight-hour day a member would take home \pounds 100 before tax. At the time we discussed what other community food growing projects generally paid,

and finding that £12.50 per hour was more than many others, we agreed we would aim for this as an experiment, as this rate was closer to a liveable wage for us in London and average earnings in the capital. At the end of 2017, after the first growing season, we reduced hourly pay to the rate of London Living Wage (London 2019) of £10.50, so that we could meet running costs and cover more working time, since we weren't generating enough income (LGWC meeting 2017). The 'real Living Wage' is, "based on the cost of living and is voluntarily paid by over 6,000 UK employers who believe a hard day's work deserves a fair day's pay" (Foundation n.d.). Although the London Living Wage was less than what we considered to be a fair wage, it felt like the minimum that labour should be paid at. So, although we had tried to build the business around a wage that felt a balanced rate, in terms of what other London food growing projects paid and our experience of costs of living in London; this was not possible because of inadequate food sales and grants income after one year and resulted in a self-imposed pay cut of £2 per hour or 16%.

The number of paid days generated seasonally (Table 7) and the cuts to wage levels shows, by coop members' own definitions of a 'livelihood', that over nearly five years of co-op development and three years of trading the co-op failed in its aim in generating livelihoods. The generation of five full-time livelihoods in community-based food growing in three years would be a major task, and the issue here is that the co-op did not get close to generating livelihoods in that time, and in fact the average number of paid days per month per worker decreased after the first year of trading. Another issue is the nature of the paid work, as due to the lack of financial security and to seasonal fluctuations in income the co-op was unable to responsibly commit to employment beyond freelance work or short-term contracts. The insecurity of the co-op's finances, therefore, transferred to worker labour conditions (although flexibility in labour was something that some members wanted, in terms of their other paid work.)

During a meeting after the first growing season in 2017, members had a conversation about our experiences of the wages of the co-operative, reflecting that the paid work we had generated in the first year of trade (six days per worker per month) was making a not insignificant contribution to people's income (LGWC meeting 2017). I noted at the time that \pounds 500, the monthly income from LGWC work, covered my rent, creating the reassurance of housing security in London with its rising rents. My rent, however, is below the market rate. Another material benefit for members was the taking home of fresh vegetables from the co-op garden. Members often commented that through the growing season their food costs reduced substantially as a result of co-op produce. So despite the co-op not providing livelihoods, it did contribute to members' incomes and, at times, covered important living costs in the first three years of trading. Furthermore, although the organisation did not achieve the aim of generating livelihoods, it did invest a lot of the resources generated, with \pounds 54,764 spent on wages between 2015 and 2020 (see Table 4)., which was 59% of

total income. Despite the efforts of members the organisation did not become financially viable or able to offer workers secure, fair livelihoods, and that in turn looped back to impact on the financial viability of the co-op, with less time being spent growing food for sale and developing the organisation – as J reflects:

"Yeh, if we were there [gardening at PG] then we would grow more, so we'd have more to sell. It could be quite nice to have a full-time job doing this – I think we'd probably get a lot further. So yeh, London Grown would benefit if we could have full time jobs" (J 2019).

The experience at LGWC of financial insecurity and lack of livelihoods is not a rare experience in agroecological farming, since increasing urban demand for seasonal, organic, local produce does not always translate to all farmers making a living through the seasons (Jarosz 2008). In a recent study on urban agroecology in San Francisco, USA, it was found that:

"The cost of labour and, relatedly, access to capital and grant funding to pay living wage salaries were also extremely significant challenges identified by survey respondents. The majority of respondents stated that most of their labour is volunteer rather than paid, with non-profit respondents reporting this more frequently (71% volunteer-driven operations) than for-profit enterprises (50% volunteer/unpaid intern driven)" (Siegner et al. 2019: 580).

It has also been noted that food forests (an agroecological practice) hardly ever have a viable business model, and thus need financial support in the first few years (Groot and Veen 2017), while financial instability in food hubs has been found to be a more critical concern than their capacity to engage in social justice practices (LeBlanc et al. 2014). As well as issues with investment generation and grants reliance, UA organisations have been found to struggle to generate trade income from their social enterprises - with the aforementioned study in San Francisco finding that half of respondents reported annual farm earnings of \$1,500 or less (Siegner et al. 2019). Daftary-Steel et al. (2015) found that US food justice and sustainable agriculture organisations 'East New York Farms!' (ENYF) covered 2% of their entire operational costs (\$430,000 per year) from food sales, so that doubling the sales through selling to restaurants, rather than trying to produce affordable, fresh produce, would not help significantly in meeting costs. This is reflected in LGWC's experience, since the co-op began selling to restaurants in 2019–20. Food sales did rise by 12% $(f_{4}74)$ from 2018 to 2019, but that is not a large enough jump to discount other factors such as improvements to growing systems, and did not shift the trading income dramatically to generate greater viability. What LGWC and ENYF cases both show is, with food sales producing such low percentages of project income, either the initiatives sell the food grown at below production costs and make up the difference in other ways to retain affordability (such as grants, or diversifying income other than growing food), or sell at real costs and thus price the food out of reach for people on low incomes, thereby undermining the project's mission (Daftary-Steel et al. 2015).

Looking to diversify income streams without being grant-reliant has become a feature of urban agriculture and food justice organisations, for example Growing Power in the USA, which generated a third of its income from sales and services, much of the latter comprising conferences and trainings. A flagship food justice project and noted as a viable model, Growing Power, sadly, shut down operations with reports that from 2012 to 2015 it was running deficits in excess of \$2 million dollars, and owed creditors half a million dollars (Levine 2017). Again, this relates to LGWC's experience, as although the our trade income unrelated to food growing (space hire, corporate volunteering) made up 13% of total income and certainly helped the co-op to cover costs, it never grew sufficiently to deepen organisational viability towards the agroecological aims of the project. What LGWC's experience highlights, with corroboration from literature, is that there is a fundamental challenge for urban agroecology to develop as a praxis and be financially beyond diversifying trade income, being less reliant on funding, and include the sale of produce to restaurants. Aiming to understand this and to contribute to strategic directions, in the next section I examine LGWC's inability to generate fair livelihoods (section 6.2), before looking at the impacts of this on the organisation (section 6.3) and suggesting future strategies (section 6.4) and practical suggestions from this learning (section 6.6).

6.2 Why were financial viability and livelihoods not generated?

6.2.1 Contextual conditions

In this section I connect the experiences of LGWC of having limited success generating a viable urban agroecology with the following contextual factors:

- Socio-ecological benefits of agroecological farming not valued by the current political economy
- Inequitable government subsidies that force agroecological growers to compete with cheap food
- London living costs for urban agroecological growers
- Insecurity of land
- Competition for short-term funding cycles with high levels of labour to reward

Understanding the struggles of UAGC projects to survive financially can be usefully understood in that, "current political economy does not fully compensate farmers for the social-ecological services provided from their farms" (Siegner et al. 2019). For example, in 2018–19 LGWC's two largest pieces of income were respectively, for a fashion photoshoot of £500 for one day, and £1,000 for a corporate volunteering day. What is valued by the political economy becomes evident when these

sums are compared to the co-op's income from agroecological food production through processes of: community learning; worker control; and the desire to pay fair wages, which were sometimes \pounds 500 for a whole month. The pricing of the market does not reflect the value of these elements, which is one fundamental reason for urban agroecology's initiatives aim to shift social relations beyond neoliberalism's prioritisation of profit over care and equity. I return to this conundrum for urban agroecology in section 6.4, where I propose strategies for the generation of prefigurative actualities, putting social and ecological principles into action within a dominant socio-economic context that does not recognise their value.

Government policy has a role in creating neoliberal markets (see section 2.5). Decades of European agriculture policy has pushed farming intensification alongside cheap food prices for consumers (Swagemakers et al. 2019) with an imbalanced subsidy system that favours industrial farmers. Small-scale producers are often disparaged and are unable to gain a fair share of income and benefits of prevailing markets, policies and institutions (Vaarst et al. 2018, Bellamy and Ioris 2017). Deh-Tor (2017) connect cheap food prices to viability of small-scale producers impacting the ability to create livelihoods:

"The omnipresence of cheap food provided by the mainstream retail sectors – whose price does not take into account the ecological impact of transport, resource depletion and storing of unseasonal products – make it also very difficult for alternative local producers to compete and thrive, while paying their workers fairly."

The impact of governance policy, therefore, means that small-scale producers (including urban agroecology producers), with a lack of access to government subsidies, are unable to compete with depressed food prices, as shown by LGWC's struggle to 'fill the gap' through funding and diversification of income. In the context of a 'cheap food' policy in the USA, Carolan (2011) notes that such governance enables diets with sufficient calories, rather than a living wage policy where people could afford the actual costs of fresh healthy food. Thus, the experience of LGWC struggling to match income to costs in food sales relates to broader neoliberal policy where workers are undervalued and underpaid for their labour, resulting in restricted household food budgets.

At an event called "Fringe Farming in London" in February 2020, Sinead Fenton examined the question, "Can we support agroecological food production in the capital and beyond?", drawing on her experiences as an agroecological worker and of closing down a social enterprise in London:

"competition for land, insecurity of tenure, reliance on grants and therefore on activities other than growing, supplying premium produce to high end restaurants that you can't eat at on growers wages and not communities" (Shared Assets 2020).

The latter point about selling vegetables to high-end restaurants struck home, given that the wages we earned in the co-op would make eating at the restaurants we sold to inaccessible. In a sense this dynamic reifies the political economy of underpaid workers who are priced out of natural, fresh foods – including, in this case, the people that grew them. While setting up a new agroecological initiative outside London, Sinead reflected on its social media page:

"Last year reality hit in a multitude of ways and we realised we both couldn't do it, not there anyways, with bills to pay, the cost of being in London ... the insecurity surrounding the project and all that jazz" (Aweside Farm 2020).

The first element here that relates to LGWC's experience concerns the insecurity of the project. Although LGWC had access to land at PG and also WLHC, the former came with insecure tenure, since for the period 2016–20 we were on a 'tenancy at will' agreement, through Organiclea's FarmStart programme with Haringey council, having been told when we took on the project that there would be at least a ten-year lease. The tenancy-at-will meant we could be asked to leave with a month's notice and impacted on what funding we could apply for in the absence of land security. Further to this, AMG expresses how not having a lease impacted their approach to developing Pasteur Gardens as a community space:

> "Well, I've tried to voice that a few times that anxiety about my reluctance to maybe engage in full community activity on this piece of land that is so precarious. 'Cos watching it slip through your fingers or watching the community get it ripped away from them again. You know if you're talking about historical experiences of land - we wanna be responsible to those people as much as we are to ourselves about the whole – it's just deep it's dark... it's not an experience you want to put people through unless you really have to. So, there's just a weariness, a tentativeness, because we don't have this lease."

Another part of Sinead's quote that jumps out is, "the cost of being in London" (Aweside Farm 2020). Most of co-op workers' income was spent on paying for shelter, within the context of London's high rents and property values that are partly a consequence of financialisation and privatisation of land (see section 2.5). This increased pressure of covering relatively high living costs was a barrier to developing an agroecology project with LGWC, as workers had to make income elsewhere since the co-op wasn't able to pay sufficient wages. When speaking with agroecological growers based in the UK countryside it is interesting to learn that many of them live on the land that they work on. Farming in the UK being, historically, a relatively low-income sector (Devlin 2016, UK Parliament 1969), one way to reduce living costs is by living on the farm. In the case of LGWC we were unable to live on the land due to the stipulations of the tenancy-at-will, as is the case for many UA projects. This raises a key question for urban agroecology as to how, in aiming to build equitable and just spaces in the city, might the praxis evolve, considering the common inability of urban agroecologists to live on the land they work on, and the relatively high rents in

urban areas? I return to this question in sections 6.4 and 6.6, in terms of practical and strategic suggestions for building viable agroecologies. These reflections on how financialisation and privatisation processes within urban environments impact on the viability of UAGC builds on Tornaghi's (2017) work on how neoliberal cities disables urban agriculture to residing in interstice.

A final contextual condition I wish to highlight is experiences of grant funding, as also mentioned by Sinead. The issue of local food projects in London being underfunded and having inadequate support and resources was noted over a decade ago by Caraher and Dowler (2007), so LGWC's experience is not a new issue. The reliance on grant funding was detrimental to LGWC's development since we were unable to generate the resources needed to run programmes and develop the agroecological principles of the organisation. The effects of short-term funding on the organisation are aptly described by a participant in Coulson and Sonnino's (2019: 174) enquiry: "I'm in a situation where I'm surviving on ad hoc pieces of money that have been collected over the last 2 or 3 years but it means that I'm in delivery hell." In St Clair's (2017) study in Manchester, UK, the author finds that UA can benefit communities but is severely restricted by a lack of longterm funding, and recommends that grants should be maintained for longer periods to enable, "UA projects to reach their full potential and to be sustainable for the future". For St Clair 'short-term' meant five years, whereas LGWC's longest period of funding was for one year. Securing five or more years' funding would certainly have made a difference to the financial health of the organisation and supported an ability to plan and build up resources and livelihoods. Further to the short-term nature of funding. J highlights the barriers to community-based organisations to access funding lists, and the work involved, and also how funding is distributed:

"I think it should be a conversation because communities can't do anything without money and it's always – why are the people on the ground always having to find money, when it's there? I was looking at a website yesterday and there was $\pounds 8$ billion for charities and community projects – it's all there. It's just tapping into. And I got so fed up - even this website you have to pay to join – that's a barrier. And they don't give it to you up front either. That's crap. There is money out there. Even in local authorities there's money, you know. I mean look at the Mayor – he's got money, they've all got money and they make you all jump through hoops to get it. A lot of hoops!" (J 2019).

Out of 26 funding applications that LGWC submitted between 2015 and 2020, 11 were accepted which made a success rate of 42%. For one rejected funding bid of \pounds 5k, for working with residents and a local school and residents, and after conversations with our neighbours to set up growing beds and beautify the entrance to the site at PG, we got feedback from the funder that they had over 120 applications for five grants, and that the project we proposed needed to be more *innovative*. This reflects the difficulty of securing funding in the context of austerity, with increased competition for resources especially between projects with similar goals (St Clair 2017) This limits

grassroots organising, as is shown by charities in the UK avoiding food-justice language in communications in order to ensure their survival (Kneafsey et al. 2016). The pressures experienced by the not-for-profit sector due to austerity is highlighted in a report on community hubs which showed that grants income across the UK had fallen from 35% to 30% between 2014 and 2019, and replaced mainly by service contracts as well as by room/space hire and social enterprise activities (Power to Change 2020).

Daftary-Steel et al. (2015) find that many UA organisations aim to be self-financing because of difficulties like those cited above, and also because of the staff time required to attract and manage funding. This is exemplified by the experience of LGWC, where the ratio of 42% bidding success rate might to be expected, but what is relevant is the amount of time spent on 14 failed bids for an organisation already struggling for resources and reliant on high levels of volunteerism. One rejected infrastructure bid for \pounds 20k took at least five unpaid working days to prepare, with discussions with partners, an initial architect's design, writing up budgets, and filling in the application. Competition for funding especially heightened competition through super-austerity, the short-termism of grants, and the amount of labour involved for a resource-strapped organisation, all contributed to an unsupportive environment for setting up an urban agroecology project. This reflects to different degrees across funders, with the initial start-grant providing good support and pathways for further funding. This point on funding relates to internal factors within the co-op, to which I turn in the next section.

6.2.2 Internal factors

In this section I will outline internal factors that contributed to LGWC not becoming financially viable and able to generate livelihoods, including:

- A lack of skills and experience related to business development and fundraising
- Starting trading and social programmes without sufficient investment
- A focus on grant funding for social programmes without due emphasis on site and organisational infrastructure
- Beginning with an array of programmes and activities across two sites, which overstretched resources and capacity

While the previous section highlighted contextual elements that contributed to a lack of grant funding for the co-op, AMG highlighted a skills gap in the co-op regarding this in saying at an interview, "We're not fundraisers" (AMG 2019). There were different degrees of fundraising within the group, but no one described themselves as having high levels of fundraising skills. Furthermore, the lack of business and finance skills in the group was highlighted in the initial formation (LGWC meeting 2016), and was addressed in a training day through the FarmStart programme in 2016 and also in support from a start-up grant in 2017–18. This initial support and training was invaluable in developing new business understandings. My reflection on this is that there was a need for this support to be continued, after this initial period, as the group begun to understand our enterprise and estimated figures became actual figures. Throughout the process I felt the need to engage personally in some more formal business training, as also suggested by J in an interview:

"Maybe get some business training. Yeh. And when applying for funding, applying for those kind of things so we can support them. Including it in the funding so we can do a business course or whatever. And that's for the whole group, so we're all clued up and just having more confidence."

This speaks to the WC model as, in becoming worker-owners or 'directors', members are collectively responsible for the financial health of the organisation and for making strategic decisions on trading in an equitable way; thus business literacy is paramount and should be invested in. Some of the learning points in our business experience were the lack of a logo, and of marketing strategies. Branding and a marketing strategy could have helped to raise the profile of a business that lacked investment, not just in relation to products but also to our social values. This corroborates with Specht et al. (2016) who found that, "well-considered product marketing and communication, product labelling, and quality certification mechanisms would prove vital to the success of potential urban agriculture enterprises."

This lack of business experience could be related not only to insufficient investment at the start of our trading and social programmes, but also to the focused nature of grant funding in the organisation. Table 8 below, shows that the co-op generated close to \pounds 72k of grants from 2015 to 2020, a figure close to the \pounds 70k that the Landworkers' Alliance cite as the investment needed for tools, infrastructure and land access in setting up an agroecological farming initiative in the UK (Landworkers' Alliance 2020). There is no information from LWA as to regional variations or if there is a difference if land is within urban areas, although it could be assumed that the figure is for rural projects, given that the organisation is predominately rurally based. In 6.6.1 I provide an estimated budget, based on learnings, for setting up the co-operative were spread out from 2015 to 2020, with the most funding – \pounds 38k – secured in 2017–18. This helps to explain why there was financial insecurity, with grant money or investment 'dripped' into the organisation, resulting in insecure labour work, an inability to build financial plans and health, and piecemeal investment into tools and infrastructure.

Financial year

Amount of grants raised (f)

2015–16	11,115
2016–17	7,187
2017–18	37,966
2018–19	6,300
2019–20	14,300
TOTAL	76,681

Table 8: LGWC grant funding 2015-20

On the other hand, Chagfood, a successful Community Support Agriculture (CSA) project on Dartmoor, secured two grants totalling £48,400 in 2010 to start the project and to pay for running costs, two part-time growers, polytunnels and other infrastructure, before attracting enough customers not to have to rely on grants (Fernandes et al. 2019). Chagfood reported that they their turnover for 2018–19 was £74k, with salaries and wages (including pensions) for the year totalling £42k (Chagfood CiC 2019). The 100-person weekly distribution scheme also included 10% of CSA shares being discounted and available to low-income households (Chagfood CiC n.d.). LGWC's experience in comparison to Chagfood's highlights that securing investment for wages, running costs and infrastructure when starting a project can support viability and the generation of livelihoods. Without this initial investment LGWC were unable to move out of the 'sweat equity' stage of development, which hindered organisational development since workers had to find income elsewhere. AMG highlighted the struggle of setting up commercially viable systems without sufficient resources:

"This idea of running a viable market garden whilst also putting in infrastructure and battling weeds and thistles and brambles and clearing the land, and also doing it on no money more or less and having to pay London Living - it's like, ya know, if you can only commit one day a week, unpaid, after three years of doing maybe more than two days a week paid in total, you're not going to get systems set up that are commercially viable."

Further to a lack of appropriate investment at the beginning of the organisation, understanding what the grants were for also provides insight into why LGWC were unable to take steps towards viability. The budget breakdown of funding grants shows how the co-op invested the majority of grants – 51k or 61% – into activities and programmes (volunteering, events, schools, education). This represents a lot of the wages generated for the running of the programmes, plus a contribution

to running costs. The figure also reflects the members' desire to be on the land and to get the garden up and running and active with volunteering programmes (LGWC meeting 2016).

Table 9 shows that £16k (22%) of grants were for infrastructure work at Pasteur Gardens, while the volunteering and education programmes make up £51k (66%) combined. While infrastructure became less of a priority in 2017–18, as the co-op moved part of the operations to WLHC which had glasshouses, a café and a classroom area, activities continued at Pasteur Gardens and, before the decision to join the food hub at WLHC, applying for social programme grants had still been prioritised with *fitting* infrastructure development into these. This lack of infrastructure impacted in various ways, from volunteers at WLHC being unsure about coming to PG because of the lack of covered space, to spending disproportionate amounts of time watering and weeding because of underinvestment in ground covering and irrigation, to harvest being difficult without a salad mixing station, storage area and, until 2019, a covered area for packing vegetables away from the sun. In 2019 a new member with a background in hires commented that the facilities needed to be improved in order to increase site hires as a source of income.

Budget area/activities	Amount (£)	%
Garden volunteer programme + events	29,210	39
Education programmes IE schools, AQA, bike project	21,801	27
Capital – infrastructure investment	16,265	22
Community development/research	5,290	7
Co-op development/research + test trade	4,115	5
TOTAL	76,681	100

Table 9: Breakdown of LGWC funding grants for co-op budgets 2016–20

UK agroecological growers Jenny Hall and Ian Tolhurst (2006: 305) share an estimated budget of \pounds 35,970 for setting up a market garden, and list infrastructure investment including a building for packing, irrigation, and a caravan as a canteen. The authors suggest that, with a robust business plan and sufficient food sales, these infrastructure and other start-up costs could be taken out as a

business loan to be repaid over a five-year period. Through grants over three trading years, LGWC invested less than half that amount on infrastructure, highlighting that infrastructure investment was insufficient to support commercial, education and community activities. This is embodied at Pasteur Gardens where the shipping container bought in 2016 for tool storage had still not been fitted with lighting and power in 2020.

Table 9 also highlights that relatively small amounts of grants were invested in co-op development, such as developing a project plan, vision and business plan (5%) – which was all done by volunteer labour – and community development research and test trade (7%). The number of hours put in voluntarily by members into development and community research are not available, but an estimate would be £13,416 per year for three days a week at London Living Wage (London 2019). This reflects some of the 'sweat equity' put into the co-op, and over four years would be £53,664 for non-gardening sweat equity work. So, as seen in terms of a lack of physical infrastructure in the garden, there was also a lack of investment in social infrastructure within the cooperative, thus creating an ongoing requirement of sweat equity to meet the organisational aims. I return to the impacts of this on the cultures of the organisation in section 6.3. Reflecting on this lack of investment in organisational development, AMG said:

"It's almost like we want some kind of funding from some kind of co-operative group to help us set up our co-operative structure like that, and that's a separate piece of funding that we look at. And we have a room booked every other Thursday between those hours, and it's paid for four months or five months or something – see if we can trial it see how it effects the working" (AMG 2019).

A struggle for worker co-operatives (WC's) historically has been to raise enough capital, as the nature of worker-ownership means that non-worker investors cannot take portions of ownership in the company for future profit extraction. Unless there is private wealth to get the venture started up, therefore, WCs find difficulties in generating enough investment, and thus the inequalities of capitalism limit the option of starting a co-operative for working people (Gunn 2006). So, while a lack of business skills and focus on appropriate investment limited viability for LGWC, structural conditions also contributed because the co-op had no private access to investment capital. This highlights a future question for urban agroecology organisations, as, "the challenge to all co-operatives, then, is to supply themselves with the equivalent of equity finance capital without giving away control of the organization" (Gunn 2006).

While a focus on applying for grants for volunteer and education programmes limited investment in site and organisational infrastructure, this also resulted in the co-op becoming overstretched in simultaneously trying to set up commercial growing, develop partnerships, and run a volunteer programme, schools sessions, vocational qualifications, community events, organisational structures, community research etc., all at the same time. This was compounded by its becoming involved at a second project at the WLHC site, spreading the co-op's operations over two sets of infrastructures (tools such as compost systems, irrigation, and storage). It also meant that more time and resources were needed for transporting plants and produce between the two working spaces. AMG reflected on being overstretched in terms of our business plan targets:

"We've been so focused and spread out – focused on clearing the land at PG, spread out at Wolves Lane, that really to say that London Grown was doing one thing and going in for that one thing has been a struggle to focus on. So not meeting those targets isn't a surprise" (AMG 2019).

Although community partnerships and volunteer programmes were developed through involvement at WLHC, for instance, and although being involved at the food hub with unique resources and organisations to work with may have benefited the viability of LGWC in the medium- to long-term, ultimately the co-op needed more resources and support to work across both sites in its formative stages. Being overstretched in underresourced activities led to co-op meetings often having a long agenda, whereby some items would be rolled over to the next meeting or even fall by the wayside.

One area that suffered from this was strategic planning, as with the development and reviewing of the business plan made in 2017–18, where little time was spent in reflecting collectively about how the organisation was meeting this and how its approach might change. The importance of planning and business strategy is emphasised by experienced farmer and food justice activist Hank Herrera: "A beginning farmer needs to think carefully through their business plan" (Sustainable Economies Law Centre 2017). Being overstretched also impacted on the garden, as crops would sometimes not be harvested in time and would run to seed, while catch crops, successional sowing and interplanting could have been implemented more to maximise space, rather than managing more space and creating more labour. One lesson is certainly to focus carefully on capacity and resources, and on how they shape strategic plans for project development; as Hank Herrera puts it, "There is wisdom in starting small – starting with even as little as quarter of an acre might be a smart strategy" (Sustainable Economies Law Centre 2017).

Within these reflections on internal factors and contextual forces that restricted the viability of LGWC – as an actually existing urban agroecology project – lies "the unattainable trifecta of urban agriculture" (Daftary-Steel et al. 2015) (see section 2.5.2). Of all the literature that has connected to the experiences of LGWC, the 'trifecta' concept spoke most clearly in understanding the barriers to viability for UAGC, alongside my personal experiences prior to involvement with the co-op. LGWC's key aims, through a workers' co-operative structure, can be seen in the trifecta: i) growing and distributing affordable culturally-appropriate natural foods, ii) running free skills building

programmes, and iii) generating equitable livelihoods and leadership. With \pounds 77k of grant funding and \pounds 20k of trading income spread out over five years for developing an agroecology project across a seven-acre woodland site and a two-acre glasshouse site in one of the most expensive cities in the world (the total income just about adds up to London Living Wage for one person per year), the aims of the organisation were always going to be hard to achieve, however much 'sweat equity' members put in. Tensions of the trifecta were present and acknowledged by the co-op in the early stages of development, with a commitment made to working with these:

"Our core value is 'everything for everyone' we strive to work with the tensions of accessibility + affordability VS financial viability / livelihoods to create as much access to all the holistic benefits of healthy food" (LGWC Aims and Actions 2015).

With food grown by the co-op being sold to a box scheme, to a restaurant, or at community markets; being taken home by volunteers and co-op members; being used in volunteer lunches or donated to local community kitchens; in terms of food distribution LGWC did strike some balance within the tensions of the trifecta – it just didn't generate a viable agroecology. That the co-op struggled to create livelihoods and viable systems through a democratic structure does not necessarily prove that the trifecta isn't possible; more so the thesis agrees that, "expecting that urban farms could or should do this without long-term investments of outside funds for that purpose is unrealistic" (Daftary-Steel et al. 2015). I suggest an addition to the trifecta: of 'running mutually-support community space', as reflected in LGWC's aims. Resources are needed for bringing together and building relationships between peoples from different social backgrounds (see section 2.4). UAGC inherits the trifecta from UA, and with this addition makes up a 'quadfecta of urban agroecology' to be considered in terms of viable evolutions of the praxis. I now look to the impacts of a lack of viability in the organisation and how these impacted the generation of '*anti-capitalist* [emphasis added] livelihoods.'

6.3 Impacts of financial insecurity on anti-capitalist livelihoods

In this section I outline the impact of a lack of financial viability and fair livelihoods on the co-op's ability to implement agroecological aims of equity and care, that make up qualities of anti-capitalist livelihoods. As outlined in sections 6.1 and 6.2, the lack of financial resources meant that there were high levels of volunteerism and sweat equity across different forms of work in the co-op. J expresses the wearing effect of high levels of volunteerism:

"There comes a time when you don't want to keep doing everything on voluntary terms, I guess... I think that has a huge impact, because if you're not

getting paid it just wears you down. I mean, we all put it lots of hours and its ridiculous" (J 2019).

Dunya shared the motivation for volunteering: "A lot of it is also trying to work towards something, like the imagination of how something could become" (Dunya 2019). This resonates with me in working towards LGWC's aim of Pasteur Gardens becoming a thriving community food space. AMG, however, reflected on the impact of being involved in the co-op of other areas of workers' lives: "In terms of livelihood, we've all worked really hard to make our lives work for this project: so much juggling around just so that we can get time at the garden or go to the co-op meeting" (AMG 2019). This highlights that instead of developing livelihoods to support members, members had to make livelihoods elsewhere to be part of the co-op and juggle other elements of their lives. Having insufficient financial resources for existing worker-owners put the co-op in a bind in terms of building and retaining capacity, as wages weren't available to generate new roles or to replace departing members. Two of the five members who co-developed the initial business plan stepped back from the co-op in 2018, for instance.

As regards to this issue, and the development of food democracy in the co-op, Allen (2010) notes that inequitable access to material resources can hinder equitable participation in local food planning meetings and engender participatory injustice, while Bell (2019: 233) states in a "Checklist for Meaningful Inclusion in Environmental Decision-Making" that, "all parties would have access to sufficient material resources to enable them to participate in an equal footing." What the co-op was able to offer was seasonal part-time work averaging roughly one day a week plus fresh produce to take home in the summer months, alongside volunteer time to keep the organisation going. But as described in 6.2.1, with London's high cost of living, ultimately tomatoes aren't going to pay the rent; and so LGWC did not have sufficient materials to enable equitable participation, as reflected in members expressing how, despite their motivation, high levels of volunteerism wear you down and impacts others areas of life. This would land differently if the aim of the organisation wasn't to generate livelihoods. Therefore, a lack of financial resources and inability to generate livelihoods restricted the co-op's ability to build an organisational structure and culture that reflected core aims of equitable livelihoods and democratic leadership. In the inequitable context of the neoliberal city (Soja 2010), extended periods of sweat equity ultimately re-entrenched inequitable conditions and limited connected efforts of participatory, distributional and spatial justice (see 2.5.2). As Soler et al. (2019) highlight, prevalent job insecurity is disproportionately experienced by women, and so working towards feminist principles of agroecology means prioritising economic viability and, "getting realistic agroecological projects going that generate decent remuneration and allow for living in dignity while working in the field."

As well as a lack of financial viability and livelihoods impacting equity in the co-op, this also

affected intentions of generating cultures of care and deep democratic relationships as part of anticapitalist livelihoods. From the inception of LGWC there are records of recognising the need for care and support in the relations and wellbeing of members which reveals a collective intention to co-create a caring, fun, honest, supportive, and flexible pedagogical work environment through a non-hierarchical structure. These intentions of care were placed into documents such as agreed 'Ways of Working'. This can be seen in 'Project Aims and Actions' from 2015 which states: "we will support each other to experiment, learn and take risks around growing food and developing livelihoods." At a co-op development day in 2016 we discussed ways of working together, with the discussion reflecting intentions around communication and collaborative cultures of care:

"Make efforts to figure out and express the reasons behind what you think/say/do and to ask each other about it"

"Openness and honesty even if not easy"

"How much to bring into this space? How/when/where/how much to support each other? Boundaries."

"How is criticism expressed and received?"

"Collaboration – good of the group in the long term" (LGWC Development day 2016)

A written intention for co-op processes was to have, "regular 'away days' to voice group dynamic experiences and ways of working." An ethic of care was also voiced in thinking about how the space could be inclusive in relation to childcare, with an action to "research childcare provision, child friendly. 10 o'clock club" (LGWC Aims and Actions 2015). Through the evolution of the co-op an ethic of care continued to be placed at the heart of the its intentions, for example as a core value in project plans, with development of, "People care, self-care and land care" (LGWC Strategy Review 2019).

I will now reflect on whether these intentions of generating a culture of care were actualised. At regular co-op meetings there was the opportunity for people to express how they were coming into the meeting, which related to life outside and inside the co-op at different times. There were offers of support in response to things that came up and depending on if people wanted there was more time made to discuss these if needed. In this sense the regular meetings to some extent enabled a culture of care to begin to be embedded into the life of the co-op, although this did not necessarily meet the intention of making space to focus on power dynamics within the group. The aspiration of "regular group away days" to voice and reflect on group power dynamics and ways of working became an intention of once-a-year in October 2017. From initial discussion of this idea in early 2016 to the beginning on 2020 the coop did not make a "group away day". While the 'reflections walk' as part of this enquiry generated discussion of political issues, it did not move into *deeper* work

into relationships and power within the group. In terms of a commitment to skill-sharing to challenge power dynamics as part of cooperative livelihoods, with a lack of financial resources to pay for work that needed to be carried out to run the organisation, this was also the case for being able to pay for people's time to do skill-sharing within the coop or pay for training outside of the coop. Although some paid work was afforded, for example for fundraising and finance work, and informal skill-sharing happened in the facilitation of meetings, and in the garden as we grew plants and built infrastructure together. With the co-op being overstretched already, and with members needing to already do other work to make an income, the skill-sharing aim of making equitable livelihoods was limited.

This was also the case in terms of a 'buddy system' set up in 2017 (LGWC Strategy day 2017) to support members to check in with each other about experiences in the co-op, roles members had taken on and how these might change if needed. As far as I am aware, this happened three times in pairs after this plan was made. In terms of intentions to build childcare into our programmes the coop offered childcare as part of a community development process with partner organisations at WLHC in 2018. The coop was able to do this in this case as the process was funded, and otherwise childcare was not built into our volunteer programme or events otherwise (i.e. a creche), although children's activities were offered at events. In terms of internal meetings members did not express needs around childcare.

AMG's earlier comment about juggling lives around the co-op also relates to how co-op meetings were held. In 2016 meetings mainly happened in the daytime, since members had committed one day a week to develop the co-op. From 2017 meetings were mainly held on weekday evenings so as to fit around people's work schedules. Personally, I found this difficult at the end of a working day, and I definitely noticed the difference in the quality of the meetings in terms of focus and of people wanting to get home, with items falling off the agenda due to lack of time. Over time the culture of the meetings was experimented within response to members' needs – whether they were held close to people's work, at places where we could eat together, or in private homes where it was easier to concentrate. Sometimes we would cook with food from the garden, which created opportunities to celebrate our collective work, with shared food bringing a social element to the meetings. This flexible approach to listening to each other's needs at meetings reflected caring intentions to make space that all members could work in. However, a theme of meeting away from WLHC or Pasteur Gardens meant that collective discussions and decisions were made about the sites, that we often weren't present on together.

The above discussion serves to indicate that, although some elements of listening and cultures of care developed (such as in checking in with each other at the start of meetings) many of our plans

for building an ethic of care into organisational structures were not realised. By the end of 2018 coop members described a sense of isolation in their work. Communication was mainly through emails and text messages with coop meetings sometimes not happening once a month, and gardening sessions were predominately run by one or two people once or twice a week, due to limited funding, with not much cross-pollination of working partners as a consequence of other work schedules. With six out of nine members having left the co-operative by May 2020, and one member on sabbatical, this shows LGWC was not retaining members. With "burnout" listed under "Uncertainty and Risk" in the 2017 business plan, it would make sense to connect this to expressions of isolation, and to the co-op's limited capacity and resources for creating a culture of care. This is reflected in AMG sharing that not hitting funding targets and getting rejected applications, "creates a stressful environment" (Interview 2019).

6.3.1 Limited resources and a lack of contact in the neoliberal city

In understanding how experiences of isolation emerged in the co-op, Dunya reflects on how a limited development of supportive cultures relates to the context of London and to having to find other paid work:

"I think is tricky when you're doing a lot of stuff that's new and creating and especially just because of the reality of doing that in London where we've all got other work and other – and like this was kind of this was not enough time or money or even proximity to be as supportive of each other as ideally would have been the way ... because you're the one managing the thing you're doing and there isn't really – you're not sharing work so much you're working relatively isolated in an isolated way on this group thing and something that I definitely missed was I guess approval, affirmation, development those kinds of things" (Dunya 2019).

This highlights how a lack of resources was one reason for a culture of isolation developing, meaning that positive experiences of group work such as 'development' were lacking from LGWC's work environment. AMG highlighted how the co-op being able to pay livelihoods could have shifted the culture of evening meetings and agenda points being rolled over:

"We're massively overstretched as a group and as individuals ... but when you're all so stretched, you know, you're in a Turkish restaurant and its 8 o'clock and you've been up all day you just kinda wanna move things forward and I guess we from experience know that we just need to start making the meetings become paid and maybe more regular or routine."

A lack of contact time impeding cooperative cultures of care and building relationships (see section 5.4) is highlighted by J when saying:

"I think when you work together in a space – so if three of you are working together you're all doing your own different things you can see what people are

doing, how they're coping, if they need help just by being in the same space, then that doesn't build up and up and up. 'Cos you don't have the opportunity to say, Actually I need help here. Or, actually I'm struggling here. Or, you know, can we talk about this? So, I think that's a real barrier to working cooperatively."

In reflecting on what moments did contribute towards building a sense of a collective and caring culture, members often expressed enjoyment, and wanting to do more, of gardening days that we spent all together at Pasteur Gardens. These days were often open to the public and attended by friends and family, ending the working day with a barbecue and a fire. These events would usually happen twice a year to mark the beginning and end of the growing season as special occasions in the calendar. Due to funding limitations and other work commitments, these were among the only times in a season that I was with some members in the garden. This highlights not only was social contact important to coop members, but also that this was on the land the project was organised around. This is supported by the strong emotional ties to Pasteur Gardens expressed by members on the 'reflections walk'; with the site often referred to as, "the land". In the conversations, members said, for instance, "this has been my land", "this has been part of my heart and soul", and, "the land provokes passion" (Reflection walk notes 2018).

When describing what motivated them to be part of the co-op, AMG described interactions with Pasteur Gardens:

"Harvesting our own food, eating food grown by our own fair hands is a good feeling. You know every morning that's a nice time, it's a buzz. Just opening that gate and seeing the container and hearing the birds and walking onto that field and seeing pigeons going in every direction" (AMG 2019).

I also find PG "magical", as was described on the 'Reflections walk'. There's something quite eerie about standing in the middle of the garden with two acres cleared, surrounded by trees in full leaf, and with no-one but the animals and plants for company. It shocks me out of city life and can feel quite lonely at first, coming from bustling streets into this kind of space. After a while, though, things slow down and I settle into the space, gradually becoming more observant of the life around and noticing how the space has changed, whether it's plant growth, colour or, usually, where the foxes have been playing in the growing beds.

Dunya describes transformative learning from interactions with the land in terms of a mutualism with nature:

"[Pasteur Gardens is] quite wild. You see, for me that process of clearing all the brambles, seeing it transform, and then knowing in your transformation of – and that's what's amazing about growing, I guess, in this way – knowing, although you've had your interventions or you've meddled with something, there's still – it's doing its own thing. So, you end up working alongside nature

in that space and often accepting that it has greater power than you. Rather than trying to control the whole thing and manage it."

And in relation to a connected, reciprocal and symbiotic relationship between humans, animals, birds and plant life, J shares her experiences of learning with the land:

"I like working with nature. I think nature it tells you more about ourselves than anything else. That's the journey and it tells you about the state of where we are at the moment ... It teaches you all kinds of things like patience, resilience, try again, this may have failed this year but next time you've learned the lesson – you're learning lessons all the time, so I think it's a real template for life itself."

Learning and having a connection with the land at PG brought co-op members together, with new experiences being shared at meetings or group messages: "How was Tuesday in the garden?"; "I saw a fox!"; "There were a family of parakeets"; "So-and-so popped in with their kids and said that...", for instance. These emotional, ontological and pedagogical connections with land as expressed by co-op members challenge the alienation-disconnection from nature that is part of the image of the metabolic rift (Dehaene et al. 2016), and contains seeds of what is described as urban agroecology in Rosario, Argentina, where it is a way of life with foundations in, "understanding of trans-species ecological interdependencies" and the, "promotion of linkages between soil health, plant happiness and human flourishing" (Tornaghi and Dehaene 2019). This building of relationships and "more-than-human solidarities" (Tornaghi and Dehaene 2019) through contact with the land, and doing this together, connects to findings in the WLHC enquiry about the importance of trust, love and respect as being foundational qualities of relationships in developing deep democracies as part of urban agroecology. The experiences of co-op members working on a piece of relatively wild woodland in an urban environment highlights that contact with land can support development of holistic and transformative agroecologies that, "diagonnalize the natureculture divide reproduced in capitalist urbanisation and refuse to think nature outside the urban" (Tornaghi and Dahaene 2019).

In comparing the quotes from coop members on their relationship with Pasteur Gardens, to descriptions of isolation, it feels sad that as a coop we were not able to spend more time in contact with the land together. What the reflections highlight is that the activity that motivated members, built relationships and was embedded with agroecological learning – learning on the land at PG and being there together – was limited by a lack of financial viability, as members literally had to be working elsewhere, and thus hindered the organisation's ability to build a grounding of a culture of care and democratic relationships.

This section, therefore, has found that the inability to develop financial viability and generate livelihoods limited the co-op's ability to meet aims and intentions in building equity and care into

organisational cultures and practices. An extended period of sweat equity along with piecemeal remuneration placed barriers to participate as a worker-owner, restrained the co-op's ability to build capacity, and wore members down. Furthermore, a lack of livelihoods fundamentally constrained development of deep democracy as contact with each other was increasingly limited, with members having to find other work to meet London living costs. This contributed to a sense of isolation and a lack of time to meet democratic intentions of discussing relationships and power, or what Dunya describes as, "intersectional pains and frustrations" (Dunya 2019), that are a critical feature of deep democracy and *diálogo de saberes* (see chapter 2). With a lack of livelihoods curtailing a common motivation to be present and learn with the land at Pasteur Gardens through more group time there, a lack of financial viability also contributed to debilitating the potential of agroecological learning and building relationships of trust, love and respect (see 5.4) as foundations of "more-than-human solidarities" (Tornaghi and Dehaene 2019). This finding reflects and expands on Pimbert's (2017) assertion that for urban farmers and other citizens to be empowered in contemplating what policies and institutions they want to see and how they can develop them, can only be done with some material security and time available to them.

So, while section 6.1 highlighted that a lack of financial viability hindered generating agroecological livelihoods, with 6.2 outlining internal and contextual factors, the present section has shown that the impact of this was to undermine conditions for putting agroecological principles of equity, social justice and care into actuality within the neoliberal city. In considering viability as the capacity to live, grow and develop, as well as surviving the neoliberal marketplace, then cultures of care are also essential to this in building supportive relationships and engaging with peoples' motivation so as to build and retain capacity. Fundamentally this requires strategies for surviving the neoliberal city market, with long-term financial investment as a means to build resources for equitable opportunities, and time and space to develop democratic relationships towards cultures of care, as vital features of a viable urban agroecology. This might mean 'care' becoming just as essential an element of urban agroecology business plans as purchasing seeds and paying the water bill, with the aim of collectivising care work in line with agroecological principles of social justice (Soler et al. 2019). The enquiry, therefore, agrees that living wages for workers must be a strategic priority in developing urban agroecology (Pimbert 2017) as to build enabling contexts for the actualisation of, "People care, self-care and land care" (LGWC project plan 2019) as part of "anti-capitalist" livelihoods that challenge neoliberal logics (Tornaghi and Dehaene 2019). In asserting the need to secure financial resources in the neoliberal city to generate viable political agroecologies, I now turn to explore some of the tensions in this, considering the risk of co-option into neoliberal logics, and how this relates to non-monetary exchange as an agroecological aspect.

6.4 Prefigurative compromise and *diálogo de saberes* towards viable urban agroecologies

With the assertion that it is necessary to secure long-term financial investment to form viable urban agroecologies in the neoliberal city, this begs the question, *where does long-term financial investment come from without undermining social-justice principles?*

With a contributing factor to a lack of financial viability for UK agroecological producers being an inequitable government subsidy system, favouring large scale chemical production of cheap food, then change to agricultural policy is entirely necessary. This need travels across geographies, as is echoed by a survey respondent in Siegner et al.'s (2019) study into urban agroecology in San Francisco, USA:

"The high price of operating a farm makes it difficult to sustain unless there is general support from the national, state or local level. This is something we need to repeat again and again until there is the political will to see that growing food locally is something worth supporting financially – and seeing it as a public health, as well as an environmental issue."

In recent years the Landworkers' Alliance has taken a leading role in lobbying for changes in UK agriculture policy, as part of broader strategic efforts with the European La Via Campesina networks. This has had some positive effects, with the inclusion of the term "agroecology" in the UK government's new Agriculture Bill, and a commitment to move away from the direct subsidy payments that miss out small-scale agroecology producers towards financial assistance for the provision of public goods (Landworkers' Alliance 2020). While these inclusions are certainly to be celebrated, considering both the historical co-option of agroecology (see 2.1) and the lack of public investment, it would be prudent not to rely entirely on governments in developing viable (urban) agroecologies. This is highlighted by the fact that despite the use of term "agroecology" by the European Union (EU) and the United Nations (UN), public financing from these international bodies to transformative agroecology has been severely lacking (CIDSE 2020, European Commission n.d.). The Green Climate Fund (GCF), for instance, to which the UK government contributed $\pounds 1.44$ billion, invested 10.6% of money for agriculture in transformative agroecology, with 79.8% of the money flows supporting business-as-usual approaches (CIDSE 2020).

Another way to secure financial investment is through grants. While income focused on enabling urban agroecological programmes and initiatives from supportive funders is certainly welcome, it is also important to note that grants come with, "limitations and requirements that may impede the development and implementation of more radical organizational forms, discourses, and strategies" (Sbicca 2012), something that should also be considered in relation to the discussion above on government support. One approach that is building momentum in the UK is that of community shares and crowdfunding to generate financial resources for community-based initiatives through contributions from community members or supporters, who in the former case have a stake in the organisation. London-based Sutton Community Farm (SCF), for instance, which in 2019-20 had an annual turnover of £493,000 with 23% of grants income and supported 9.7 jobs (Sutton Community Farm 2019), raised some of its financial resources to expand its operations through community shares (Sutton Community Farm 2015). Coupled with a model of community ownership in organisational decision-making, this approach works towards food democracy, with this being reflected in economic ownership. A community share offer, however, assumes that there is enough access to cash in the community to generate sufficient investment, which may not always be the case, and also retains a capitalistic logic as profits are extracted from the organisation to individuals through interest payments (Good Finance n.d.). The share offer with SCF was first made in 2015 and was successful after five years of activity; for new projects there may not be relationships and activity to support full investment from community share offers or crowdfunding. It is also worth noting that the organisation relied on grant funding to get up and running, with $f_{89,606}$ raised in grants in 2012–13 for instance, some of which supported 24 paid days' work a month across six job roles (Sutton Community 2012). And so, as with government support and grant funding, while continued exploration of viable models of community financing is certainly valuable strategically, it is best considered as not entirely reliable.

A combination of income streams to generate sufficient financial investment seems the best approach, as asserted by Levkoe et al. (2018) in a paper reflecting on food hub practices for equitable and sustainable food systems:

> "We believe that sustainability comes from pursuing a mixture of revenue sources: farm sales income, program fees (where practical), grants from public sources, support from private foundations, corporate sponsorships, fundraisers, and a solid base of private donors."

This finding, and as the example of SCF, highlights that some engagement with market capitalism, albeit in "alternative" forms at times (Gibson-Graham 2012), is necessary in generating financially viable food initiatives. This agrees with the position that some engagement with capitalist economies is required as to resource land-based practices, that engage in place-based transformations (Escobar and Harcourt 2005). Agroecological movements such as MST in Brazil and the Zapatistas in Mexico, for instance, have created peasant alternatives to neoliberalism, whereby goods can include a monetary exchange or an exchange based on non-monetary reciprocity, depending on how much access to money is required (Vergara-Camus 2014: 209). One example is the aforementioned Zapitista coffee in relation to solidarity economics beyond fair trade (see 5.3), sold across the world as a way to raise financial resources for Zapitista co-operatives on autonomous land (Active Distribution n.d.). Acknowledging that some engagement with capitalist

economies is required as a mode of subsistence means that while an urban agroecological perspective presents a *vision* of human wellbeing connected to food production without being shaped by market allocation (Dehaene et al. 2016), interactions with the market are required, in the short term at least, to generate financial resources towards viable agroecologies.

This is a 'prefigurative compromise', necessary for prefigurative politics, "that are fertile pedagogical grounds for agroecological transitions" (Tornaghi and Dehaene 2019) in inequitable urban space (Soja 2010), for which some resources must be generated in a considered relationship with dominant capitalistic markets. In this way UAGC can develop with sufficient resources to build equity, care and capacity (see sections 5.4 and 6.3) into networks and territories, without which the praxis risks remaining in interstitial and under-resourced 'cracks' (Holloway 2010), limited in its prefiguration of deep democracy. The suggestion of a 'prefigurative compromise' engages with a dynamic tension between the evolution of urban agroecology and neoliberalism. For without resources UAGC leaves itself open to being washed away in the neoliberal dynamics of state restructuring, encapsulated in recent waves of austerity, whereby the community sector is required to take responsibility without power (Peck and Tickell 2002: 386) and run on volunteerism without public funds (Blond 2010). Meanwhile the retraction of state funds for public goods, creating an entrepreneurial necessity if urban agroecology is to survive, can reinforce mission drift away from social justice and into neoliberal logics.

This dynamic tension between the need to resource efforts towards structural transformation, and risk of co-option in interaction with neoliberal markets, can push the development of urban agroecology forward in creating a dynamic space for innovative and viable political praxis, as highlighted by Levkoe et al (2018: 114):

"We are continually re-evaluating our business plan and questioning how well we are balancing social goals with financial needs. It is a complex problem with many moving parts....These financial tensions do not mean that a food hub's financial and social goals and objectives are contradictory. *In many ways, these tensions propel our work forward* [emphasis added]."

Considering this, UAGC can learn from the tactics of Global South agroecology movements that engage in the dynamic tensions of dual efforts to lobby state powers and to assemble autonomy from them, while engaging with capitalist markets for monetary resources and also making spaces of prefiguration away from neoliberal logics (Shattuck et al. 2015: 430). Ultimately urban agroecology, like urban agriculture, must by necessity be radical and reformist (McClintock 2014) if the praxis is to survive and thrive in dominant neoliberal conditions.

Expressions of this dynamic tension emerged in LGWC's early attempts at a prefigurative compromise through hires for film shoots on the land and for corporate volunteering. J expressed

her fears that the co-op might have to do more such activities in order to survive: "I hate to have to rely on corporates [sponsorship and awaydays] but that's gonna have to be as well, of course. Just other ways of not depending on finance if we're not going to be fundraising" (J 2019). AMB, too, shared concerns at hiring the land while thinking of enterprising ways to generate income: "I guess [it's] selling the land [through hires], to an extent ... but how many times do we *sell the land* [epmphasis added] to Dolce and Gabbana [i.e. photoshoots for fashion brands]?' In discussing what kinds of income compromise might be appropriate for LGWC, I developed greater understanding of what my colleagues' 'red lines' were, and also what the underlying political approach was – what really mattered. The enquiry finds that a pragmatic compromise can be a point of tension for deep democracy to emerge, as dialogue engaging with difficult questions about political values and viability can support the development of political understandings and collective principles.

In moments like those described above, if there also exist transformative cultures that support diálogo de saberes (DDS), I suggest that they can support dynamic tension and decision-making to anchor a 'prefigurative compromise' in agroecology's political roots. Having suggested in chapter 5 that a 'critical lovingness', together with creative popular education as part of a transformative agroecology learning framework (TALF), can both support cultures for DDS, these approaches can contribute to keeping a prefigurative compromise moving towards an "emancipatory" urban agroecology (Tornaghi and Dehaene 2019). For example, the suggestion of an anti-oppression framework underpinning a 'critical lovingness', can support decisions around commercial activities that consider the relationship between organic food and gentrification. Creative popular education methods, too, are well situated to help groups work through practical decision-making in moments of dynamic tension, building relationships and democratic skills in horizontal processes. Without DDS a prefigurative compromise is severely limited in its emancipatory potential, and leaves urban agroecology exposed to co-option in neoliberal logics and green capitalism. However, long-term financial resources having been identified as important in developing equitable urban agroecologies, with time and space in the neoliberal city to deepen "more-than-human solidarities", a prefigurative compromise can support emergences of DDS. The thesis therefore proposes that a strategic symbiotic combination of diálogos de saberes with a 'prefigurative compromise' for generating viable financial models in neoliberal contexts, is necessary to situate deep food democracy in the evolution of urban agroecology.

This suggestion builds on calls for alternative economic practices to develop transformative urban agroecology, including, "the re-localisation of plural economies that combine both market oriented activities with non-monetary forms of economic exchange based on barter, reciprocity, gift relations, and solidarity" (Pimbert 2017: 17, Tornaghi 2017). In establishing the importance of

livelihoods for workers to support equitable process and cultures of care in developing deep democracy, the thesis prioritises a prefigurative compromise to generate financial resources over gift economies, time banks, and alternative currencies (Tornaghi 2017) in immediate strategies. In the case of LGWC, although the co-op entered into gifting exchange with growers for tools and resources, or with people volunteering time in the garden in exchange for bags of produce, there was a need for money to survive – and we didn't generate enough of it to meet the needs of workers or aims of the project, with detrimental impacts as echoed across alternative food networks (Connelly et al. 2011, Siegner et al. 2019, Daftary-Steel et al. 2015).

As regards to paying for shelter, a major living cost for workers in London and a reflection of social inequity, I look to a project called the Rural Urban Synthesis Society (RUSS 2020) in South London, which links affordable community-owned urban housing with peri-urban food growing in an exciting agroecological solution. Having set the organisation up in 2009, RUSS are working towards building 33 homes in 2019, which is a massive achievement considering the competition with developers for urban land. But the process highlights too that setting up small-scale affordable housing in connection with growing space in London, a city of nearly nine million people, can take years. Therefore while efforts to continue reducing dependency on capitalist relations is vital in commons development, especially with care work, food and housing (De Angelis 2017), the pace at which these collective projects can materialise, and the human energy required mean that a shortterm strategic focus in supporting UAGC workers must be to meet their need for a fair livelihood to cover housing costs (see 6.3). This of course may vary in different urban environments depending on processes of financialisation and privatisation of land as linked to property prices and rents. The thesis proposes that securing long-term financial investment and supporting fair livelihoods as a priority can create more stable, equitable foundations in UAGC networks, from which to develop, in the medium to long term, non-commercial exchange through commons-tocommons economies along the food-housing-energy nexus.

In this section I have explored ways in which to generate long-term financial investment and sustainable incomes to evolve viable urban agroecologies. Within the limitations of different options, I highlighted that sourcing diverse streams of income is required so as to not put all the urban agroecology eggs in one basket, so to speak. This includes a 'prefigurative compromise' with market-orientated activities as a necessary way mode of subsistence to resource transformative place-based action in an inequitable context of the neoliberal city. *Diálogos de saberes* is highlighted as a complementary strategic focus so as to support engagement with a dynamic tension between UAGC and neoliberalism, inherent to a prefigurative compromise, towards the emancipatory qualities of the former. The section concludes with an assertion that this strategic approach prioritises sourcing financial investment over non-monetary exchange in the short-term, so as to

ensure living wages for workers and strengthen equitable UAGC networks as a platform to develop non-monetary economies in the medium to long-term. In considering the enquiry's findings on viability I now turn to the thesis objective concerning whether the organisational structure of worker co-operatives is an elevating model for urban agroecology.

6.5 Co-operatives beyond 'the worker' towards deep food democracy

On the 'reflections walk' one co-op member commented that the workers' co-operative (WC) structure was, "moulded by the land" and that it was a "fluid" structure that could change with the land and the intentions for its use (Reflection walk notes 2018). There was a sense in the group that the land at Pasteur Gardens was the priority, and that the WC was developed for the land rather than the land being developed for a WC. So, in terms of evaluating whether a workers' co-op is an elevating model for urban agroecology, I consider the organisational structure in relation to experiences of LGWC in connection with the land, as well as findings concerning viability and deep democracy in earlier sections.

In term of generating financial investment the workers' co-op model had mixed results. While the WC structure enabled the group to generate trade income and apply for the different kinds of grant funding, with our version combining not-for-profit status with commercial activity, the ownership model limited longer-term financial investment from private individuals in exchange for ownership. This had positive and negative effects, as it locked out investment capitalism from the internal logics of LGWC, but at the same time disabled the possibility of raising investment through community share offers, for instance (see 6.5). Private individuals could always make *donations* if they wished, without resultant involvement in organisational decision-making. To engage with community ownership models and finance related to this, the workers' co-operative model would fundamentally become redundant. I am not highlighting this as a major reason for the co-op's inability to generate financial viability (as outlined in section 6.3), but that the workers' co-operative structure limited one element of the diverse possibilities for income streams. Broadly speaking, however, a workers' co-operative is relatively suitable for engaging in a strategy of prefigurative compromise, as the model enables a flexible engagement with a "dynamic tension" (see 6.4) with being able to trade while also being open to funding, if not-for-profit status and social and environmental aims are written into the constitution.

One of the reasons workers' co-operatives are supported as anti-capitalist (Gibson-Graham 2012) is that they enable workers' empowerment and agency (see section 3.2), something that attracted the group to the model. J highlights how a WC enabled one to mould one's own environment, albeit with additional responsibility: "Obviously there's the responsibility and that weighs a bit. But at the same time it's really exciting. It's empowering. And the fact that in the long term you can empower others as well. So it's a balance between empowerment and responsibility... You're in charge of your own destiny. Which has to be empowering. But at the same time there's so many more things to think about, but I don't think that's a bad thing."

When asked about her experience in the WC, Dunya reflected that the self-organisation involved was a motivation for involvement in the project: "The satisfaction of the end of the day, at each day, which is a kind of – to get satisfaction out of something that is self-organised, that you're part of every stage of the process, is a real motivation." These experiences of LGWC highlight that the WC structure can support worker agency and empowerment with management responsibilities for the organisation as a whole.

However, as regards to facilitating the land at Pasteur Gardens as a "community space", which was a key aim for LGWC (LGWC Project Plans 2017, 2018), I find that the WC had a disabling effect. It was not just a model for a food-growing enterprise, it was the model for managing a piece of public land with a food-growing element, with the intention to open up access to the space decades after the gates had been closed. With a WC structure this meant that decisions made about what happened on the land and how it was managed were made by the worker-owners, while other people who spent time on the land or lived nearby were *consulted* on what should happen. This includes garden volunteers, local residents, teachers and young people attending schools' sessions, sessional workers, and people buying produce. This consultatory dynamic limited relations between those with worker identities and those with non-worker identities to *power-for* rather than *power-with*, where decisions were made by worker-owners on behalf of stakeholders who weren't present in decisions.

In terms of the land being part of an agroecological food system within the city, and taking holistic, whole systems approaches as emerged in the WLHC enquiry through community definitions of health (see 5.2), the WC structure restricted inclusion of different perspectives in evolving the emerging nutrient cycles. The WC restricted dialogue between food producers and other actors in the food system on key decisions (de Molina 2013; Anderson et al. 2018), thus hindering potential for solidaristic relations and deep democracy through the organisation managing the land. This lack of dialogue not only restricted building unexpected alliances and mapping of power, it also curtailed capacity-building through a lack of clear organisational avenues for non-workers to take ownership and action on the land. The latter could have been beneficial to the aims of the project, since worker-owners were overstretched (see 6.3). Therefore, as an element of deep democracy is to take a sophisticated approach to commons (see 2.3), and as commons are established and maintained through joint action (Ferguson 2012), then the WC limited capacity for commons creation and thus

deep democracy. This position challenges the assertion that a WC is a model to emulate in the management of public land as commons (Renzel 2017). Instead this thesis agrees that UAGC initiatives managing land and producing food must be run by and for the people they serve, with at the very least some degree of local ownership and control (Levkoe et al. 2018b, Berti and Mulligan 2016). In considering the finding in the WLHC enquiry of the importance of democratic and intergenerational *leadership* (see 5.12), I wonder how the land, decision-making and shifting power dynamics might have benefitted if, for instance, the young people that attended schools programmes at the site had been involved in organisational decisions.

So, the thesis finds that the WC model builds agency for those in positions of power, namely the worker-owners, and that these opportunities for agency can be expanded beyond the worker identity to build broader coalitions of co-op members, thus broadening possibilities for dialogue across positionalities and generational perspectives in decision-making. This is not to assume that all people that came into contact with PG would want to participate in organisational structures and decisions, but rather that there should be transparent avenues of opportunity to do so if desired. A broadening of opportunity for agency in land decision-making processes beyond worker identities, with an anti-oppression framework embedded in organisational structures (see section 5.3.1), can support co-operative structures to promote justice internally and externally (Alkon 2013). This finding is particular in that it concerns a WC based on public land that aims to support community space, but I would also propose that even for WCs based on private land that involving other stakeholders in decision-making structures can be beneficial for developing urban agroecology with deep democracy. There is also potential for intra-dialogue between co-operatives representative of different positionalities in nutrient cycles, i.e. food producers and consumers, that make up a network of co-operatives.

With calls for deepening democracy in urban agroecology through expansion of direct democracy (Pimbert 2017), experiences of LGWC suggest that expanding membership of co-operatives beyond a worker identity can be a step towards developing prefigurative organisational structures that encourage 'intercultural contact zones' (Santos 2016: 234) towards emergences of *diálogos de saberes*. This proposal on urban agroecology organisational structure can work with other thesis findings in terms of embedding 'critical lovingness' and creative popular education in organisational practices, and a strategic prefigurative compromise to raise resources for equitable opportunities and time for generating cultures of care. As a practical direction, the Community Interest Company (CiC) legal model in the UK can be a useful tool to evolve urban agroecology as suggested by Dehaene (et al. 2016), as it has flexible membership regulation for developing appropriate cooperative appropriate for food democracy in different locales (Hassanein 2003). In the next section I summarise this chapter and include practical suggestions for developing viable urban

agroecologies in the neoliberal city.

6.6 Summary and practical learnings

This chapter has explored the following sub-questions of the thesis through an insiders' perspective in a newly-formed WC, as part of an emerging urban agroecology in London, UK (Tornaghi and Dehaene 2019):

How can urban agroecological initiatives be viable in the neoliberal city?

Is a workers' co-operative an elevating model in developing urban agroecology towards food democracy?

In response to these questions the enquiry generated new empirical research to understand how urban agroecology initiatives can live, grow and develop with engagement on issues such as, "the volatility of employment and earnings, the long-term viability of co-ops ... and problems of democratic governance within co-ops" (Pencavel 2012: 3). With little research focusing on the entrepreneurial activity of urban agriculture in Europe (Specht et al. 2016), the financial information presented in sections 6.1 and 6.2 and analysis of why LGWC was unable to generate fair livelihoods and cultures of care in section 6.3, contributes an insider community-level study to understand barriers and future strategies (sections 6.4 and 6.5).

The chapter finds that the co-operative was unable to meet business plan targets of both trade income and funding, thus curtailing the development of livelihoods due to a myriad of contextual conditions and internal factors (6.2). While fundamentally the socio-ecological benefits of agroecological farming are not valued by the current political economy as reflected in inequitable government policy, other dimensions such as high London rents, a competitive funding sector and insecure land tenancy all contributed to the co-op experience financial instability. Coinciding with these a lack of fundraising and business skills, decision-making that overstretched capacity and resources, and a wavering focus on strategic planning also played a role within the co-op. These internal and external factors in connection to LGWC aims reflected the "trifecta of urban agriculture", which speaks to a co-generated culture within the sector, funders and government, a culture that sets aims which are unachievable without long-term investments from external funds (Daftary-Steel et al. 2015) (see 2.5.2). I assert that UAGC inherits the trifecta from urban agriculture, with the addition of a fourth element of generating community space, making a **quadfecta of urban agroecology**.

The internal and external factors, with an underlying quadfecta of expectations, coalesced to draw out a period of sweat equity with high-levels of volunteerism in LGWC, resulting in an inequitable barrier to becoming a worker-owner and contributing to members' experiences of isolation. This curtailed the organisation's ability to retain and build capacity, and limited time to develop deep democratic relationships and cultures of care on the land as members literally had to be somewhere else to make a living. The thesis, therefore, finds that long-term financial investment must be a key strategic focus in generating viable and importantly equitable urban agroecologies that are capable of paying fair wages including collectivised care work (Soler et al. 2019, Pimbert 2017). In assessing options to do so I find that a diverse range of income streams are necessary in view of the limitations of each, and that some interaction with market activities is necessary to engage in land practice in the neoliberal city, with place-based transformations (Escobar and Harcourt 2005). Considering the social justice aims of agroecology and the need to resource these in an inequitable context with risks of co-option into neoliberal logics, I describe the need for considered interactions with the market as a 'prefigurative compromise' that engages with this "dynamic tension" (Levkoe et al. 2018).

In sum the thesis finds that a strategic 'prefigurative compromise' is necessary so that prefigurations of UAGC can actually exist, and proliferate with equity, care and capacity in networks beyond interstitial cracks in the city. In an extension of this I propose that a symbiotic relationship between a prefigurative compromise (PC) and diálogos de saberes is necessary in evolving viable urban agroecologies with deep democracy; as DDS can support moments of dynamic tension towards agroecology's political roots, and a PC can fund efforts to create democratic and just (distributional, procedural and spatial) cultures towards emergences of DDS. In terms of this relationship I introduce findings from the WLHC enquiry (chapter 5): a 'critical lovingness' underpinned with anti-oppression frameworks (section 5.4), and creative popular education as part of a transformative agroecological learning framework (TALF) (Anderson et al. 2018) (section 5.1) as supportive elements in moments of dynamic tension to retain connection with an "emancipatory" urban agroecology (Tornaghi and Dehaene 2019). I note that a PC stipulates a short-term strategic focus on financial investment and living wages for workers over nonmonetary exchange such as time banks (Tornaghi 2017). This is with the view that building stable and equitable foundations in UAGC networks can support non-monetary exchange through commons-to-commons economies in the medium- to long-term. This position maintains the vitality of gifting and other non-commercial exchange in urban agroecology spaces every day.

As to the question of whether the WC is an elevating model for UAGC, the enquiry found that the organisational structure limited community financing as a stream of income, although it can be generally well situated to engage in a prefigurative compromise. The study also found that in efforts to develop community space the organisational structure disavowed equitable dialogue between producers and other actors in the emerging nutrient cycles as a key element of food system transformation (de Molina 2013; Anderson et al. 2018), creating consultatory dynamics and limiting

solidaristic relations. As the WC was found to limit capacity building for commons creation and democratic relationships, the findings **challenge the view that a workers' co-operative is a model to emulate in the management of public land as commons** (Renzel 2017). The thesis, therefore, suggests that to engage in direct democracy in evolving urban agroecology (Pimbert 2017) that **co-operatives should broaden membership to include other stakeholders beyond the worker identity**. This approach, I conclude, can support the development of prefigurative organisational structures that encourage 'intercultural contact zones' (Santos 2016: 234) towards emergences of DDS in tandem with a 'critical lovingness' underpinned with anti-oppression frameworks, and creative popular education as part of a TALF in Europe. I now summarise practical learnings and suggestions based on the experiences in LGWC, before synthesising findings across the two enquiries in relation to the aim, objectives and questions of the thesis in Chapter 7.

6.6.1 Budget estimate, practical learnings and suggestions

A suggested retrospective budget for setting up LGWC at Pasteur Gardens for the first two years is shown in Table 10. The aim is to provide an estimate of what financial investment and income might be needed to generate an equitable urban agroecology with capacity to spend time developing cultures of care. The figures are estimates based on what investment the co-op generated, and what was identified in later years as needed to meet the aims of the project (see section 3.1). Considerations behind the numbers can be seen in 'Appendix D'. The budget does not include care work as suggested in section 6.3, as I felt this needed more research in order to understand how care work might be reflected in set-up costs for an urban agroecology initiative. The budget states that $\pounds 65$ k is needed for capital costs, $\pounds 144$ k for wages, and $\pounds 21$ k for running costs, making a total of $\pounds 230$ k over the two years. With agroecological projects in London like Organiclea, Growing Communities and Sutton Community Farm all generating annual turnovers beyond this figure, the budget is a realistic estimate.

Budget Area (£)	Year 1 (£)	Year 2 (£)	TOTAL (£)
Mains irrigation and toilets	4,000		4,000
Tools storage and office	11,000		11,000
Polytunnels and land preparation works	15,000		15,000
Multi-functional covered space – packing house, kitchen,		30,000	30,000

classroom			
Garden Infrastructure i.e. irrigation, netting, membrane	5,000		5,000
TOTAL CAPITAL COSTS	35,000	30,000	65, 000
2 Grower roles, 3 days a week, £18,000 pro rata	36,000	36,000	72,000
Organisational role A (funding, finance, business and organisational development), 3 days a week, £18,000 pro rata	18,000	18,000	36,000
Organisational role B (community development, education and volunteering), 3 days a week, \pounds 18,000 pro rata	18,000	18,000	36,000
TOTAL WAGES	72,000	72,000	144,000
Garden Sundries (e.g. seeds, propagation materials, propagation trays)	2,000	1,000	3,000
Insurance and water bills	500	500	1,000
Transport and packaging	1,000	1,000	2,000
Accountancy and office costs	1,000	1,000	2,000
Rent	1,500	1,500	3,000
Volunteer programme costs (lunches, travel, celebrations)	5,000	5,000	10,000
TOTAL RUNNING COSTS	11,000	10,000	21,000
TOTAL	118,000	112,00	230,000

Table 10: Estimated retrospective budget for setting up LGWC at Pasteur Gardens in the first two years

In terms of shifting economic conditions to create a more enabling environment for viable urban agroecologies, I make the following suggestions:

• UK local and regional governments taking up the Preston model' (Reynolds 2017) to support co-operative enterprises with public procurement contracts.

- Extensive business and organisational development training being situated in UAGC training programmes such as FarmStart.
- Regional co-operative banks that support co-operative enterprise with grants, loans and advice, as seen in the Basque region, Spain, in the 1960s (Gunn 2006), should be established.
- Lobbying at different scales for shifting and generating agriculture subsidies towards financial assistance for the provision of public goods, continues to be very important.
- UK agroecology movements to support campaigns for a Universal Basic Income (UBI) (Basic Income UK n.d.)(as previously suggested in Pimbert 2017).

The 'Preston Model' highlights how at a time of super-austerity, a borough council has been able to support co-operative enterprises within a region by awarding public procurement contracts (Reynolds 2017). In the case of LGWC, procurement contracts for education services and food provision would have supported building a viable business plan. This has potential to connect food and health with contracts with regional public health care organisations. In terms of extensive organisational and business development training, UAGC training programmes could take inspiration from models such as the School for Social Entrepreneurs in London which provides funding, and a year-long course covering different aspects of setting up a viable social enterprise. Business training can support practitioners arriving at tensions between a prefigurative compromise *too far* and social justice to have business acumen in understanding the social and financial possibilities in decision-making.

The Basque region in Spain is home to one of the world's thriving co-operative sectors and to Mondragon, the world's largest worker-owned co-operative. With regional co-operative banks providing loans, grants and business advice from the 1960s, this model highlights how alternative banking institutions can support co-operative development. The Loans for Enlightened Agriculture Programme (LEAP) recently began a similar mixed approach to support agroecology initiatives developing in the UK. The expansion of this programme, with inspiration from historical cooperative movements such as in the Basque country, can support viable (urban) agroecologies to evolve.

The need to shift UK government agriculture policy away from an inequitable subsidy system towards financial assistance for public provision of goods is essential to levelling the economic playing field for (urban) agroecological farmers. To have received a subsidy to grow agroecological food in the first three years of LGWC's life would have made an enormous difference in its financial planning, its working towards livelihoods, and its meeting project aims. The continued lobbying efforts of LWA at a national level, and at a regional level, such as with the Community

Food Growers Network, can support (urban) agroecologies to increase viability with policy change and public investment. Finally, the suggestion that agroecology movements should support campaigns for Universal Basic Income (UBI) came about in an interview with LGWC member Dunya. In reflecting on the power dynamics of co-op members managing the land and facilitating public volunteer sessions, she suggested that a basic income could support a more equitable basis for co-developing community space at PG. The reasoning was that if people had their basic needs met there would be less emphasis on the need to pay workers to facilitate gardening sessions, and that this would create opportunities to break down the power dynamics of who was a paid project worker and who was a volunteer. UBI could have the positive consequence of increasing capacity for commons-creation and deep democratic relationships as part of UAGC.

Table 11 below outlines internal learnings from LGWC predominately based on analysis in 6.2.2. Some of these may be obvious in developing viable organisations, but as a group of new-entrant growers these points would have been useful reminders, certainly in terms of my own learning for the future. One point not previously mentioned is the proposal for a steering committee. At a coop development meeting in 2016 it was noted that, "It is felt that a Steering Committee should be formed to help guide the project. A list of potential community representatives to be collated" (LGWC meeting 2016). This was one point that slipped off the agenda, and on reflection it could have supported our group to set up viable operations on the seven acres of land with guidance and advice, as well as a way to solidify relationships and partnerships.

	Practical learnings from LGWC based on analysis in 6.2.2
1	Use organisational tools to understand where skills gaps are in the collective i.e. organisational development and make action plans to respond to these, through either skilling up within the organisation, recruitment or external advice/ business support.
2	Make plans with carefully listening to capacity and resources available. If there are not adequate resources and/or capacity, maybe don't start the activity.
2	Develop a cogent business plan and review it regularly.
2	Secure adequate financial investment to start programmes and activities including infrastructure requirements.
2	Build care work into budgets with the aim to collectivise these i.e. childcare,

	worker support, and group reflections on power dynamics.
3	Consider a steering committee to offer experiences, guidance and support in the early stages of development, or until there is enough experience within organisational structures.

Table 11: Practical learnings/suggestions from experiences with LGWC (in no particular order)

Chapter 7: Conclusions

This thesis has explored how the emerging praxis of urban agroecology (UAGC) can evolve with a central feature of deep food democracy whilst surviving and thriving in the neoliberal city. This research direction was taken as democracy is central to agroecological visions and practice (Anderson et al. 2019, de Molina 2013), coupled with the observation that financial viability has limited the progression of socially just urban agricultures (Siegner et al. 2019, Daftary-Steel et al. 2015, Connelly et al. 2011). As the study is based in Western Europe, where agroecology is at risk of being co-opted away from its political origins (Altieri and Holt-Giménez 2016, Mama D and Anderson 2016) and epistemic shifts are required to challenge food movement missionary complexes more broadly (Bradley and Herrera 2016, Slocum 2006), the research has engaged with transformative pedagogies as a fitting approach to develop urban agroecology with deep democracy.

Through community-level insider action research (AR), set within London's emerging urban agroecology movement (Tornaghi and Dehaene 2019), I have contributed empirical research to the young praxis through evaluation of policy-creation, organisational structure and economic viability in terms of deep food democracy. The thesis contributes that the joint development of *diálogos de saberes* and a 'prefigurative compromise' with the market, to generate viable place-making transformations in inequitable neoliberal contexts, is necessary to evolve urban agroecology with deep food democracy. I propose that additional findings can support this strategic relationship in developing UAGC towards its "emancipatory" potential (Tornaghi and Dehaene 2019), these being a 'critical lovingness' embedded in organisational structures and underpinned by an anti-oppression framework, creative popular education included in a transformative agroecological learning framework (TALF) for Europe (Anderson et al. 2018), and extending co-operative membership beyond worker identities.

In this final chapter I synthesise the findings from the dialogic enquiry across the policy process in the food hub at Wolves Lane Horticultural Centre (WLHC), and the reflective spaces created in London Grown Workers' Co-operative (LGWC), to connect these with overarching questions the thesis was framed by. The chapter has four key sections. In section 7.1 I synthesise the key findings with the inclusion of how these relate to thesis objectives and sub-questions. Limitations and methodological learnings of the study are critically reflected on in section 7.2, before calling attention to contributions to knowledge made in 7.3. The chapter is concluded with recommendations for future praxis development (7.4).

7.1 Summary of key arguments

In outlining the key arguments of the thesis, I relate these to the overall question, key objectives and sub-questions in the text. As a point of reference for the reader these are presented in Table 12 below.

Aim/objective/question	Description	
Aim	To develop understandings of urban agroecology with a focus on deep food democracy and how this relates with tensions of trying to exist in a neoliberal city.	
Overall question	How can urban agroecology evolve with food democracy as a feature whilst surviving and thriving in the neoliberal city?	
Objective 1	To co-produce a just democratic process in shaping foundational principles of a food hub with urban agroecological intentions	
Sub-question 1	How can a food hub develop urban agroecology with a central tenet of food democracy?	
Objective 2	To develop understanding of how urban agroecologies can be viable in a neoliberal city economy	
Sub-question 2	How can urban agroecological initiatives be viable in the neoliberal city?	
Objective 3	To explore with co-workers our individual and collective learnings in developing a workers' co-operative as an elevating organisational structure for urban agroecology	
Sub-question 3	Is a worker's co-operative an elevating model in developing urban agroecology towards food democracy?	

Table 12: Thesis aim, objectives and key questions

Analysis of the food policy enquiry found that creative popular education (PE) methods contributed towards the creation of holistic community definitions of health and "intercultural contact zones" (Santos 2016: 234), with budding emergences of *diálogo de saberes* (DDS) and the centring of translocal foodways as local. In connection to this I hold that the food policy process took steps towards breaking out of the "local trap" (Born and Purcell 2006) and challenged

dynamics of "bringing good food to others" (Guthman 2008) as undermining aspects in alternative food movements. Based on the above I argue that **creative popular education should be included as feature of a transformative agroecological learning framework** (TALF) (Anderson et al. 2018) in Europe, strengthening conditions for pillars such as 'horizontalism' and 'combining political with practical'.

In terms of supporting and defending a transformative culture that underpinned a burgeoning DDS and centring of translocal foodways in the policy process (Gamauf 2019), it is suggested that an anti-oppression framework be integrated into organisational structures, with consideration of how social inequities manifest in community and food movement spaces (Alkon and Agyeman 2011, Sbicca 2012). I hold that the framework can support the evolution of arising discussions of power, and hold the tension between the final food policy principles of culturally-appropriate foods and ecological considerations in a "just sustainability" (Agyeman 2013). The enquiry also found that relationships were an important element of making a democratic space in the food policy enquiry, with participants highlighting characteristics of love, respect, and trust as vital. In connecting these characteristics to critical pedagogies that feature love as foundational to building solidarities in the transformation of oppressive ideologies and practices (Darder 2002, Freire 2000, hooks 2000), I propose that a 'lovingness' be embedded into organisational structures to support democratic relationships and cultures. This is considering that respect, trust and love are some integral characteristics of equitable dialogues; listening is a fundamental part of *respect, trust* is essential to building networks, and love begets solidarity. With a 'lovingness', combined with anti-oppression frameworks embedded in organisational structures as an approach to map power, I propagate that a 'critical lovingness' can be a supportive "frame" (Anderson et al. 2019) to foster democratic cultures towards diálogo de saberes.

Therefore, in terms of **objective 1** and its related sub-question, the thesis proposes that embedding a 'critical lovingness' underpinned with an anti-oppression framework into organisational structures, and implementing creative popular education as part of a TALF in Europe, can support transformative relationships and cultures for the food hub to develop with a central tenet of food democracy. Furthermore, I extend the finding, based on critical reflections on the policy process, that a democratic and intergenerational *leadership* of learning processes should be extended to organisational structures.

In understanding why LGWC took limited steps towards financial viability and the ability to generate livelihoods for worker-owners, I outlined a host of internal factors and external conditions (see section 6.2). Underlying these was the "unattainable trifecta of urban agriculture" (Daftary-Steel et al. 2015) as reflected in LGWC's aims, which were insurmountable without external

financial investment. I highlight that UAGC inherits the trifecta from UA, and add the expectation to run community space, making a 'quadfecta of urban agroecology'. The lack of sufficient financial investment in LGWC meant that worker-owners had to make livelihoods outside the coop to meet high living costs and particularly rents for shelter. This contributed to a loop of unviability, with the organisation having inadequate financial resources to build capacity, and consequently lacking capacity to generate financial resources. An element of this loop was a curtailed capacity to meet intentions of building cultures of care, fundamental to "anti-capitalist" livelihoods (Tornaghi and Dehaene 2019), which assisted in worker owners' experiences of isolation. In light of the above analysis, the thesis asserts that financial investment is a strategic necessity for UAGC towards deep democracy - in order to resource "anti-capitalist" livelihoods (Tornaghi and Dehaene 2019), which capacity to engage in collectivising care work (Soler et al. 2019), hold discussions of power dynamics as part of cultures of care, and generate equitable opportunities in an inequitable environment.

In exploring how appropriate financial investment can be generated I find that a myriad of income streams is necessary, as each stream has its own limitations so as not to put all the (urban) agroecological eggs in one basket, so to speak. Importantly, this includes strategic engagement with the market, albeit including "alternative" manifestations (Gibson-Graham 2012), so as to generate resources for land-based practices, that engage in place-based transformations (Escobar and Harcourt 2005). This I describe as a 'prefigurative' compromise so as to make fertile pedagogical grounds for agroecological transformations (Tornaghi and Dehaene 2019) in inequitable urban space (Soja 2010), whereby some resources must be generated through markets antithetical to agroecological visions. This compromise is imperative, I claim, so that UAGC can develop with sufficient resources to build equity, care and capacity into networks and territories, otherwise the praxis risks remaining in interstitial and under-resourced 'cracks' (Holloway 2010) that are limited in their prefiguration of deep democracy. With beginnings of prefigurative compromises in LGWC, I assert that these moments of "dynamic tension" (Levkoe et al. 2018b) between agroecology principles and co-option by neoliberalism, offer opportunity to engage in deep democracy through building understanding of collective politics. An example of a dynamic tension for urban agroecologies to consider is the hiring of land or space, or holiday lets, as seen in farm diversification in UK farming (Gasson 1988). In terms of a prefigurative compromise strategy I argue that a short-term prioritisation of raising of financial investment to generate fair wages for workers over economic strategies of gifting, timebanks and alternative currencies (Tornaghi 2017), is necessary to support the building of equitable and stable foundations in UAGC networks, from which to develop non-commercial exchange through autonomous commons economies in the medium to long term.

Therefore, in terms of **objective 2** and its related sub-question, the thesis finds that a 'prefigurative compromise' with the market, as part of diverse income streams, is required to support the prefigurative development of agroecological principles in actuality within the disabling and inequitable conditions of the neoliberal city. I suggest that UAGC practitioners can find inspiration in rural peasant movements, such as the Landless Workers Movement (MST) in Brazil and the Zapatistas in Mexico, who engage in the dynamic tensions of dual efforts to lobby state powers and to assemble autonomy from them, whilst engaging with markets for monetary resources and also making spaces of prefiguration away from neoliberal logics (Shattuck et al. 2015: 430, Vergara-Camus 2014).

The workers co-operative (WC) model was found to support agency for worker-owners in taking control of their labour and offered a flexible commercial and not-for-profit organisational structure in order to engage with a 'prefigurative compromise', albeit with limiting community finance. However, in terms of generating community space as an aim of LGWC, analysis found that the model limited dialogue between different actors in contact with the land at Pasteur Gardens, and across different positionalities in the emerging nutrient cycles (de Molina 2013, Anderson et al. 2018). This was found to create consultatory power dynamics between workers and non-worker identities, both limiting the potential of building "more-than-human solidarities" (Tornaghi and Dehaene 2019) within the organisational structures managing the land, and curtailing capacity for commons creation. The thesis finds that UAGC co-operatives can therefore deepen democracy by expanding membership beyond the worker identity so as to build agency across different positionalities in decision-making processes.

Therefore, in terms of **objective 3** and its related sub-question, the thesis finds that although the WC builds agency for workers, the model creates a consultatory power dynamic between workerowner and non-worker identities; thus co-operative models that expand membership beyond worker identities can support deep democracies as part of UAGC. This could include producer cooperatives as part of broader co-operative models with representation of different positionalities in the food system.

The findings outlined in relation to the objectives and sub-questions of the thesis coalesce to respond to the overall aim and question, *How can urban agroecology evolve with food democracy as a feature whilst surviving and thriving in the neoliberal city?* In terms of the thesis's assertion that urban agroecologies must necessarily engage in a 'prefigurative compromise' (PC) with the market, this risks the young praxis being derailed into a *compromise too far* and becoming entrenched in neoliberal logics and green capitalism. The thesis proposes, therefore, that if transformative cultures also exist supportive of *diálogo de saberes* (DDS) as critical to agroecological transformations (Martínez-Torres

and Rosset 2014, Anderson et al. 2018), then this can be a complementary frame in moments of dynamic tension and decision-making to anchor a 'prefigurative compromise' in agroecology's political roots. I describe this relationship as symbiotic, as without DDS a 'prefigurative compromise' is severely limited in its emancipatory aims, and with long-term financial resources having been identified as critical to make time and space to deepen solidaristic relationships through cultures of care in the neoliberal city, a PC can support the making of equitable places towards *diálogo de saberes*.

Previous findings relate to this as a 'critical lovingness' underpinned by an anti-oppression framework can support decisions around commercial activities considering the relationship between organic food and gentrification, and creative PE methods are well situated to assist groups to work through practical decision-making concerning moments of dynamic tension, with building relationships and democratic skills in horizontal processes. Furthermore, co-operative organisational structures beyond the worker-identity, offer a flexible model to engage in a PC as has capacity to generate commercial revenue and not-for-profit income, whilst offers decision-making processes open to dialogue across positionalities in the food system and around land-based projects. Therefore, with these findings in tandem, the thesis proposes that a strategic symbiotic combination of *diálogos de saberes*, and a 'prefigurative compromise' to generate financial resources in neoliberal contexts, is necessary to support deep food democracy in the evolution of an "emancipatory" urban agroecology (Tornaghi and Dehaene 2019).

7.2 Methodological learnings and limitations of the research

Some methodological learnings have already been stated in relation to the food policy process in section 5.1.2 concerning power in agroecological learning processes. One key critical reflection I suggested was that WLHC enquiry could have benefited from broadening democratic and intergenerational *leadership* in the conception, carrying out of the enquiry, and analysis in supporting the development of deep democracy at the food hub. Regarding this reflection in relation to this PhD, a learning relates to resources and participatory research. In carrying out AR with colleagues within organisations I was able to buy resources for the processes with PhD expenses through transparent discussions with colleagues. I was also able to offer some financial contributions from this pot of money for colleagues who took on planning and facilitation work as part of the WLHC enquiry. Once the process was clarified as regards a timeline of activities, I also made two external funding applications that would cover more wages and resources, but these were unsuccessful. Due to my PhD stipend covering some living costs I was able to take on more of the background labour for the research, such as sourcing materials and data management. This meant that I had more contact with the data, for instance, and time to reflect on what was emerging. At a time when

both organisations had inadequate resources the PhD research was able to contribute financial resources towards enquiries shaped with colleagues that directly contributed to the organisations' development. However, the enquiries could have been better resourced without relying on my 'PhD time' so as to challenge underlying ownership of the research. Therefore, if I was to start the PhD again with the aim of producing AR I would try to establish what financial resources were needed earlier in the process, perhaps before the exact nature of the process was identified, so that there was more time to generate additional funding if needed.

Power dynamics around doing a PhD with an AR approach does not simply stop at how resources are distributed. A continual tension in the work has been working to co-produce knowledge in equitable ways in relation to a PhD framework that is geared towards the learning of one person who produces a jargon-heavy document in the style of academic argument. Whilst the learnings through the processes were quite distinct from the document you are now reading, and are embodied in the spaces, relationships, emotions, memories, and visual documents the enquiry generated, this underlying feature of what the research is geared towards and who benefits from such a time-intensive product, exists within efforts towards a more transformative research practice and, I feel, cannot necessarily be decoupled. As Badwall (2016: 16) notes, "the role of the researcher can re-inscribe relations of dominance, and there is no innocent knowledge on the part of the researcher", and I would argue that this is doubly so for a PhD that is so geared to one person, while in research projects there is more space for co-ownership and shared responsibility in spite of academy-community power relations. Certainly, I have tried to make clear which parts of the work were co-produced and which I did alone, and also co-sharing work with colleagues at the RGS conference in 2019 gave opportunity for co-analysis and opportunity to get feedback on our shared work together. With ultimate responsibility and ownership falling to one person, however, I doubt that extractivism present in UK academia can ever be fully challenged within the PhD framework as it is.

While my research centre at Centre of Agroecology Water and Resilience (CAWR) has been very supportive in peoples' knowledge approaches, I think that university conceptions of a PhD must change fundamentally to fit better with AR epistemologies and to meet demands for cognitive justice. This is reflected in agroecology practitioners in Europe expressing that, "mainstream institutions were unwilling or incapable of providing training that reflects and includes both the political rootedness and the practitioner-led learning considered essential by social movements" (Anderson et al. 2018). Two suggestions that I have are that there should be more opportunity for PhDs to be collaborative between **two or more people, with flexibility in how outputs are produced**; and that there is **freedom for the main product of the thesis to be in other mediums of expression outside of the traditional academic thesis**, such as film, theatre or

events. The latter would place less stress on PhD action researchers to produce a thesis *and* knowledge communication in forms generated with the communities they work with, as well as knowledge being more effectively communicated considering different ways of knowing and learning outside an 80,000-word text.

In terms of further learnings and limitations of this research, I have discussed these in detail in sections 4.3 and 4.7 of the Methodology. I considered my 'closeness' to the enquiry in relation to reflexivity and positionality, and the steps I took to develop the AR with democratic validity. One limitation of the study, due to its embedded nature and specific context, is that the findings are particular to London as a "world city" (Massey 2010). The thesis does not engage in dialogue with other community-based places in London or with other city territories in the UK or beyond political borders, nor travel through scale to see how the findings sit within networks with which LGWC and WLHC are connected. The thesis's contribution of a strategic 'prefigurative compromise', is partly the result of identifying London's high cost of living, including housing costs, as a contextual factor in LGWC worker-owners having to spend time making income away from co-op activities together. With London's experience of the rollout of neoliberalism with intense financialisation and privatisation (see section 2.5), the form of this will surely differ across urban environments, with the potential to make a strategic prefigurative compromise redundant. Since the thesis takes an AR approach, with foundations of local situated knowledge in relation to structural processes, the findings are presented with the acknowledgement that its scope is limited in generalisability, although it may offer pockets of praxis to other contexts with varied experiences of the neoliberal city and differing groundswells of urban agroecologies. In this regard I now underline this thesis's contributions to knowledge before making recommendations for development.

7.3 Contributions to knowledge

Individual contributions to knowledge that exist within the summary of findings are underlined below. I then discuss these in combination as contributing to the development of urban agroecology, and understandings of deep democracy. This enquiry has:

1. Elaborated on a **"transformative agroecological learning framework"** in Europe (Anderson et al. 2018) through action research in the development of a food policy at a food hub. The thesis contributes that **creative aspects of popular education can support holistic, community definitions of food and health, and the emergence of translocal foodways** as local. The enquiry found that the horizontal pedagogies of PE with engagement in different ways of knowing (i.e. emotional, relational, memory) and emphasis on the practical as political, encouraged the

creation of intercultural contact zones towards initial emergences of diálogos de saberes.

2. Developed understandings of enduring relationships in deep democracy in connection to the mapping of power. The study supports that enduring relationships are a critical foundation in **food democracy** (McIvor and Hale 2015) and that a 'lovingness' inspired by critical pedagogies (Darder 2002, Freire 2000, hooks 2000) is key in building transformative solidarities, underpinned with an anti-oppression framework to map power in organisational structures and practices. I described this dialogic approach to relationships and power as a **'critical lovingness'**.

3. Contributed a community-scale case study of a UAGC workers' co-op with analysis of financial viability, in the context of an absence of research in Europe on urban agriculture as an entrepreneurial activity, and the economic dimension of agroecology (Specht et al. 2016, van der Ploeg et al. 2019). The enquiry agrees with the analysis that in underlying questions of viability of UA there lies an "unattainable trifecta" of expected goals that are insurmountable without external financial investment (Daftary-Steel et al. 2015). The thesis contributes a fourth dimension for consideration, this being the expectation of initiatives to facilitate community space, making an unattainable **'quadfecta of urban agroecology'**.

4. Expanded on calls for direct democracy as part of urban agroecology (Pimbert 2017). The thesis finds that UAGC **co-operative structures should look to expand membership beyond worker identities to encourage deep democracy dialogues** across positionalities in the food system and build capacity for commons creation within prefigurative organisational structures.

5. Evolved the young praxis of **urban agroecology** with **strategic findings connecting economic and democratic dimensions**. Given the lack of empirical research that is needed to ground emerging theory in practice (Siegner et al. 2019, Renting 2017), the thesis engaged in community-based action research within an emerging urban agroecology in London, UK, generating practical enquiries in response to developments on-the-ground linked with academic discourse. The thesis finds that a **strategic symbiotic combination of** *diálogos de saberes* **and a 'prefigurative compromise' with the market,** to generate viable place-making transformation in the inequitable neoliberal city, can support urban agroecologies to develop with deep food democracy.

Table 13 (below) provides a map if the reader would like to engage with the above contributions to knowledge in more depth within the thesis chapters.

Contribution to knowledge	Торіс	Related sections
------------------------------	-------	------------------

1	Creative popular education and TALF	5.1, 5.2, 5.3
2	Critical lovingness	5.3, 5.4
3	Quadfecta of urban agroecology	6.2
4	Co-operatives beyond the worker identity	6.5
5	Prefigurative compromise and diálogos de saberes	6.3, 6.4

Table 13: Map of contributions to knowledge within the thesis

This thesis has primarily contributed to the emerging concept of urban agroecology connecting ecological, economic and political elements. The *economic* experiences of LGWC emphasised the need for financial investment and a prefigurative compromise with the market to raise resources for engagement in *political* efforts to build deep democracies with equitable opportunities and capacity for cultures of care. This connection between economic and political elements is underwritten with the need to make time and space in the neoliberal city for different actors in the food system to engage in *diálogos de saberes;* with time for *ecological* co-learning as seen in the WLHC enquiry through holistic definitions of food and health, and expressed in LGWC workers' key motivations. This position agrees with Pimbert (2017) that for urban farmers and other actors to co-produce policies and institutions then some material security and time is required, and also that an urban agroecology demand can be for universal basic income (see practical suggestions in 6.6.1).

While scholars have proposed an economic strategy of combining non-commercial and monetary exchange in the development of UAGC (Pimbert 2017, Tornaghi 2017), this thesis finds that a short-term strategic prioritisation of financial investment, and a prefigurative compromise with the market, is necessary over non-monetary forms of economic exchange. This is based on experiences of LGWC within a neoliberal city with high living costs and having the impact on the coop as described in 7.1 (and greater detail in 6.3). I acknowledge that gifting economies are present every day in community gardens and contribute to urban agroecology, but rather as a strategic approach emphasise that these can be more equitably developed in the medium to long term from UAGC networks that have greater financial stability and are able to pay fair wages. As the thesis states that the development of *diálogos de saberes* is necessary to root a prefigurative compromise in agroecological principles, this gives shape to the assertion that governance is a transformative process in UAGC (Schmutz 2017), as DDS must be part of this. Other findings offer pathways to support this, from; popular education as part of a TALF, 'critical lovingness' underpinned by an anti-oppression framework in organisational structures, to broadening co-operatives beyond worker

identities to encourage dialogue across different positionalities.

In aiming to evolve UAGC with consideration of *deep* food democracy the enquiry has developed on McIvor and Hale's (2015) interviews and participant observation through insider research with a myriad of methods – honing in on local practices in a food hub and WC. The suggestion of embedding a 'critical lovingness' into organisational structures provides a pathway to work towards two features of deep democracy: 'lovingness' as central to building solidarities in *enduring democratic relationships*, and an anti-oppression framework providing a praxis to *map power*. And the finding that co-operatives beyond worker identities can be an organisational model to encourage dialogue across different positionalities in the food system and around land-based projects, speaks to the deep democracy feature of a *sophisticated turn towards the commons* (McIvor and Hale 2015). This offers a different perspective to that which finds the WC a model to emulate in developing new commons on public land (Renzel 2017). Also, in regards to recent studies of food democracy in the UK the enquiry found that popular education can support the development of democratic skills and relationships, rather than choosing between the two (Prost 2019).

With emphasis on building solidaristic relationships towards equitable knowledge dialogues, and recognising that trust takes time to build and is never guaranteed (McIvor and Hale 2015), this thesis holds that while short-term action is critical, developing deep democracy as a feature of UAGC also requires "deep and long civilisational changes" with the transformation of power culturally, institutionally and economically (Santos 2016: 27-28, Prizendt 2017).

7.4 Recommendations for further research and action

Further to the practical learnings and suggestions made in section 6.6.1 based on the experience of setting up an UAGC workers co-operative, I make four recommendations for future UAGC praxis development:

A. Research to further understand symbiosis between *diálogos de saberes* and a

'prefigurative compromise' towards emancipatory urban agroecologies in different practical contexts. This could be through a series of dialogic action research projects at differing scales coming together to produce third-person knowledge aiming to understand existing examples of 'prefigurative compromises', and if there are tactics or toolkits to support moments of dynamic tension (Levkoe et al. 2018b).

B. Research into UAGC co-operative structures that enable dialogue between worker and non-worker actors beyond 'consultation' power dynamics, so as to support the development of deep democracy and commons-making inclusive of different positionalities within nutrient cycles. I agree with Dehaene (et al. 2016) that the Community Interest Company (CiC) legal model in the UK can be a useful tool to develop UAGC, as it necessitates community ownership and has flexible membership regulations for developing co-operative structures responsive to food democracy manifestations in different locales (Hassanein 2003).

C. **A Food democracy 'audit' of agroecology initiatives across the UK**. This would have threefold aims: to understand better the state of just and deep democracy in the UK agroecology movement; to highlight areas of work for organisations to take forward; and to build food democracy skills through popular education. A practical framework for a deep food democracy could be evolved through action and reflection cycles, building on the existing work of Maughan et al.'s (2020) five point framework for 'reading for justice', Anderson et al.'s (2017) 'transformative agroecological learning framework', and Agyeman's 'just sustainabilities' (2013), for instance.

D. Action research to understand further how processes of diálogos de saberes manifest within urban places to support the evolution of a political UAGC in connection with movement roots of cognitive justice in the Global South. In cases of agroecological transitions in Global North cities, an explicit decolonial agenda seems necessary so as to generate 'emergences' that, "point to new constellations of meaning as regards both to the understanding and the transformation of the world" (Santos 2007b: 10) from within geographic centres of colonial knowledge hegemonies. Woods (2019) highlights decoloniality as a frame to support analysis in identifying and challenging oppressive power in working towards socially just food systems in the UK. Nominal focus has been turned to how learnings in the cultural and historical context of Latin America relate with experiences in different regions (Anderson et al. 2018), and so agroecology and DDS in the UK, for instance, may unfold in divergent forms with the same underlying principles. The TALF proposed by Anderson (et al. 2018) offers an approach to develop this recommendation in Europe, with a critical pedagogical framework that centres DDS as a key feature. The territorial level could be a strategic place to begin action research, whereby cultures generated through DDS processes interact with community and national scales, thus enabling engagement with the diversity of actors that have been pushing urban agroecology forwards (Fernandez 2017) and evolving tools and practice that bring together translocal knowledges across networks (Moragues-Faus and Sonnino 2019). In the light of the success of systematizing social learning processes through agroecology schools by La Via Campesina (Anderson et al. 2019), what might a territorial urban agroecology school look like, built by movements and supported by university institutions, to engage in land and practice-based learning with cognitive justice underpinnings? And how might territorial urban agroecology schools support the strengthening of community-rooted coalitions based on difference to promote progressive social change through feminist and anti-racist practice (Emejulu 2016:126)?

In terms of these recommendations and any evolution of (urban) agroecology, effective emancipatory change that develops with, "culturally appropriate form in the UK, sensitive to ways in which inequalities are generated, sustained, reproduced and reinforced in British society" (Kneafsey et al. 2016) cannot happen without leadership by those most oppressed in global food and economic systems (Woods 2019). In developing future participatory methodologies which require considerable financial resources and long time frames (Kneafsey et al. 2016), universities must be willing to enter into processes of co-production that prioritise mutual benefit (Martikke et al. 2015). Therefore in generating AR methodologies, to build on conclusions and recommendations of this thesis, it is necessary that university–community partnerships require both capital asset and knowledge sharing (Clennon 2019) to support cognitive justice with underlying praxis of procedural, distributive and spatial justice.

Considering this research's attempts to support cultivation of a socially just research, with the generation of transformative moments alongside limitations, one message cuts through all the academic theory, from the local trap to trifectas to quadfectas to prefigurations, and can be a rooted principle for solidarity in urban agroecology futures – that is: "nothing about us, without us!" (Charlton 1998).

Bibliography

- Acosta, S., Goltz, H.H., and Goodson, P. (2015) 'Autoethnography in Action Research for Health Education Practitioners'. *Action Research* 13 (4), 411–431
- Active Distribution (n.d.) Zapatista Coffee Active Distribution Catalogue Online [online] available from https://www.activedistributionshop.org/shop/content/6-zapatistacoffee [13 April 2020]
- Adelman, C. (1993) 'Kurt Lewin and the Origins of Action Research'. Educational Action Research 1 (1), 7–24
- Agyeman, J. (2018) #Migrants Carry Complex and Life-Affirming #foodways [online] available from https://twitter.com/julianagyeman/status/1019584673197027328 [27 October 2020]
- Agyeman, J. (2016) *Food and Social Justice* [online] available from <https://www.zedbooks.net/blog/posts/food-social-justice/> [29 November 2019]
- Agyeman, J. (2013) Introducing Just Sustainabilities: Policy, Planning and Practice. First. London: Zed Books
- Alkon, A. (2013) 'Food Sovereignty: A Critical Dialogue'. in Food Justice, Food Sovereignty, and the Challenge of Neoliberalism. held 2013. International Conference Yale University, 1–25
- Alkon, A.H. (2013) 'The Socio-Nature of Local Organic Food'. Antipode 45 (3)
- Alkon, A.H. and Agyeman, J. (2011) 'The Food Movement as Polyculture'. in *Cultivating Food Justice:* Race, Class, and Sustainability. MIT Press, 1–20
- Alkon, A.H. and Mares, T.M. (2012) 'Food Sovereignty in US Food Movements: Radical Visions and Neoliberal Constraints'. Agriculture and Human Values 29 (3), 347–359
- Alkon, H.A. (2013) 'Food Justice, Food Sovereignty and the Challenge of Neoliberalism'. Food Sovereignty : A Critical Dialogue 1–25
- Allen, P. (2010) 'Realizing Justice in Local Food Systems'. Cambridge Journal of Regions, Economy and Society 3 (2)
- Allen, P. (2008) 'Mining for Justice in the Food System: Perceptions, Practices, and Possibilities'. in Agriculture and Human Values. held 2008. 157–161

Allen, P. (2004) Together at the Table : Sustainability and Sustenance in the American Agrifood System.

University Park, Pa.: University Park, Pa.

- Allen, P. and Hinrichs, C. (2007) 'Buying into 'Buy Local': Agendas and Assumptions of US Local Food Initiatives.' in *Constructing Alternative Food Geographies: Representation and Practice*. ed. by Holloway, L., Mayne, D., and Kneafsy, M. Oxford: Elsevier Press, 255–272
- de Almeida, D.A.O. and Biazoti, A.R. (2017) 'Urban Agroecology: For the City, in the City and from the City!' Urban Agriculture Magazine November, 13–14
- Altieri, M. a and Nicholls, C.I. (2012) 'Sustainable Agriculture Reviews'. Sustainable Agriculture Reviews [online] 11 (October), 1–29. available from http://link.springer.com/10.1007/978-94-007-5449-2>
- Altieri, M. and Holt-Giménez, E. (2016) Can Agroecology Survive without Being Coopted in the Global North ? [online] available from https://www.researchgate.net/publication/309385013%0ACan
- Altieri, M.A., Nicholls, C.I., Rogé, P., and Arnold, J. (2017) 'Urban Agroecology: Principles and Potential'. Urban Agriculture Magazine November, 18–20
- Altieri, M.A. and Toledo, V.M. (2011) 'The Agroecological Revolution in Latin America: Rescuing Nature, Ensuring Food Sovereignty and Empowering Peasants'. *Journal of Peasant Studies* 38 (3), 587–612
- Amsden, J. and Vanwynsberghe, R. (2005) 'Community Mapping as a Research Tool with Youth'. Action Research
- Anderson, C. (2017) 'Policy from Below: Politicising Urban Agriculture for Food Sovereignty'. Urban Agriculture Europe November, 72–73
- Anderson, C., Binimelis, R., Pimbert, M.P., and Rivera-Ferre, M.G. (2019) 'Introduction to the Symposium on Critical Adult Education in Food Movements: Learning for Transformation in and beyond Food Movements—the Why, Where, How and the What Next?' *Agriculture and Human Values* [online] 36 (3), 521–529. available from <https://doi.org/10.1007/s10460-019-09941-2>
- Anderson, Colin, Bruil, J., Chappell, M.J., Kiss, C., and Pimbert, M.P. (2019) 'From Transition to Domains of Transformation: Getting to Sustainable and Just Food Systems through Agroecology'. in *Sustainability*. vol. 11. 5272

- Anderson, C., Pimbert, M., and Kiss, C. (2015) Building, Defending and Strengthening Agroecology. Coventry
- Anderson, C.R. (2013) Growing Food and Social Change: Rural Adaptation, Participatory Action Research and Civic Food Networks in North America. University of Manitoba
- Anderson, C.R., Maughan, C., and Pimbert, M.P. (2018) 'Transformative Agroecology Learning in Europe: Building Consciousness, Skills and Collective Capacity for Food Sovereignty'. *Agriculture and Human Values* [online] available from
- Anderson, C.R. and McLachlan, S.M. (2016) 'Transformative Research as Knowledge Mobilization: Transmedia, Bridges, and Layers'. Action Research 14 (3), 295–317
- Anderson, G., Herr, K., and Nihlen, A. (1994) Studying Your Own School: An Educator's Guide to Qualitative Practitioner Research. Thousand Oaks, CA: SAGE Publications
- Anderson, G.L. and Jones, F. (2000) 'Knowledge Generation in Educational Administration from the Inside-out: The Promise and Perils of Site-Based, Administrator Research'. *Educational Administration Quarterly* 36 (3), 428–4664
- Andrée, P., Ballamingie, P., and Sinclair-Waters, B. (2014) 'Neoliberalism and the Making of Food Politics in Eastern Ontario'. *Local Environment* 20 (12), 1452–1472
- De Angelis, M. (2017) Omnia Sunt Communia. On the Commons and the Transformation to Postcapitalism. First. London, UK: Zed Books
- Aptekar, S. (2015) 'Visions of Public Space: Reproducing and Resisting Social Hierarchies in a Community Garden'. Sociological Forum 30 (1), 209–227
- Arksey, H. and Knight, P. (1999) Interviewing for Social Scientists. London, UK: SAGE Publications
- Asenjo Palma, C. (2019) 'Conflict Resolution in Community Development: Are the Benefits Worth the Costs?' *Critical Social Policy* [online] 39 (2), 268–288. available from https://doi.org/10.1177/0261018318780162>
- Aweside Farm (2020) Aweside Farm | Facebook [online] available from https://www.facebook.com/awesidefarm/ [1 June 2020]
- Badwall, H. (2016) 'Racialized Discourses: Writing Against an Essentialized Story About Racism'. Intersectionalities: A Global Journal of Social Work Analysis, Research, Polity, and Practice 5 (1), 8–19

- Barham, J. (2011) Regional Food Hubs: Understanding the Scope and Scale of Food Hub Operations [online] available from http://www.ams.usda.gov/AMSv1.0/getfile?dDocName=STELPRDC5090409>
- Barnes, D. (2018) Relief as Labour Confirms Scrapping of Controversial HDV Housing Project | Letters | Society | The Guardian [online] available from <https://www.theguardian.com/society/2018/jul/26/relief-as-labour-confirms-scrappingof-controversial-hdv-housing-project> [3 June 2019]
- Barron, J. (2016) 'Community Gardening: Cultivating Subjectivities, Space, and Justice'. *Http://Dx.Doi.Org/10.1080/13549839.2016.1169518* [online] 9839 (September), 1–17. available from <http://dx.doi.org/10.1080/13549839.2016.1169518>
- Barton, L. (2017) On Gentrification [online] available from https://www.cfgn.org.uk/2017/12/on-gentrification/> [27 September 2020]
- Basic Income UK (n.d.) *Basic Income UK* [online] available from <https://www.basicincome.org.uk/> [28 October 2020]
- Bauder, H. and Sharpe, B. (2000) 'Labor Market Marginalization of Youth in San Antonio, Texas'. The Professional Geographer 52 (3), 531–543
- Bedore, M. (2010) 'Just Urban Food Systems: A New Direction for Food Access and Urban Social Justice'. in *Geography Compass*.
- Belenkey, M.F., Clinchy, B.M., Goldberger, N.R., and Tarule, J.M. (1986) Women's Ways of Knowing: The Development of Self, Voice, and Mind. ed. by Belenky, M.F. New York: Basic Books
- Bell, K. (2019) Working-Class Environmentalism : An Agenda for a Just and Fair Transition to Sustainability. Cham : Palgrave Macmillan, 2019.
- Bell, S., Fox-Kämper, R., Keshavarz, N., Benson, M., Caputo, S., Noori, S., and Voigt, A. (2016) Urban Allotment Gardens in Europe. 1st edn. Routledge
- Bellamy, A.S. and Ioris, A.A.R. (2017) 'Addressing the Knowledge Gaps in Agroecology and Identifying Guiding Principles for Transforming Conventional Agri-Food Systems'. *Sustainability (Switzerland)* 9 (3), 1–17
- Bensin, B.M. (1928) Agroecological Characteristics Description and Classification of the Local Corn Varieties Chorotypes.

- Berg, M.L. (2019) 'Super-Diversity, Austerity, and the Production of Precarity: Latin Americans in London'. *Critical Social Policy* [online] 39 (2), 184–204. available from https://doi.org/10.1177/0261018318790744>
- Berti, G. and Mulligan, C. (2016) 'Competitiveness of Small Farms and Innovative Food Supply Chains: The Role of Food Hubs in Creating Sustainable Regional and Local Food Systems'. *Sustainability (United States)* 8 (7)
- Bettez, S.C. (2014) 'Navigating the Complexity of Qualitative Research in Postmodern Contexts: Assemblage, Critical Reflexivity, and Communion as Guides'. *International Journal of Qualitative Studies in Education* 1–23
- Bhabha, H. (1994) The Location of Culture. London: Routledge
- Bickerstaff, K. and Agyeman, J. (2009) 'Assembling Justice Spaces : The Scalar Politics of Environmental Justice in North-East England'. *Antipode* 41 (4), 781–806
- Biel, R. (2013) 'London 2062'. in *London 2062*. ed. by Bell, S. and Paskins, J. London: Ubiquity Press
- Blay-Palmer, A. (2009) 'The Canadian Pioneer: The Genesis of Urban Food Policy in Toronto'. International Planning Studies 14 (4), 401–416
- Blay-Palmer, A., Landman, K., Knezevic, I., and Hayhurst, R. (2013) 'Constructing Resilient, Transformative Communities through Sustainable "Food Hubs"'. *Local Environment: The International Journal of Justice and Sustainability* 18 (5), 521–528
- Blond, P. (2010) Red Tory: How Left and Right Have Broken Britain and How We Can Fix It. First. London, UK: Faber and Faber
- Bloor, M., Frankland, J., Thomas, M., and Robson, K. (2001) Focus Groups in Social Research. London: SAGE Publications. available from https://methods.sagepub.com/book/focus-groups-in-social-research>
- Blunden, M. (2017) House Prices up Just 0.5% This Year... with Falls in 10 Boroughs | London Evening Standard [online] available from <https://www.standard.co.uk/news/london/house-pricesup-just-05-this-year-with-falls-in-five-boroughs-a3590286.html> [28 October 2020]
- Boal, A. (2002) Games for Actors and Non-Actors. 2nd ed. London: London: Routledge, 2002.
- Bochner, A. and Ellis, C. (2002) Ethnographically Speaking: Autoethnography, Literature and Aesthetics.

Walnut Creek, Calafornia: Altamira Press

- Booth, T. and Booth, W. (2003) 'In the Frame: Photovoice and Mothers with Learning Difficulties'. Disability & Society 18 (4), 431-442
- Born, B. and Purcell, M. (2006) 'Avoiding the Local Trap: Scale and Food Systems in Planning Research'. *Journal of Planning Education and Research* [online] 26 (2), 195–207. available from <http://jpe.sagepub.com.proxy1.lib.uwo.ca/content/26/2/195.short?rss=1&ssource=mfr>
- Bosetti, N. (2018) Centre for London | What Makes a Londoner? [online] available from https://www.centreforlondon.org/blog/london-identity/ [19 February 2020]
- Bowers, C.A., Apffel-Marglin, F., and Mahwah, N. (2005) *Rethinking Freire: Globalisation and the Environmental Crisis.* Lawrence Erlbaum Associates
- Bowie, C., Richardson, A., and Sykes, W. (1995) 'Consulting the Public about Health Service Priorities'. *British Medical Journal* 311, 1155–1158
- Bradley, K. and Galt, R.E. (2014) 'Practicing Food Justice at Dig Deep Farms & Produce, East Bay Area, California: Self-Determination as a Guiding Value and Intersections with Foodie Logics'. Local Environment 19 (2), 172–186
- Bradley, K. and Herrera, H. (2016) 'Decolonizing Food Justice: Naming, Resisting, and Researching Colonizing Forces in the Movement'. *Antipode* 48 (1), 97–114
- Brannelly, T. (2016) 'Decolonising Research Practices with the Ethics of Care'. Nursing Ethics [online] 23 (1), 4–6. available from https://doi.org/10.1177/0969733015624297>
- Brenner, N. and Theodore, N. (2002) 'Cities and the Geographies of "Actually Existing Neoliberalism'. *Antipode* 349–379
- Brent, Z.W., Schiavoni, C.M., and Alonso-Fradejas, A. (2015) 'Contextualising Food Sovereignty: The Politics of Convergence among Movements in the USA'. *Third World Quarterly* [online] 36 (3), 618–635. available from
 http://www.tandfonline.com/doi/full/10.1080/01436597.2015.1023570
- Brickell, K. and Datta, A. (2011) 'Introduction: Translocal Geographies'. in *Translocal Geographies:* Spaces, Places, Connections. ed. by Brickell, K. and Datta, A. Farnham: Ashgate, 3–20
- British Property Federation (2014) Who Buys New Homes in London and Why? [online] available from http://www.bpf.org.uk/sites/default/files/resources/BPF-Whobuys-%0Dnew-homes-in-

London-and-why.pdf> [20 August 2016]

- Broadway, M. (2009) 'Growing Urban Agriculture in North American Cities': American Geographical Society's Focus on Geography 23–30
- Brown, adrienne maree (2017) Emergent Strategy. 1st edn. Chico: AK Press
- Brown, K.H. and Jameton, A. (2000) 'Public Health Implications of Urban Agriculture'. *Journal of Public Health Policy* 21 (1), 20–39
- Brydon-Miller, M., Greenwood, D., and Maguire, P. (2003) 'Why Action Research?' Action Research Volume (1)
- Bryman, A. (2008) Social Research Methods. 3rd edn. Oxford, UK: Oxford University Press
- Buchanan, C. (2019) Food Autonomy at a Time of Capitalist Crisis : A Participatory Video Inquiry into Thessaloniki 's Autonomous Food Initiatives. Coventry University
- Buchanan, C., Chang, M., and Logan, R. (2017) 'Reclaiming the Plots: Struggles and Strategies from London's Community Food Growers Network'. in *Everyday Experts : How People 's Knowledge Can Transform the Food System*. 326–341
- Buck, N., Gordon, I., Harloe, M., Hall, P., and Kleineman, M. (2002) Working Capital: Life and Labour in Contemporary London. New York: Routledge
- Burgess, R.G. (1984) In the Field. London, UK: Routledge
- Butler, J. (1997) "'Merely Cultural". Social Text 52, 265-77
- Butterly, D., Fitzpatrick, I., Rodker, O., Laughton, R., Anderson, C., Chow, H., Simpson, L., and Goldring, A. (2017) *A People's Food Policy* [online] available from https://www.peoplesfoodpolicy.org/>
- Cabannes, Y. and Raposo, I. (2013) 'Peri-Urban Agriculture, Social Inclusion of Migrant Population and Right to the City: Practices in Lisbon and London'. *City* 17 (2), 235–250
- Cadieux, K. and Slocum, R. (2015) 'What Does It Mean to Do Food Justice?' Journal of Political Ecology
- Cahill, C. (2007) 'Repositioning Ethical Commitments: Participatory Action Research as a Relational Praxis of Social Change'. *ACME*

Caputo, S. (2012) 'The Purpose of Urban Food Production in Developed Countries'. in Sustainable Food Planning: Evolving Theory and Practice. ed. by Viljoen, A. and Wiskerke, J. Wageningen Academic Publishers

Caraher, D. and Dowler, E. (2007) 'Food Projects in London: Lessons for Policy and Practice - A Hidden Sector and the Need for "More Unhealthy Puddings ... Sometimes". *Health Education Journal* [online] 66 (2), 188–205. available from <http://www.embase.com/search/results?subaction=viewrecord&from=export&id=L46776 313%5Cnhttp://dx.doi.org/10.1177/0017896907076762%5Cnhttp://rd8hp6du2b.search.seri alssolutions.com?sid=EMBASE&issn=00178969&id=doi:10.1177/0017896907076762&atitle =Food+projects>

Carolan, M. (2011) The Real Cost of Cheap Food. First. Abingdon, UK: Earthscan Publications

- Case, P. (2018) Shocking Extent of Modern Slavery in Agriculture Revealed Farmers Weekly [online] available from https://www.fwi.co.uk/news/shocking-extent-of-modern-slavery-inagriculture-revealed> [12 August 2020]
- Cassell, C. and Symon, G. (1994) *Qualitative Methods in Organizational Research: A Practical Guide*. Reprint. London : Calafornia : Delhi: Sage
- Certomà, C. and Martellozzo, F. (2019) 'Cultivating Urban Justice? A Spatial Exploration of Urban Gardening Crossing Spatial and Environmental Injustice Conditions'. *Applied Geography* 106 (March), 60–70
- Certomà, C. and Tornaghi, C. (2015) 'EDITORIAL Political Gardening. Transforming Cities and Political Agency'. *Local Environment* [online] 20 (10), 1123–1131. available from <http://www.tandfonline.com/doi/full/10.1080/13549839.2015.1053724>
- CFGN (2018) Gentrification, Food Justice and London Minutes [online] available from <https://www.cfgn.org.uk/2018/08/gentrification-food-justice-and-london-minutes/> [27 September 2020]
- CFGN (2017a) 'We're Hiring a Community Enterprise Worker'. The Plot
- CFGN (2017b) Working with Your Local Council [online] London. available from <mozextension://b9a6a2a9-2bbb-224b-ba2e-a9b67b4d2064/enhancedreader.html?openApp&pdf=https%3A%2F%2Fwww.cfgn.org.uk%2Fwpcontent%2Fuploads%2F2017%2F08%2FWorking-with-council-toolkit.pdf>

- CFGN (2015) Map Community Food Growers Network [online] available from https://www.cfgn.org.uk/map/ [11 February 2020]
- CFGN (n.d.) Community Food Growers Network a London-Based Support Network of Food Projects Putting Land into Community Use [online] available from https://www.cfgn.org.uk/ [12 October 2020]
- Chagfood CiC (2019) CHAGFOOD COMMUNITY INTEREST COMPANY Filing History (Free Information from Companies House) [online] available from https://find-and-update.companyinformation.service.gov.uk/company/07467468/filing-history [4 October 2020]
- Chagfood CiC (n.d.) *About Chagfood Community Market Garden* [online] available from https://www.chagfood.org.uk/about/ [4 October 2020]
- Chakrabortty, A. (2014) At Yacht Parties in Cannes, Councils Have Been Selling Our Homes from under Us | Local Government [online] available from <https://www.theguardian.com/commentisfree/2014/oct/14/yacht-cannes-selling-homeslocal-government-officials-mipim> [18 March 2020]
- Chambers, R. (1997) Whose Reality Counts? London, UK: Intermediate Technology Publications
- Charlton, J.I. (1998) Nothing About Us Without Us: Disability Oppression and Empowerment. 1st edn. University of California Press
- Chavez, C. (2008) Conceptualizing from the Inside : Advantages, Complications, and Demands on Insider Positionality. 13 (3), 474–494
- Choudry, A. (2015) Learning Activism: The Intellectual Life of Contemporary Social Movements. Toronto: University of Toronto Press
- Chrisp, J. (2004) "The Negotiation of Divergent Demands When Community Research Is Located in the Academy: The Mother-Adolescent Son Project'. in *Traveling Companions: Feminism, Teaching, and Action Research.* ed. by Brydon-Miller, M., Maguire, P., and McIntyre, A. Westport, Conn.: Praeger, 79–95
- Church, A., Mitchell, R., Ravenscroft, N., and Stapleton, L.M. (2015) "Growing Your Own": A Multi Level Modelling Approach to Understanding Personal Food Growing Trends and Motivations in Europe'. *Ecological Economics* 110, 71–80

CIDSE (2020) FINANCE FOR AGROECOLOGY: MORE THAN JUST A DREAM ? AN

ASSESSMENT OF EUROPEAN AND INTERNATIONAL INSTITUTIONS ' CONTRIBUTIONS TO FOOD SYSTEM.

- Clennon, O.D. (2019) 'Scholar Activism as a Nexus between Research, Community Activism and Civil Rights via the Use of Participatory Arts'. *International Journal of Human Rights* [online] 24 (1), 46–61. available from https://doi.org/10.1080/13642987.2019.1624535>
- Clifford and Harper (2010) University of California Press. vol. 13. University of California Press
- Co-operatives UK (2009) *The Co-Operative* Review [online] available from https://web.archive.org/web/20100118200913/http://www.cooperatives-uk.coop/performancereview
- Cohen, N. and Reynolds, K. (2014) 'Urban Agriculture Policy Making in New York's "New Political Spaces": Strategizing for a Participatory and Representative System'. *Journal of Planning Education and Research* 34 (2), 221–234
- Collins, P. and Bilge, S. (2016) Intersectionality. Cambridge: Polity Press
- Community Centred Knowledge (n.d.) The Food Journey Community Centred Knowledge [online] available from https://communitycentredknowledge.org/the-food-journey/> [28 July 2020]
- Connelly, S., Markey, S., and Roseland, M. (2011) 'Bridging Sustainability and the Social Economy: Achieving Community Transformation through Local Food Initiative'. *Crit. Soc. Policy* 31, 308–324
- Cooke, B. and Kathari, U. (2001) *Participation, the New Tyranny?* ed. by Cooke, B. and Kothari, U. London: London: Zed, 2001.
- Coolsaet, B. (2016) 'Towards an Agroecology of Knowledges: Recognition, Cognitive Justice and Farmers' Autonomy in France'. *Journal of Rural Studies* 47 (A), 165–171
- Corbin Dwyer, S. and Buckle, J. (2009) 'The Space between: On Being an Insider—Outsider in Qualitative Research'. *International Journal of Qualitative Methods* 8 (8), 54–63
- Cornwall, A. and Brock, K. (2005) 'What Do Buzzwords Do for Development Policy? A Critical Look at "Participation", "empowerment" and "Poverty Reduction". *Third World Quarterly* 26 (7), 1043–1060
- Coulson, H. and Sonnino, R. (2019) 'Re-Scaling the Politics of Food: Place-Based Urban Food Governance in the UK'. *Geoforum* [online] 98 (November 2018), 170–179. available from

<https://doi.org/10.1016/j.geoforum.2018.11.010>

- Crop Drop (2019) Welcome to Crop Drop | Crop Drop [online] available from <https://www.cropdrop.co.uk/> [4 June 2019]
- Crouch, C. (2004) Post-Democracy. Wiley
- Cuéllar-Padilla, M. and Calle-Collado, Á. (2011) 'Can We Find Solutions with People? Participatory Action Research with Small Organic Producers in Andalusia'. *Journal of Rural Studies* [online] 27 (4), 372–383. available from http://dx.doi.org/10.1016/j.jrurstud.2011.08.004
- Dada, Z. and Ferjani, B. (2016) Immigrant Hustle in the Face of Gentrification [online] available from https://mediadiversified.org/2016/12/05/immigrant-hustle-in-the-face-of-gentrification/ [18 February 2019]
- Daftary-Steel, S., Herrera, H., and Porter, C. (2015) 'The Unattainable Trifecta of Urban Agriculture'. Journal of Agriculture, Food Systems, and Community Development 6 (1), 19–32
- Darder, A. (2002) Reinventing Paulo Freire: A Pedagogy of Love. Westview Press
- Darly, S. and Mcclintock, N. (2017) 'Introduction to Urban Agriculture in the Neoliberal City: Critical European Perspectives'. *Acme: An International Journal for Critical Geographies* (16)
- Davidson, M. and Lees, L. (2005) 'New-Build "Gentrification" and London's Riverside Renaissance'. *Environment and Planning A* 37 (7), 1165–1190
- Davidson, M. and Wyly, E. (2012) 'Class-Ifying London: Questioning Social Division and Space Claims in the Post-Industrial Metropolis'. *City* 16 (4), 395–421
- Deh-Tor, C.M. (2017) 'From Agriculture in the City to an Agroecological Urbanism: The Transformative Pathway of Urban (Political) Agroecology'. Urban Agriculture Magazine November
- Dehaene, M., Tornaghi, C., and Sage, C. (2016) 'Mending the Metabolic Rift: Placing the "Urban" in Urban Agriculture'. in Urban Agriculture Europe. ed. by Lohrberg, F., Lička, L., Scazzosi, L., and Timpe, A. Berlin: Jovis, 174–177
- DeLind, L. (2014) 'Coming to Terms with Urban Agriculture: A Self- Critique'. in Food between the Country and the City: Ethnographies of a Changing Global Foodscape. ed. by Domingos, N., Sobral, J.M., and West, H.G. London: Bloomsbury

- Denzin, N.K. (2003) Performance Ethnography: Critical Pedagogy and the Politics of Culture. Thousand Oaks, CA: Thousand Oaks, CA
- Denzin, N.K. and Lincoln, Y.S. (2005) The SAGE Handbook of Qualitative Research. 3rd edn. London, UK: SAGE Publications
- Devlin, S. (2016) Agricultural Labour in the UK [online] available from http://foodresearch.org.uk/wp-content/uploads/2016/07/Agricultural-labour-briefing-FINAL-4-July-2016.pdf>
- Diangelo, R. (2019) White Fragility: Why It's so Hard for White People to Talk about Racism. Penguin Random House UK
- Donald, B. (2008) 'Food Systems Planning and Sustainable Cities and Regions: The Role of the Firm in Sustainable Food Capitalism'. *Regional Studies* 42 (8), 1251–1262
- Dooling, S. (2009) 'Ecological Gentrification: A Research Agenda Exploring Justice in the City'. in International Journal of Urban and Regional Research. held 2009. 621–639
- Dorling, D. (2014) "Thinking about Class'. *Sociology* [online] 48 (3), 452–462. available from http://soc.sagepub.com/cgi/doi/10.1177/0038038514523171
- Duncan, J., Levkoe, C.Z., and Moragues-Faus, A. (2019) 'Envisioning New Horizons for the Political Economy of Sustainable Food Systems'. *IDS Bulletin: Transforming Development Knowledge* 50 (2), 37–57
- DuPuis, D. and Goodman, E.M. (2005) 'Should We Go "Home" to Eat?: Toward a Reflexive Politics of Localism'. *Journal of rural studies*. 21 (3), 359–371
- Van Dyck, B., Maughan, N., Vankeerberghen, A., and Visser, M. (2017) 'Why We Need Urban Agroecology'. Urban Agriculture Magazine November, 5–6
- van Dyck, B., Tornaghi, C., Halder, S., von der Haide, E., and Saunders, E. (2017) The Making of a Strategizing Platform: From Politicising the Food Movement in Urban Contexts to Political Urban Agroecology. (January), transcript 81-108'
- Earth, F. of the (2019) Implementing System Change through Agroecology: The Cuban Experience Friends of the Earth International [online] available from https://www.foei.org/news/system-changeagroecology-cuba [22 May 2020]

Edwards, A. (2014) Bursting the Bubble: Say No to MIPIM | Red Pepper [online] available from

<https://www.redpepper.org.uk/bursting-the-bubble-say-no-to-mipim/> [27 September 2020]

- Elahi, F. and Khan, O. (2016) *Ethnic Inequalities in London Runnymede: Intelligence for a Multi-Ethnic Britain* [online] London: Runnymede Trust. available from https://www.runnymedetrust.org/uploads/images/London Inequality report v3.pdf
- Emejulu, A. (2016) Community Development as Micropolitics. Polity Press
- Encyclopedia Britannica (n.d.) *Digger* | *English Agrarian Movement* | *Britannica* [online] available from https://www.britannica.com/event/Digger [5 December 2019]
- Enfield Council (2018) Borough and Wards Profiles · Enfield Council [online] available from https://new.enfield.gov.uk/services/your-council/about-enfield/borough-and-wards-profiles/ [25 August 2018]
- Epstein, B. (1990) 'Rethinking Social Movement Theory'. Socialist Review (20), 35-65
- Epstein, G. (2002) 'Financialization, Rentier Interests, and Central Bank Policy'. *Financialization of the World Economy* [online] 1–43. available from <http://www.peri.umass.edu/fileadmin/pdf/financial/fin_Epstein.pdf>
- ERINMA (2020) *Twitter* [online] available from <https://twitter.com/erinmaochu/status/1230832622735101952> [31 March 2020]
- Escobar, A. and Harcourt, W. (2005) 'Practices of Difference'. in *In Women and the Politics of Place*. ed. by Escobar, W.H. and A. Bloomfield: Kumarian, 1–17
- Esteva, G., Stuchul, D.L., and Prakash, M.S. (2005) 'From a Pedagogy for Liberation to Liberation from Pedagogy'. in *Rethinking Freire: Globalisation and the Environmental Crisis*. ed. by Bowers, C.A., Apffel- Marglin, F., and Mahwah, N. Lawrence Erlbaum Associates, 13–30
- European Commission (n.d.) Agroecology | Knowledge for Policy [online] available from https://ec.europa.eu/knowledge4policy/global-food-nutrition-security/topic/agroecology_en [6 October 2020]
- Fals Borda, O. (2001) 'Participatory (Action) Research in Social Theory: Origins and Challenges'. in Handbook of Action Research. ed. by Reason and Bradbury, H. London: Sage, 27–37
- Fals Borda, O. (1988) Knowledge and People's Power Lessons with Peasants in Nicaragua, Mexico and Colombia. New Delhi: Indian Social Institute

- Fals Borda, O. (1979) 'INVESTIGATING REALITY IN ORDER TO TRANSFORM IT: THE COLOMBIAN EXPERIENCE'. *Dialectical Anthropology* 4 (1), 33–55
- Fals Borda, O. and Rahman, M.A. (1991) Action and Knowledge : Breaking the Monopoly with Participatory Action-Research. ed. by Fals-Borda, O. and Rahman, M.A. New York : London: New York : Apex Press
- Feagan, R. (2007) "The Place of Food: Mapping out the "local" in Local Food Systems'. Progress in Human Geography 31 (1), 23–42
- Ferguson, M. (2012) Sharing Democracy. Oxford: Oxford University Press
- Fernandes, J., Saltmarsh, E., and Miller, K. (2019) Agroecology in Action [online] available from https://landworkersalliance.org.uk/wpcontent/uploads/2018/10/Agroecology_in_action.pdf>
- Fernandez, M. (2017) 'Urban Agriculture in Cuba: 30 Years of Policy and Practice'. Urban Agriculture Magazine November, 41–44
- Field, Y., Murray, K., and Farmer, D.C. (2015) A Place to Call Home [online] available from https://static1.squarespace.com/static/58f9e592440243412051314a/t/5b57357770a6ad96924ba51a/1532441984534/A-Place-to-Call-Home+2015.pdf>
- Figueroa, M. (2015) 'Food Sovereignty in Everyday Life: Toward a People-Centered Approach to Food Systems'. *Globalizations* [online] 12 (4), 498–512. available from http://dx.doi.org/10.1080/14747731.2015.1005966>
- Fischer, M., Pirog, R., and Hamm, M.W. (2015) 'Food Hubs: Definitions, Expectations, and Realities'. *Journal of Hunger and Environmental Nutrition* [online] 10 (1), 92–99. available from http://dx.doi.org/10.1080/19320248.2015.1004215>
- Foley, D. and Vlaenzuela, A. (2005) 'Critical Ethnography: The Politics of Collaboration'. in Handbook of Qualitative Research. Thousand Oaks, Calafornia: SAGE Publications, 217–234
- Follmann, A. and Viehoff, V. (2014) 'A Green Garden on Red Clay: Creating a New Urban Common as a Form of Political Gardening in Cologne, Germany'. *Local Environment* [online] 20 (10), 1148–1174. available from http://www.tandfonline.com/doi/abs/10.1080/13549839.2014.894966>

Food Justice and Food Justice for All (2017) Food, Justice and Food Justice for All. Birmingham

- Foucault, M. (1980) Power / Knowledge: Selected Interviews and Other Writings, 1972-1977. New York: Pantheon Books
- Foundation, L.W. (n.d.) *Living Wage Foundation* | For the Real Cost of Living [online] available from https://www.livingwage.org.uk/ [3 October 2020]
- Francis, C., Lieblein, G., Gliessman, S., Breland, T.A., Creamer, N., Harwood, R., Salomonsson, L., Helenius, J., Rickerl, D., Salvador, R., Widenhoeft, M., Simmons, S., Allen, P., Altieri, M., Flora, C., and Poincelot, R. (2003) 'Agroecology: The Ecology of Food Systems'. *Journal of Sustainable Agriculture* 22 (3), 99–118
- Frankenberg, R. (2004) 'On Unsteady Ground: Crafting and Engaging in the Critical Study of Whiteness'. in Researching Race and Racism. ed. by Bulmer, M. and Solomos, J. London, UK: Routledge, 104–118
- Franklin, A., Newton, J., and Mcentee, J.C. (2011) 'Moving beyond the Alternative: Sustainable Communities, Rural Resilience and the Mainstreaming of Local Food'. *Local Environment* 16 (8), 771–788
- Fraser, N. (2000) 'Rethinking Recognition'. New Left Review [online] 3 (June), 107–120. available from http://newleftreview.org/II/3/nancy-fraser-rethinking-recognition
- Freire, P. (2000) *Pedagogy of the Oppressed.* 30th anniv. ed. by Ramos, T. by M.B. New York: Bloomsbury
- Freire, P. (1975) Pedagogy of the Oppressed. [S.l.] : Penguin Education, 1972 1975
- Freire, P. (1972) Pedagogy of the Oppressed. New York: Herder
- Freitag, U. and von Oppen, A. (2010) "Translocality": An Approach to Connection and Transfer in Area Studies'. in *Translocality: The Study of Globalising Processes from a Southern Perspective*. ed. by Freitag, U. and von Oppen, A. Leiden: Brill, 1–21
- Fricker, M. (2007) *Epistemic Injustice: Power and the Ethics of Knowing*. Oxford, UK: Oxford University Press
- Fung, A. and Wright, E.O. (2001) 'Deepening Democracy: Innovations in Empowered Participatory Governance'. *Politics and Society* 29 (1), 5–41
- Gallardo-López, F., Hernández-Chontal, M.A., Cisneros-Saguilán, P., and Linares-Gabriel, A.(2018) 'Development of the Concept of Agroecology in Europe: A Review'. *Sustainability*

(Switzerland) 10 (4), 1-23

- Gamauf (2019) 'No Business as Usual: Challenging Whiteness in the New Economy'. Stir: The magazine for the new economy 36–39
- García-Sempere, A., Hidalgo, M., Morales, H., Ferguson, B.G., Nazar-Beutelspacher, A., and Rosset, P. (2018) 'Urban Transition toward Food Sovereignty'. *Globalizations* [online] 15 (3), 390–406. available from https://doi.org/10.1080/14747731.2018.1424285>
- Garzo Montalvo, M.F. (2015) 'To the American Food Justice Movements: A Critique That Is Also an Offering'. *Journal of Agriculture Food Systems and Community Development* 5 (4), 125–129
- Gasson, R. (1988) 'FARM DIVERSIFICATION AND RURAL DEVELOPMENT'. Journal of Agricultural Economics 39 (2), 175–182
- Gaventa, J. and Cornwall, A. (2008) 'Power and Knowledge'. in *The Sage Handbook of Action Research*. Second. Sage
- Gayá, P. (n.d.) School of Economics, Finance and Management Directory [online] available from http://www.bris.ac.uk/efm/people/patricia-c-gaya/ [8 January 2020]
- Gayá Wicks, P., Reason, P., and Bradbury, H. (2008) 'Living Inquiry: Personal, Political and Philosophical Groundings for Action Research Practice'. in *The Sage Handbook of Action Research: Participative Inquiry and Practice*. Second Edi. ed. by Reason, P. and Bradbury, H. London, 15–30
- Gaztambide-Fernández, R.A. (2012) 'Decolonization and the Pedagogy of Solidarity'. *Decolonization: Indigeneity, Education & Society* 1 (1), 41–67
- Geertz, G. (1983) Local Knowledge: Further Essays in Interpretive Anthropology. New York: Basic Books
- Gergen, K.J. and Gergen, M.. (2008) 'Social Construction and Research as Action. In The Sage Handbook of Action Research: Participative Inquiry and Practice, 2nd Ed.; Reason, P. Bradbury, H., Eds.; Sage: London, UK, 2008; Pp. 159–171.' in *The Sage Handbook of Action Research: Participative Inquiry and Practice*. 2nd editio. ed. by Reason, P. and Bradbury, H. London: Sage, 159–171
- Ghose, R. and Pettygrove, M. (2014) 'Urban Community Gardens as Spaces of Citizenship'. Antipode 46 (4), 1092–1112

Gibson-Graham, J.K. (2012) 'Diverse Economies: Performative Practices for "Other Worlds"". in

The Wiley-Blackwell Companion to Economic Geography. 33-46

Gibson-Graham, J.K. (2006) A Post Capitalist Politics. Minneapolis: University of Minnesota Press

- Giddens, A. (1993) 'Problems of Action and Structure'. in *The Giddens Reader*. ed. by Cassell, P. Stanford: Stanford University Press, 88–175
- Giddens, A. (1979) Central Problems in Social Theory: Action, Structure, and Contradictions in Social Theory. First. Berkeley: University of California Press
- Giraldo, O.F. and Rosset, P.M. (2018) 'Agroecology as a Territory in Dispute: Between Institutionality and Social Movements'. *Journal of Peasant Studies* [online] 45 (3), 545–564. available from https://doi.org/10.1080/03066150.2017.1353496>
- Glennie, C. and Alkon, A.H. (2018) 'Food Justice: Cultivating the Field'. *Environmental Research Letters* 13 (7)
- Gliessman, S. (2016) 'Transforming Food Systems with Agroecology'. Agroecology and Sustainable Food Systems 40 (3), 187–189
- Gliessman, S. (2011) 'Agroecology and Food System Change'. *Journal of Sustainable Agriculture* 35 (4), 347–349
- Goldstein, N. (2012) Globalization and Free Trade. Second edi. New York: Facts on File
- González, C.G., Perpinyà, A.B., Tulla I Pujol, A.F., Martín, A.V., and Belmonte, N.V. (2014) 'La Agricultura Social En Catalunya: Innovación Social y Dinamización Agroecológica Para La Ocupación de Personas En Riesgo de Exclusión'. *Ager* (17), 65–97
- Gonzalez, R.A., Thomas, J., and Chang, M. (2018) "Translating Agroecology into Policy: The Case of France and the United Kingdom'. *Sustainability (Switzerland)* 10 (8), 1–19
- Good Finance (n.d.) Sutton Community Farm | Good Finance [online] available from <https://www.goodfinance.org.uk/case-studies/sutton-community-farm> [6 October 2020]
- Goodman, D.E., DuPuis, M., and Goodman, M.K. (2012) Alternative Food Networks: Knowledge, Practice, and Politics. NY: Routledge
- Gottlieb, R. and Joshi, A. (2010) Food Justice. Cambridge, Mass.: MIT Press
- Gov.uk (2015) English Indices of Deprivation 2015 GOV.UK [online] available from <https://www.gov.uk/government/statistics/english-indices-of-deprivation-2015> [25]

August 2018]

- Grant, J., Nelson, G., and Mitchell, T. (2008) 'Negotiating the Challenges of Participatory Action Research: Relationships, Power, Participation, Change and Credibility'. in *The Sage Handbook of Action Research: Participative Inquiry and Practice*. Second. ed. by Reason, P. and Bradbury, H. Sage, 589–601
- Granville Community Kitchen (2018) London Plan Consultation Reply [online] available from <https://www.london.gov.uk/sites/default/files/granville_community_kitchen_5737.pdf> [9 May 2020]
- Graphic Harvest (2019) Graphic Harvest | Graphic Harvesting [online] available from https://www.graphicharvest.co.za/graphic-harvesting [28 May 2019]
- Greater London Authority (2018) London Food Strategy [online] London. available from https://www.london.gov.uk/sites/default/files/implementation_plan_2018-2023.pdf
- Greene, M.J. (2014) On the Inside Looking In: Methodological Insights and Challenges in Conducting Qualitative Insider Research. 19, 1–13
- Greenwood, D. (2002) 'Action Research: Unfulfilled Promises and Unmet Challenges'. *Concepts and Transformation:* 7 (2), 117–139
- Greiner, C. and Sakdapolrak, P. (2013) 'Translocality: Concepts, Applications and Emerging Research Perspectives'. *Geography Compass* 7 (5), 373–384
- Griffith, A. (1998) 'Insider/Outsider: Epistemological Priveledge and Mothering Work.' Human Studies 21, 361–376
- Groot, E. de and Veen, E. (2017) 'Food Forests: An Upcoming Phenomenon in the Netherlands'. Urban Agriculture Magazine November, 34–36
- Gunn, C. (2006) 'Cooperatives and Market Failure: Workers' Cooperatives and System Mismatch'. Review of Radical Political Economics 38 (3), 345–354
- Gustavsen, B., Hansson, A., and Qvale, T.U. (2008) 'Action Research and the Challenge of Scope'. in *The Sage Handbook of Action Research: Participative Inquiry and Practice*. Second. Sage
- Guthman, J. (2008) 'Bringing Good Food to Others: Investigating the Subjects of Alternative Food Practice'. *Cultural Geographies* 15 (4), 431–447

- Guthman, J. (2007) 'Commentary on Teaching Food: Why I Am Fed up with Michael Pollan et Al'. in *Agriculture and Human Values*. vol. 24 (2). 261–264
- Guthman, J., Morris, A.W., and Allen, P. (2006) 'Squaring Farm Security and Food Security in Two Types of Alternative Food Institutions'. *Rural Sociology* 71 (4), 66–684
- Guzmán-Casado, G.M., de Molina, M.G., and Sevilla-Guzmán, E. (1999) Introducción a La Agroecología Como Desarrollo Rural Sostenible. Madrid: Ediciones Mundi-Prensa
- Hackney, S. (n.d.) *Hackney Food Growers Network Sustainable Hackney* [online] available from https://sustainablehackney.org.uk/group/food-growers-network> [19 February 2020]
- Hale, C. (2008) Engaging Contradictions: Theory, Politics, and Methods of Activist Scholarship. First Edit. ed. by Hale, C. Berkeley, Calif.: Berkeley, Calif.
- Hall, J. and Tolhurst, I. (2006) Growing Green Organic Techniques for a Sustainable Future. Altrincham: The Vegan Organic Network
- Hamnett, C. (2003) Unequal City: London in the Global Arena. London: Routledge
- Hamnett, C. and Butler, T. (2013) 'Re-Classifying London: A Growing Middle Class and Increasing Inequality'. *City* [online] 17 (2), 197–208. available from http://www.tandfonline.com/doi/abs/10.1080/13604813.2013.765719
- Haraway, D. (1988) 'Situated Knowledges: The Science Question in Feminism and the Privilege of Partial Perspective'. *Feminist Studies* 14 (3), 575
- Haraway, D.J. (1991) Simians, Cyborgs, and Women: The Reinvention of Nature. New York: Routledge, 1991.
- Harding, S. (2017) 'Latin American Decolonial Studies: Feminist Issues'. Feminist Studies 43 (3), 624-636
- Hardy, J., Hamm, M., Pirog, R., Fisk, J., Farbman, J., and Fischer, M. (2016) Findings of the 2015 National Food Hub Survey [online] East Lansing. available from http://www.foodsystems.msu.edu/resources/2015-food-hub-survey>
- Haringey Council (2019) Haringey at a Glance: State of the Brough [online] London. available from https://www.haringey.gov.uk/sites/haringeygovuk/files/state_of_the_borough_final_master_version.pdf

- Haringey Council (2017) Community Schemes and Volunteering Opportunities as OrganicLea Set to Run Wolves Lane Horticultural Centre | Haringey Council [online] available from <https://www.haringey.gov.uk/news/community-schemes-and-volunteering-opportunitiesorganiclea-set-run-wolves-lane-horticultural-centre> [27 May 2019]
- Haringey Council (2013) Equalities Profile of Haringey [online] London. available from <https://www.haringey.gov.uk/sites/haringeygovuk/files/equalities_profile_of_haringey.pdf >
- Harris, E. (2009) 'Neoliberal Subjectivities or a Politics of the Possible? Reading for Difference in Alternative Food Networks'. *Area* 41 (1), 55–63
- Harvey, D. (2012) Rebel Cities : From the Right to the City to the Urban Revolution. New York: Verso
- Harvey, D. (2007) 'Neoliberalism and the City'. Studies in Social Justice 1 (1)
- Harvey, D. (2006) 'Neo-Liberalism as Creative Destruction'. Geografiska Annaler 88B (2), 145-158
- Harvey, D. (2004) "The "new" Imperialism: Accumulation by Dispossession'. *Socialist Register* 40, 63–87
- Harvey, D. (1989) 'From Managerialism to Entrepreneurialism: The Transformation in Urban Governance in Late Capitalism'. Geografiska Annaler: Series B, Human Geography [online] 71 (1), 3–17. available from https://doi.org/10.1080/04353684.1989.11879583>
- Hassanein, N. (2008) 'Locating Food Democracy: Theoretical and Practical Ingredients'. Journal of Hunger & Environmental Nutrition 3 (2–3), 286–308
- Hassanein, N. (2003) 'Practicing Food Democracy: A Pragmatic Politics of Transformation'. *Journal of Rural Studies* 19 (1), 77–86
- Helfrich, S. and Bollier, D. (2015) 'Commons'. in Degrowth: A Vocabulary for a New Era. ed. by D'Alisa, Demaria, F., and Kallis, G. London: Routledge
- Hemming, P.J. (2008) 'Mixing Qualitative Research Methods in Children's Geographies'. Area 40 (2), 152–162
- Heron, J. and Reason, P. (1997) 'A Participatory Inquiry Paradigm'. *Qualitative Inquiry* [online] 3 (3), 274–294. available from https://doi.org/10.1177/107780049700300302
- Herr, K. and Anderson, G. (2005) The Action Research Dissertation: A Guide for Students and Faculty.

[online] available from <http://methods.sagepub.com/book/the-action-researchdissertation>

- Heynen, N. (2017) 'Urban Political Ecology'. in *The International Encyclopedia of Geography*. ed. by Richardson, D. (Chief E. London, UK: Wiley
- Heynen, N., Kaika, M., and Swyngedouw, E. (2006) In the Nature of Cities: Urban Political Ecology and the Politics of Urban Metabolism. Routledge
- Heynen, N., Kurtz, H., and Trauger, A. (2012) 'Food Justice, Hunger and the City'. *Geography* compass 6 (5), 304–311
- Hinrichs, C. (2003) 'The Practice and Politics of Food System Localization'. *Journal of Rural Studies* 19 (1), 33–45
- Hinrichs, C. (2000) 'Embeddedness and Local Food Systems: Notes on Two Types of Direct Agricultural Market'. *Journal of Rural Studies* 16 (3), 295–303
- Hinrichs, C.C. and Allen, P. (2008) 'Selective Patronage and Social Justice: Local Food Consumer Campaigns in Historical Context'. *Journal of Agricultural and Environmental Ethics* 21 (4), 329–352
- Hislop, R. (2014) Reaping Equity Across the USA: FJ Organizations Observed at the National Scale. University of California Davis
- Hockey, J. and Forsey, M. (2012) 'Ethnography Is Not Participant Observation: Refl Ections on the Interview as Participatory Qualitative Research'. in *The Interview : An Ethnographic Approach*. ed. by Skinner, J. Oxford: Oxford : Berg, 69–87
- Hoekstra, F. and Torgnaghi, C. (2017) 'Editorial for Urban Agriculture'. Urban Agriculture Magazine November, 3–4
- Holloway, J. (2010) 'Crack Capitalism'. Pluto Press 29-37
- Holmgren, D. (2002) Permaculture: Principles and Pathways beyond Sustainability. Holmgren Design Services
- Holt-Giménez, E. and Wang, Y. (2011) 'Reform or Transformation? The Pivotal Role of Food Justice in the U.S. Food Movement'. Race/Ethnicity: Multidisciplinary Global Contexts 5 (1), 83– 102
- Holt Giménez, E. and Shattuck, A. (2011) 'Food Crises, Food Regimes and Food Movements:

Rumblings of Reform or Tides of Transformation?' *The Journal of peasant studies* [online] 38 (1), 109–44. available from http://www.ncbi.nlm.nih.gov/pubmed/21284237

- Holtom, B. (2015) Life after Immigration Detention as "Detention without Walls": The Spectre of Detention and Deportation in the United Kingdom. University of Glasgow
- hooks, bell (2004) The Will to Change: Men, Masculinity and Love. New York: Attria
- Hooks, B. (2010) Teaching Critical Thinking: Practical Wisdom / Bell Hooks. London: London: Routledge
- Hooks, B. (2000) All about Love. London: London: Women's, 2000.
- Hooks, B. (1994) *Teaching to Transgress Education as the Practice of Freedom*. New York : London: Routledge
- Hoppe, M.J., Wells, E.A., Wilson, M.S., Gillmore, M.R., and Morrison, D.M. (1994) 'Children's Knowledge and Belief about AIDS: Qualitative Data from Focus Group Interviews'. *Health Education Quarterly* 21 (1), 117–126
- Horst, M., Mcclintock, N., and Hoey, L. (2017) 'The Intersection of Planning, Urban Agriculture, and Food Justice: A Review of the Literature'. *Journal of the American Planning Association* 83 (3), 277–295
- Horton, J. and Kraftl, P. (2009) 'Small Acts, Kind Words and "Not Too Much Fuss": Implicit Activisms'. *Emotion, Space and Society* 2, 14–23
- Hou, J., Johnson, J., and Lawson, L. (2009) Greening Cities, Growing Communities: Learning from Seattle's Urban Community Gardens / Jeffrey Hou, Julie M. Johnson, and Laura J. Lawson. ed. by Johnson 1962-, J. and Lawson 1966-, L.J. Washington, D.C.: Seattle, Wash.: Washington, D.C.: Landscape Architecture Foundation
- Hyden, L.C. and Bulow, P.H. (2003) 'Who's Talking: Drawing Conclusions from Focus Groups— Some Methodological Considerations'. *International Journal of Social Research Methodology: theory* and practice 6 (4), 305–321
- India Together (2003) India Together: Monocultures of the Mind [online] available from http://indiatogether.org/vandana-interviews [4 December 2019]
- Institute of Race Relations (2015) *A New Anti-Racist Toolkit for Youth Workers* [online] available from https://irr.org.uk/article/a-new-anti-racist-toolkit-for-youth-workers/ [24 September

- IPES-Food (2016) From Uniformity to Diversity. A Paradigm Shift from Industrial Agriculture to Diversified Agroecological Systems. Louvain-la-Neuve
- Isenberg, D.H., Loomis, C., Humphreys, K., and Maton, K.I. (2004) 'Self-Help Research: Issues of Power Sharing.' in *Participatory Community Research: Theories and Methods in Action*. APA decade of behavior volumes. Washington, DC, US: American Psychological Association, 123–137
- Jaggar, A. (1989) 'Love and Knowledge: Emotion in Feminist Epistemology'. Inquiry 32, 151-176
- Janhäll, S. (2015) 'Review on Urban Vegetation Community Development'. *Community Development* 6 (1), 77–94
- Jansen, K. (2015) "The Debate on Food Sovereignty Theory: Agrarian Capitalism, Dispossession and Agroecology". *Journal of Peasant Studies* [online] 42 (1), 213–232. available from http://dx.doi.org/10.1080/03066150.2014.945166>
- Jarosz, L. (2008) 'The City in the Country: Growing Alternative Food Networks in Metropolitan Areas'. *Journal of Rural Studies* 24 (3), 231–244
- Jennings, B. (1988) Foundations of International Agricultural Research: Science and Politics in Mexican Agriculture. Boulder CO: Westview Press
- Johnston, J. (2008) "The Citizen-Consumer Hybrid: Ideological Tensions and the Case of Whole Foods Market'. *Theory and Society* 37 (3), 229–270
- Johnston, J. and Baumann, S. (2010) Foodies : Democracy and Distinction in the Gourmet Foodscape / Josée Johnston, Shyon Baumann. ed. by Baumann 1971-, S. London: London : Routledge, 2010.
- Jorgensen, D. (1989) Participant Observation: A Methodology for Human Studies. Calafornia : London : New Delhi: SAGE Publications
- Jose Luis, V.-P., Tomaso, F., Olivier, D.S., and Ugo, M. (2019) 'The Food Commons Are Coming...' Routledge Handbook Of Food As A Commons 0–21
- Just Space (2016a) The Future of London's Food System Panel [online] available from https://vimeo.com/156556730> [17 August 2017]
- Just Space (2016b) Towards a Community-Led Plan for London: Policy Directions and Proposals. London, UK

- Kato, Y. (2013) 'Not Just the Price of Food: Challenges of an Urban Agriculture Organization in Engaging Local Residents'. *Sociological Inquiry* 83 (3), 369–391
- Katz, C. (2004) Growing up Global: Economic Restructuring and Children's Everyday Lives. Minneapolis: University of Minnesota Press
- Katz, C. (2001) 'On the Grounds of Globalization: A Topography for Feminist Political Engagement'. Signs 26, 1213–1234
- Katz, C. (1994) 'Playing the Field: Questions of Fieldwork in Geography'. *Professional Geographer* 46 (1), 67–72
- Kaufman, J. and Bailkey, M. (2000) Farming inside Cities: Entrepreneurial Urban Agriculture in the United States. Cambridge
- Keating, A. (2007) Teaching Transformation: Transcultural Classroom Dialogues. New York: Palgrave Macmillan
- Kemmis, S., McTaggart, R., and Nixon, R. (2014) The Action Research Planner: Doing Critical Participatory Action Research. Singapore: Springer
- Kenton, W. (2020) Sweat Equity Definition [online] available from https://www.investopedia.com/terms/s/sweatequity.asp [26 May 2020]
- Kesby, M. (2005) 'Retheorizing Empowerment-through-Participation as a Performance in Space: Beyond Tyranny to Transformation'. *Signs* 30 (4), 2037–2065
- Kindon, S., Pain, R., and Kesby, M. (2007) Participatory Action Research Approaches and Methods. First Edit. ed. by Kindon, S., Pain, R., and Kesby, M. New York: Routledge
- Kneafsey, M., Owen, L., Bos, E., Broughton, K., and Lennartsson, M. (2016) 'Capacity Building for Food Justice in England: The Contribution of Charity-Led Community Food Initiatives'. *Local Environment* [online] 0 (0), 1–14. available from https://www.tandfonline.com/doi/full/10.1080/13549839.2016.1245717
- Kobayashi, M., Tyson, L., and Abi-Nader, J. (2010) *The Activities and Impacts of Community Food Projects 2005-2009* [online] available from https://nesfp.org/sites/default/files/uploads/activities_impacts_of_cfps_2005-09.pdf
- Koch, K. and Hamm, M.W. (2015) 'The Role of Values in Food Hub Sourcing and Distributing Practices'. *Journal of Hunger Environment Nutrution* 10, 483–495

- Krieg, B. and Roberts, L. (2010) 'Photovoice: Insights Into Marginalisation Through a "Community Lens" in Saskatchewan, Canada'. in *Participatory Action Research Approaches and Methods: Connecting People Participation and Place*. ed. by Kindon, S., Pain, R., and Kesby, M. London, UK: Routledge
- Krueger, R.A. (1994) Focus Groups: A Practical Guide for Applied Research. London, UK: SAGE Publications
- Kumar, S. and Martin, G. (2004) 'A Case for Culturally Responsive Urban Design'. Ontario Planning Journal 19 (5), 5–7
- Kurtz, H.E. (2001) 'Differentiating Multiple Meanings of Garden and Community'. Urban Geography 22 (7), 656–670
- Landworkers' Alliance (2020) Landworkers' Alliance Calls for Emergency "Land Army" Package to Protect Our Local Food Supply – Landworkers Alliance [online] available from <https://landworkersalliance.org.uk/emergency-land-army-package/> [28 May 2020]
- Landworkers Alliance (2020a) Agroecology in the New Agriculture Bill Landworkers Alliance [online] available from https://landworkersalliance.org.uk/agroecology-in-the-new-agriculture-bill/> [6 October 2020]
- Landworkers Alliance (2020b) We Are Recruiting Come and Work with Us Landworkers Alliance [online] available from <https://landworkersalliance.org.uk/we-are-recruiting-2020/> [8 October 2020]
- Landworkers Alliance (n.d.) *Our Vision Landworkers Alliance* [online] available from https://landworkersalliance.org.uk/our-vision/ [5 December 2019]
- Lang, T. (1998) 'Food Policy for the 21st Century:Can It Be Both Radicaland Reasonable?' in For Hunger Proof Cities: Sustainable Urban Food Systems. ed. by Koc, M., MacRae, R., Mougeot, L.J.A., and Welsh, J. Ottowa, Canada: International Development Research Centre, 216–224
- Lather, P. (2001) 'Validity as an Incitement to Discourse: Qualitative Research and the Crisis of Legitimation'. in *Handbook of Research on Teaching*. 4th edn. ed. by Richardson, V. Washington, DC: American Educational Research Association, 241–58
- Lattuca, A. (2017) 'Using Agroecological and Social Inclusion Principles in the Urban Agriculture Programme in Rosario, Argentina'. *Urban Agriculture Magazine* November, 51–52

LeBlanc, J., Conner, D., McRae, G., and Darby, H. (2014) 'Building Resilience in Nonprofit Food

Hubs'. Journal of Agriculture, Food Systems, and Community Development 4 (3), 121-135

- Ledwith, M. (2015) *Community Development in Action : Putting Freire into Practice / Margaret Ledwith.* [Place of publication not identified] : Policy Press, 2015.
- Lees, L. (2016) 'Gentrification, Race, and Ethnicity: Towards a Global Research Agenda?' *City & Community* 15 (3), 208–214
- Leitner, H., Peck, J., and Sheppard, E. (2007) *Contesting Neoliberalism.* ed. by Leitner, H., Peck, J., and Sheppard, E. New York: The Guildford Press
- Levidow, L. (2018) 'London's Urban Agriculture: Building Community through Social Innovation'. *Journal of Sociology of Agriculture & Food* [online] 24 (3), 354–376. available from <http://dpp.open.ac.uk/people/levidow.htm>
- Levin, M. (2008) 'The Praxis of Educating Action Researchers'. in *The Sage Handbook of Action* Research: Participative Inquiry and Practice. 2nd edn. Sage
- Levine, M. (2017) A Sad and Avoidable Story of a High-Profile Failure in Leadership Succession Non Profit News | Nonprofit Quarterly [online] available from https://nonprofitquarterly.org/sad-avoidable-story-high-profile-failure-leadership-succession/ [20 May 2020]
- Levkoe, C., Brem-Wilson, J., and Anderson, C. (2018a) 'People, Power, Change: Three Pillars of a Food Sovereignty Research Praxis'. *Journal of Peasant Studies* 46 (7), 1389–1412
- Levkoe, C., Hammelman, C., Craven, L., Dandy, G., Farbman, J., Harrison, J., and Mount, P.
 (2018b) 'Building Sustainable Communities Through Food Hubs: Practitioner and Academic Perspectives'. *Journal of Agriculture, Food Systems, and Community Development* 8 (2), 1–16
- Levkoe, C.Z. (2011) 'Towards a Transformative Food Politics'. *Local Environment* [online] 16 (7), 687–705. available from http://www.tandfonline.com/doi/abs/10.1080/13549839.2011.592182
- Levkoe, C.Z. (2006) 'Learning Democracy through Food Justice Movements'. Agriculture and Human Values 23 (1), 89–98
- Liamputtong, P. (2008) 'Doing Research in a Cross-Cultural Context: Methodological and Ethical Challenges'. *Social Indicators Research Series* 34 (1), 3–20
- Light, A. and Akama, Y. (2014) 'Structuring Future Social Relations: The Politics of Care in Participatory Practice'. *Proceedings of the 13th Participatory Design Conference: Research Papers* -

Volume 1 (PDC '14) 2014 (October), 151-160

- Light, A., Wakeford, Tom, Egglestone, Paul, Rogers, Jon, Egglestone, P, Wakeford, T, and Rogers, J (2011) 'Research on an Equal Footing? A UK Collaborative Inquiry into Community and Academic Knowledge'. *Proc. IKTC* 11 (March 2015)
- Lincoln, Y. and Guba, E. (1985) Naturalistic Inquiry. Beverly Hills, Calafornia: Sage
- Lipp, A. (2007) 'Developing the Reflexive Dimension of Reflection: A Framework for Debate'. International Journal of Multiple Research Approaches 1 (1), 18–26
- Litherland, R. (2014) 'An Open Letter to the Co-Operative'. in *Seedlings from the Smoke : Musings of an Urban Market Gardener*. London: OrganicLea Community Growers, 194–195
- Little, S. (2019) What Salary Do First-Time Buyers Need to Get on the Property Ladder? [online] available from <https://www.moneyobserver.com/news/what-salary-do-first-time-buyers-need-toget-property-ladder> [20 February 2020]
- Lohest, F., Bauler, T., Sureau, S., Mol, J. Van, and Achten, W.M.J. (2019) 'Linking Food Democracy and Sustainability on the Ground: Learnings from the Study of Three Alternative Food Networks in Brussels'. *Politics and Governance* 7 (4), 21–31
- London, T. for (2019) London Living Wage | Trust for London [online] available from <https://www.trustforlondon.org.uk/issues/work/london-living-wage/> [29 May 2020]
- Loo, C. (2014) 'Towards a More Participative Definition of Food Justice'. *Journal of Agricultural and Environmental Ethics* 27 (5), 787–809
- López, D., Alonso, N., Herrera, P.M., Mérida, J., and Pérez, J.M. (2017) "Cities for Agroecology" Networks in Europe and Spain'. *Urban Agriculture Magazine* November, 55–57
- Lorenzetti, L. and Walsh, C.A. (2014) 'Is There an "F" in Your Par? Understanding, Teaching and Doing Action Research'. *Canadian Journal of Action Research* 15 (1), 50–63
- Low, S. and Smith, N. (2006) The Politics of Public Space. London: Routledge
- Lowndes, V. and Gardner, A. (2016) 'Local Governance under the Conservatives: Super-Austerity, Devolution and the "smarter State". *Local Government Stud- ies* 42 (3), 357–375
- ludmilap (2012) Who Is Oakland: Anti-Oppression Activism, the Politics of Safety, and State Co-Optation | Escalating Identity [online] available from

<https://escalatingidentity.wordpress.com/2012/04/30/who-is-oakland-anti-oppression-politics-decolonization-and-the-state/> [9 August 2017]

- Lydon, M. (2003) 'Community Mapping The Recovery (and Discovery) of Our Common Ground'. *Geomatica* [online] 57 (1999-2003 Anniversary Issue-Cartography in Canada), 1–32. available from http://www.aughty.org/pdf/community_mapping.pdf
- Lykes, M.B. and Mallona, A. (2008) "Towards Transformational Liberation: Participatory and Action Research and Praxis'. in *The Sage Handbook of Action Research: Participative Inquiry and Practice*. ed. by Reason, P. and Bradbury, H. SAGE Publications Ltd, 106–120
- Machín Sosa, B., Roque Jaime, A.M., Ávila Lozano, D.R., and P.M., R. (2013) Agroecological Revolution: The Farmer-to-Farmer Movement of the ANAP in Cuba [online] available from http://viacampesina.org/downloads/pdf/en/Agroecological-revolution-ENGLISH.pdf >
- Maguire, P. (2001) 'Uneven Ground: Feminisms and Action Research'. in Handbook of Action Research. ed. by Reason, P. and Bradbury, H. London, UK: Sage, 59–69
- Majee, W. and Hoyt, A. (2009) 'Building Community Trust through Cooperatives: A Case Study of a Worker-Owned Homecare Cooperative'. *Journal of Community Practice* 17 (4), 444–463
- Mama D (2018) Chicken Shops, Community Food Growers and the New London Plan [online] available from https://www.cfgn.org.uk/2018/04/chicken-shops-community-food-growers-and-thenew-london-plan/> [27 September 2020]
- Mama D and Anderson, C. (2016) Decolonisation and Food Sovereignty in Europe Thoughts from the Edges -People's Knowledge [online] available from https://www.peoplesknowledge.org/discussionson-decolonising-food-food-sovereignty-in-europe/> [22 October 2019]
- Mares, T.M. and Peña, D.G. (2011) 'Environmental and Food Justice: Towards Local, Slow and Deep Food Systems'. in *Cultivating Food Justice: Race, Class and Sustainability*. 197–219
- María, L. (2009) 'The Coloniality of Gender'. in *Globalization and the Decolonial Option*. ed. by Mignolo, W. and Escobar, A. 369–90
- Martikke, S., Church, A., and Hart, A. (2015) Greater than the Sum of Its Parts: What Works in Sustaining Community-University Partnerships [online] available from ">https://www.gmcvo.org.uk/publications/greater-sum-its-parts-what-works-sustainingcommunity-university-partnerships>

Martin, A.W. (2008) 'Action Research on a Large Scale: Issues and Practices'. in The SAGE

Handbook of Action Research: Participative Inquiry and Practice. ed. by Reason, P. and Bradbury, H. London, UK: Sage, 394–406

- Martínez-Torres, M.E. and Rosset, P.M. (2014) 'Diálogo de Saberes in La Vía Campesina: Food Sovereignty and Agroecology'. *Journal of Peasant Studies* [online] 41 (6), 979–997. available from http://dx.doi.org/10.1080/03066150.2013.872632>
- Marx, K. (1967) Capital. Volume III. New York: International Publishers
- Massey, D. (2013) *After Neoliberalism? Introduction to the Kilburn Manifesto* | *OpenDemocracy* [online] available from <https://www.opendemocracy.net/en/opendemocracyuk/after-neoliberalism-introduction-to-kilburn-manifesto/> [19 October 2019]
- Massey, D. (2010) 'World City'. Journal of regional science. 50 (2), 657-659
- Massey, D. (2007) World City. First. Cambridge, UK: Polity Press
- Massey, D. (1991) 'A Global Sense of Place'. Marxism Today 24-29
- Massicotte, M.-J. (2014) 'Solidarity Economy and Agricultural Cooperatives: The Experience of the Brazilian Landless Rural Workers Movement'. *Journal of Agriculture, Food Systems, and Community Development* 4 (3), 155–176
- Maughan, C., Anderson, C., and Kneafsey, M. (2020) No Time for Justice?! Food Policy and Emergency Thinking in the Brexit Moment - Agroecology Now! [online] available from https://www.agroecologynow.com/no-time-for-justice-food-policy-and-emergency-thinking-in-the-brexit-moment/> [30 June 2020]
- Maye, D., Ilbery, B., and Watts, D. (2009) 'Farm Diversification, Tenancy and CAP Reform: Results from a Survey of Tenant Farmers in England'. *Journal of Rural Studies* 25, 333–342
- Mayer, M. (1996) 'Postfordistische Stadtpolitik: Neue Regulationsweisen in Der Lokalen Politik Und Planung [Post-Fordist City Politics: New Methods of Regulation in Local Politics and Planning]'. Zeitschrift f ur Wirtschaftsgeographie 40, 20–27
- McClintock, N. (2018) 'Cultivating (a) Sustainability Capital: Urban Agriculture, Ecogentrification, and the Uneven Valorization of Social Reproduction'. *Annals of the American Association of Geographers* 108 (2), 579–590
- McClintock, N. (2014) 'Radical, Reformist, and Garden-Variety Neoliberal: Coming to Terms with Urban Agriculture's Contradictions'. *Local Environment* [online] 19 (2), 147–171. available from

<http://www.scopus.com/inward/record.url?eid=2-s2.0-84895068294&partnerID=40&md5=7f5c493591fe60e64271cd492387716c>

- McClintock, N. (2010) 'Why Farm the City? Theorizing Urban Agriculture through a Lens of Metabolic Rift'. Cambridge Journal of Regions, Economy and Society 3 (2), 191–207
- McClintock, N., Wooten, H., and Brown, A. (2012) 'Toward a Food Policy 'First Step' in Oakland, California: A Food Policy Council's Efforts To Promote Urban Agriculture Zoning'. Journal of Agriculture, Food Systems, and Community Development 2 (4), 15–42
- McDowell, L. (2009) 'Interviewing: Fear and Liking in the Field'. in *The SAGE Handbook of Qualitative Geography*. ed. by DeLyser, D., Herbert, S., Aitken, S., Crang, M., and McDowell, L. London, UK: SAGE Publications Ltd, 156–171
- McIvor, D.W. (2011) "The Politics of Speed: Wolin, Connolly, and the Prospects for Democratic Citizenship in an Accelerated Polity'. *Polity* 43 (1), 58–83
- McIvor, D.W. and Hale, J. (2015) 'Urban Agriculture and the Prospects for Deep Democracy'. Agriculture and Human Values 32 (4)
- McKay, G. (2011) Radical Gardening: Politics, Idealism & Rebellion in the Garden. London: Frances Lincoln
- McMichael, P. (2009) 'A Food Regime Genealogy'. Journal of Peasant Studies 36 (1), 139-169
- McMichael, P. (2005) 'Global Development and the Corporate Food Regime'. in New Directions in the Sociology of Global Development. Bingley, UK: Emerald Group Publishing Limited, 265–299
- Meenar, M. and Hoover, B. (2012) 'Community Food Security via Urban Agriculture: Understanding People, Place, Economy, and Accessibility from a Food Justice Perspective'. Journal of Agriculture, Food Systems, and Community Development 3 (1), 143–160
- Meenar, M.R. (2017) 'Assessing the Spatial Connection between Urban Agriculture and Equity'. Built Environment 43 (3), 364–375
- Mellizo, P., Carpenter, J., and Matthews, P.H. (2011) Workplace Democracy in the Lab. 5460
- Méndez, E., Bacon, C., and Cohen, R. (2013) 'Agroecology as a Transdisciplinary, Participatory and Action-Oriented Approach'. Agroecology & Sustainable Food Systems [online] 37 (1), 3–18. available from

<https://www.researchgate.net/publication/257333793_Mendez_VE_CM_Bacon_and_R_C

ohen_2013_Agroecology_as_a_transdisciplinary_participatory_and_actionoriented_approach_Agroecology_and_Sustainable_Food_Systems_3713-18>

- Mignolo, W.D. (2000) Local Histories/Global Designs: Coloniality, Subaltern Knowledges, and Border Thinking [online] Princeton University Press. available from https://www.jstor.org/stable/j.cttq94t0
- Milbourne, P. (2012) 'Everyday (in)Justices and Ordinary Environmentalisms: Community Gardening in Disadvantaged Urban Neighbourhoods'. *Local Environment* 17 (9), 943–957
- de Molina, M. (2013) 'Agroecology and Politics. How to Get Sustainability? About the Necessity for a Political Agroecology'. Agroecology and Sustainable Food Systems 37 (1), 45–59
- Moragues-Faus, A. (2018) 'A Critical Perspective on the Transformative Capacity of Food Justice'. *Local Environment* [online] 23 (11), 1094–1097. available from https://doi.org/10.1080/13549839.2018.1532400
- Moragues-Faus, A. (2017) 'Problematising Justice Definitions in Public Food Security Debates: Towards Global and Participative Food Justices'. *Geoforum* 84, 95–106
- Moragues-Faus, A. and Marsden, T. (2017) 'The Political Ecology of Food: Carving 'Spaces of Possibility' in a New Research Agenda'. *Journal of Rural Studies* [online] 55, 275–288. available from https://doi.org/10.1016/j.jrurstud.2017.08.016>
- Moragues-Faus, A. and Morgan, K. (2015) 'Reframing the Foodscape: The Emergent World of Urban Food Policy'. *Environment and Planning A* 47 (7), 1558–1573
- Moragues-Faus, A. and Sonnino, R. (2019) 'Re-Assembling Sustainable Food Cities: An Exploration of Translocal Governance and Its Multiple Agencies'. *Urban Studies* 56 (4), 778– 794
- Morales, A. (2011) 'Growing Food and Justice: Dismantling Racism through Sustainable Food Systems'. in Cultivating Food Justice: Race, Class, and Sustainability. MIT Press, 149–176
- Morgan, K.J. and Morley, A. (2002) Re-Localising the Food Chain: The Role of Creative Public Procurement. Cardiff
- MORI, I. (2004) *Annual London Survey* [online] available from <https://www.ipsos.com/ipsosmori/en-uk/annual-london-survey-2004> [27 October 2020]
- Morley, A., Morgan, S., and Morgan, K. (2008) Food Hubs : The 'Missing Middle' of the Local Food

Infrastructure ? [online] Cardiff. available from <http://www.brass.cf.ac.uk/uploads/Food_HubKM0908.pdf>

- Morris, A. (2014) Paying for Our Cheap Food Choices [online] available from https://sustainablefoodtrust.org/articles/true-cost-accounting-cost-of-food/ [12 August 2020]
- Moser, H. (1980) 'Participatory Action Research the German Case'. in International Forum on Participatory Research. held 1980 at Ljubljana, Yugoslavia
- Mougeot, L. (2015) 'Urban Agriculture in Cities of the Global South: Four Logics of Integration'. in Food and the City: Histories of Culture and Cultivation. ed. by Imbert, D. Cambridge, Mass.: Harvard University Press, 163–194
- Mougeot, L. (2000) Urban Agriculture: Definition, Presence, Potentials and Risks, and Policy Challenges.
- Mougeot, L.J.A. (2005) Agropolis: The Social, Political and Environmental Dimensions of Urban Agriculture [online] available from http://www.idrc.ca/openebooks/186-8/
- Mount, P. (2017) 'Just Food Farm: Redefining Value Using Urban Agroecology on Public Land'. Urban Agriculture Magazine November, 21–23
- Mukerji, N. and Morales, A. (2010) 'Zoning for Urban Agriculture'. Zoning Practice 26 (3), 1252– 1261
- Nagib, G. and Nakamura, A.C. (2017) 'Practices of Urban Agroecology in the Municipality of São Paulo: Income Generation and Community Activism'. Urban Agriculture Magazine November, 65–67
- New Economics Foundation (2018) Co Operatives Unleashed: Doubling the Size of the UK's Co-Operative Sector [online] available from https://neweconomics.org/uploads/files/co-ops-unleashed.pdf>
- Nguyen, B. (n.d.) Agroecology: An Innovative Solution for Agricultural Sustainability.
- Nwulu, S. (2016) *My London* [online] available from <http://www.selinanwulu.com/portfolio-1> [13 September 2019]
- Nyeleni (2015) Declaration of the International Forum for Agroecology Nyéléni 2015 [online] available from https://www.foodsovereignty.org/forum-agroecology-nyeleni-2015-2/declaration-of-the-international-forum-for-agroecology-nyeleni-2015/ [3 December 2019]

- Nyéléni (2007) DECLARATION OF NYÉLÉNI Nyeleni Via Campesina Newsletter, Bulletin, Boletin [online] available from https://www.nyeleni.org/spip.php?article290 [19 October 2020]
- O' Connor, P. (2004) 'The Conditionality of Status: Experience Based Reflections on the Insider/Outsider Issue'. *Australian Geographer* 35 (2), 169–176
- Ober, J. (2008) "The Original Meaning of "Democracy": Capacity to Do Things, Not Majority Rule'. *Constellations* 15 (1), 3–9
- Office for National Statistics (2011) 2011 Census Office for National Statistics [online] available from https://www.ons.gov.uk/census/2011census [25 August 2018]
- de Oliveira Andreotti, V. (2011) '(Towards) Decoloniality and Diversality in Global Citizenship Education'. *Globalisation, Societies and Education* 9 (3–4), 381–397
- Oliver, C. (2014) 'Muddied Waters: Migrants' Entitlements to Public Services and Benefits'. in *Migration: The Compas Anthology*. ed. by Anderson, B. and Keith, M. Oxford: ESRC Centre on Migration, Policy and Society (COMPAS), 24–25
- Oliver, P. (2010) Understanding the Research Process. London, UK: SAGE Publications Ltd
- ORFC (2020) ORFC Programme 2020 The Oxford Real Farming Conference [online] available from https://orfc.org.uk/orfc-programme-2020/> [28 July 2020]
- Organiclea (2018) About OrganicLea A Workers' Cooperative Growing Food on London's Edge in the Lea Valley [online] available from https://www.organiclea.org.uk/about/ [24 August 2018]
- Organiclea (2017) New Plans at Wolves Lane OrganicLea A Workers' Cooperative Growing Food on London's Edge in the Lea Valley [online] available from <https://www.organiclea.org.uk/2017/03/wolves-lane/> [25 August 2018]
- Pahnke, A. (2015) 'Institutionalizing Economies of Opposition: Explaining and Evaluating the Success of the MST's Cooperatives and Agroecological Repeasantization'. *Journal of Peasant Studies* 42 (6), 1087–1107
- Palomo-Campesino, S., González, J.A., and García-Llorente, M. (2018) 'Exploring the Connections between Agroecological Practices and Ecosystem Services: A Systematic Literature Review'. *Sustainability (Switzerland)* 10 (12)

Parikiaki (2019) Haringey Tipped as One of Top Ten for House Price Growth [online] available from

<http://www.parikiaki.com/2019/04/haringey-tipped-as-one-of-top-ten-for-house-pricegrowth/> [28 September 2020]

- Parker, A. and Tritter, J. (2006) 'Focus Group Method and Methodology: Current Practice and Recent Debate'. International Journal of Research and Method in Education 29 (1), 23–37
- Patel, R. (2009) Food Sovereignty [online] vol. 36. available from http://www.tandfonline.com/loi/fjps20%5Cnhttp://dx.doi.org/10.1080/03066150903143 079%5Cnhttp://www.tandfonline.com/page/terms-and-conditions>
- Peck, J. and Tickell, A. (2002) 'The Urbanization of Neoliberalism: Theoretical Debates Neoliberalizing Space.' Antipode 34, 380–404.
- Peet, R. and Watts, M.J. (2004) Liberation Ecologies: Environment, Development, Social Movements. London, UK: Routledge
- Pencavel, J. (2012) 'Worker Cooperatives and Democratic Governance'. *Discussion Paper by Standford Institute for Economic Policy Research*
- Pencavel, J. (2001) Worker Participation : Lessons from the Worker Co-Ops of the Pacific Northwest. New York: Russell Sage Foundation
- People's Knowledge (n.d.) *About* | *People's Knowledge* [online] available from ">http://www.peoplesknowledge.org/about/> [24 April 2018]
- People's Knowledge Editorial Collective (2016a) 'Introduction'. in *People's Knowledge and Participatory* Action Research: Escaping the White-Walled Labyrinth. Coventry, UK: Practical Action Publishing and the Centre for Agroecology, Water and Resilience (CAWR), Coventry University
- People's Knowledge Editorial Collective (2016b) People's Knowledge and Participatory Action Research: Escaping the White-Walled Labyrinth. Rugby, UK: Practical Action Publishing
- Pfeiffer, A., Silva, E., and Colquhoun, J. (2014) 'Innovation in Urban Agricultural Practices: Responding to Diverse Production Environments'. *Renewable Agriculture and Food Systems* 30 (1), 79–91
- Pimbert, M. (2017) 'Towards a Transformative Urban Agroecology'. Urban Agriculture Magazine November, 15–17
- Pimbert, M.P. (2018) 'Democratizing Knowledge and Ways of Knowing for Food Sovereignty, Agroecology and Biocultural Diversity'. in *Food Sovereignty, Agroecology and Biocultural Diversity*.

- van der Ploeg, J.D., Barjolle, D., Bruil, J., Brunori, G., Costa Madureira, L.M., Dessein, J., Drag, Z., Fink-Kessler, A., Gasselin, P., Gonzalez de Molina, M., Gorlach, K., Jürgens, K., Kinsella, J., Kirwan, J., Knickel, K., Lucas, V., Marsden, T., Maye, D., Migliorini, P., Milone, P., Noe, E., Nowak, P., Parrott, N., Peeters, A., Rossi, A., Schermer, M., Ventura, F., Visser, M., and Wezel, A. (2019) 'The Economic Potential of Agroecology: Empirical Evidence from Europe'. *Journal of Rural Studies* 71 (December 2018), 46–61
- Pollan, M. (2006) Voting With Your Fork The New York Times [online] available from https://pollan.blogs.nytimes.com/2006/05/07/voting-with-your-fork/ [12 August 2017]
- Poppendieck, J. (1998) Sweet Charity?: Emergency Food and the End of Entitlement / Janet Poppendieck. New York : London: New York : Viking
- Poppleton, S., Hitchcock, K., Lymperopoulou, K., Simmons, J., and Gillespie, R. (2013) Social and Public Service Impacts of International Migration at the Local Level. London
- postcodearea (2011) Demographics and Statistics for EN1 Postcode and Enfield Region. [online] available from <https://www.postcodearea.co.uk/postaltowns/enfield/en1/demographics/> [18 February 2017]
- Pothukuchi, K. (2004) 'Community Food Assessment: A First Step in Planning for Community Food Security'. *Journal of Planning Education and Research* 23 (4), 356–377
- Power to Change (2020) The Community Hub Handbook.
- Prizendt, S. (2017) 'Urban Agroecology Movement (MUDA) Changes the Brazilian Metropolis'. Urban Agriculture Magazine November, 68–69
- Prost, S. (2019) 'Food Democracy for All? Developing a Food Hub in the Context of Socio-Economic Deprivation'. *Politics and Governance* 7 (4), 142–153
- Prové, C., de Krom, M.P.M.M., and Dessein, J. (2019) 'Politics of Scale in Urban Agriculture Governance: A Transatlantic Comparison of Food Policy Councils'. *Journal of Rural Studies* [online] 68 (December 2018), 171–181. available from https://doi.org/10.1016/j.jrurstud.2019.01.018>
- Psarikidou, K., Kaloudis, H., Fielden, A., Reynolds, C., and Psarikidou, K. (2019) 'Local Food Hubs in Deprived Areas : De-Stigmatising Food Poverty?' *Local Environment The International*

Journal of Justice and Sustainability 24 (6), 525–538

- Puar, J. (2007) Terrorist Assemblages: Homonationalism in Queer Times. Duke University Press
- Public Health Law Center (2012) Access to Healthy Food: Challenges and Opportunities. St Paul, Minnesota
- Pudup, M.B. (2008) 'It Takes a Garden: Cultivating Citizen-Subjects in Organized Garden Projects'. Geoforum 39 (3), 1228–1240
- Pueblito Piasa (2019) Latin Village: Pueblito Paisa Home [online] available from https://www.facebook.com/SaveLatinVillage/ [7 May 2019]
- Pulido, L. (2008) 'FAQs: Frequently Asked Questions on Being a Scholar/Activist'. in *Engaging Contradictions: Theory, Politics and Methods of Activist Scholarship*. ed. by Hale, C. Berkeley, Calif.: Berkeley, University of Calafornia Press, 341–366
- Purcell, M. (2013) 'The Right to the City: The Struggle for Democracy in the Urban Public Realm'. Policy and politics 42 (3), 311–327
- Rahman, A. (2004) 'Globalization: The Emerging Ideology in the Popular Protests and Grassroots Action Research'. Action Research [online] 2 (1), 9–23. available from https://doi.org/10.1177/1476750304040495>
- Rahman, M.A. (2008) 'Some Trends in the Praxis of Participatory Action Research'. in *The Sage Handbook of Action Research: Participative Inquiry and Practice*. ed. by Reason, P. and Bradbury, H. SAGE Publications Ltd, 49–62
- Ranis, P. (2005) 'Argentina's Worker-Occupied Factories and Enterprises'. Socialism and Democracy 19 (3), 93–115
- Reason, P. (2005) 'Living as Part of the Whole: The Implications of Participation'. Journal of Curriculum and Pedagogy 2
- Reason, P. and Bradbury, H. (2008) 'Introduction'. in *The Sage Handbook of Action Research: Participative Inquiry and Practice*. Second. ed. by Reason, P. and Bradbury, H. London, UK: Sage, 1–10
- Reason, P. and Bradbury, H. (2001) Handbook of Action Research : Participative Inquiry and Practice. First. ed. by Reason, P. and Bradbury, H. London: SAGE Publications Ltd

- Redwood, M. (2008) Agriculture in Urban Planning: Generating Livelihoods and Food Security. London: Earthscan Publications
- Renting, H. (2017) 'Exploring Urban Agroecology as a Framework for Transitions to Sustainable and Equitable Regional Food Systems'. Urban Agriculture Magazine November, 11–12
- Renting, H., Schermer, M., and Rossi, A. (2012) 'Building Food Democracy : Exploring Civic Food Networks and Newly Emerging Forms of Food Citizenship'. *International Journal of Sociology of Agriculture and Food* 19 (3), 289–307
- Renzel, P. (2017) New Commons & Public Land Shared Assets [online] available from http://www.sharedassets.org.uk/policy/new-commons-public-land/ [5 September 2019]
- Reynolds (2017) Could Preston Provide a New Economic Model for Britain's Cities? | CityMetric [online] available from https://www.citymetric.com/politics/could-preston-provide-new-economicmodel-britain-s-cities-3243 [27 July 2019]
- Reynolds, K. (2015) 'Disparity despite Diversity: Social Injustice in New York City's Urban Agriculture System'. *Antipode* 47 (1)
- Reynolds, K. and Cohen, N. (2016) Beyond the Kale: Urban Agriculture and Social Justice Activism in the New York City. University of Georgia Press
- Rooney, P. (2005) 'Researching from the inside-Does It Compromise Validity?' Level 3 (3), 1-19
- Rose, G. (1997) 'Situating Knowledges: Positionality, Reflexivities and Other Tactics'. Progress in human geography 21 (3), 305–320
- Rosol, M. (2012) 'Community Volunteering as Neoliberal Strategy? Green Space Production in Berlin'. Antipode 44 (1), 239–257
- Rotherham, J. (2018) Learnings from Agroecology in Cuba Landworkers Alliance [online] available from https://landworkersalliance.org.uk/learnings-agroecology-cuba/ [22 May 2020]
- Ruiz-Rosado, O. (2006) 'Agroecología: Una Disciplina Que Tienda a La Transdisciplina, Interciencia'. Interciencia 31, 140–145
- Runnymede (2017) Minority Report: Race and Class in Post-Brexit Britain. London, UK
- RUSS (2020) Home | Rural Urban Synthesis Society [online] available from https://www.theruss.org/ [4 June 2020]

Rutt, R. and Loveless, S. (2018) 'Whose Park? The Forty-Year Fight for Folkets Park under Copenhagen's Evolving Urban Managerialism'. *People, Place and Policy* 12 (2), 99–117

Ryan, G. and Bernard, R. (2003) 'Techniques to Identify Themes'. Field Methods 15, 84-109

- Saldivar-Tanaka, L. and Krasny, M.E. (2004) 'Culturing Community Development, Neighborhood Open Space, and Civic Agriculture: The Case of Latino Community Gardens in New York City'. Agriculture and Human Values 21 (4), 399–412
- Santo, R., Palmer, A., and Kim, B. (2016) Vacant Lots to Vibrant Plots. Baltimore, MD
- Santos, B. de S. (2016) Epistemologies of the South : Justice against Epistemicide. New York: Routledge
- Santos, B. de S. (2007a) Cognitive Justice in a Global World: Prudent Knowledges for a Decent Life. Lexington Books
- Santos, B. de S. (2007b) 'Beyond Abyssal Thinking. From Global Lines to Ecology of Knowledges'. Revista Critica de Ciencias Sociais [online] 80. available from http://www.eurozine.com/articles/2007-06-29- santos-en.html>
- Santos, B.S. (2010) Descolonizar El Saber, Reinventar El Pode. Montevideo: Ediciones Trilce
- Sbicca, J. (2015) 'Solidarity and Sweat Equity: For Reciprocal Food Justice Research'. Journal of Agriculture, Food Systems, and Community Development 5 (4), 1–5
- Sbicca, J. (2012) 'Growing Food Justice by Planting an Anti-Oppression Foundation: Opportunities and Obstacles for a Budding Social Movement'. *Agriculture and Human Values* 29 (4), 455–466
- Schmelzkopf, K. (2002) 'Incommensurability, Land Use, and the Right Space: Community Gardens in New York City'. Urban Geography 23, 323–343
- Schmutz, U. (2017) 'Urban Agriculture or Urban Agroecology?' Urban Agriculture Magazine November, 7
- Schneider, M. and McMichael, P. (2010) 'Deepening, and Repairing, the Metabolic Rift'. Journal of Peasant Studies 37 (3), 461–484
- Schön, D.A. (1983) The Reflective Practitioner: How Professionals Think in Action. New York: Basic Books
- Sen, A. (2009) The Idea of Justice. Cambridge, Mass.: The Belknap Press of Harvard University Press

Sevilla Guzmán, E. and Woodgate, G. (2013) 'Agroecology: Foundations in Agrarian Social

Thought and Sociological Theory'. Agroecology and Sustainable Food Systems 37 (1), 32-44

- Shared Assets (2020) Shared Assets [online] available from <https://twitter.com/shared_assets?lang=en> [1 June 2020]
- Shared Assets (n.d.) *Shared Assets* [online] available from <https://sharedassets.org.uk/> [28 September 2020]
- Shattuck, A., Schiavoni, C.M., and Vangelder, Z. (2015) 'Translating the Politics of Food Sovereignty: Digging into Contradictions, Uncovering New Dimensions'. *Globalizations* 12 (4), 421–433
- Shepard, B. (2009) 'Community Gardens, Convivial Spaces, and the Seeds of a Radical Democratic Counterpublic'. in *Democracy, States, and the Struggle for Global Justice*. London: Routledge, 273– 295
- Shiva, V. (2016) Sowing the Seeds of Resistance [online] available from <https://www.greeneuropeanjournal.eu/sowing-the-seeds-of-resistance/> [2 October 2019]
- Siegner, A.B., Acey, C., and Sowerwine, J. (2019) 'Producing Urban Agroecology in the East Bay: From Soil Health to Community Empowerment'. *Agroecology and Sustainable Food Systems* [online] 44 (5), 566–593. available from https://doi.org/10.1080/21683565.2019.1690615>
- Silici, L. (2014) Agroecology-What It Is and What It Has to Offer. London
- Singh, J. (2016) 'Cultivating an Anti-Racist Position in Post-Race Society'. in People's Knowledge and Participatory Action Research: Escaping the White-Walled Labyrinth. Rugby, UK: Practical Action Publishing
- Singh, J. and Wakeford, T. (2008) 'Towards Empowered Participation: Stories and Reflections'. Participatory Learning and Action [online] 58, 6–9. available from http://www.ingentaconnect.com/content/iiedpla/2008/00000058/00000001/art00002 >
- Sitrin, M. (2006) Horizontalism: Voices of Popular Power in Argentina. Oakland: AK Press
- Siva, S. (2020) Building an Anti-Racist Food Movement: Reflections from Land in Our Names [online] available from <https://orfc.org.uk/building-an-anti-racist-food-movement-reflections-fromland-in-our-names/> [4 August 2020]

Slocum, R. (2006) 'Anti-Racist Practice and the Work of Community Food Organizations'. Antipode

38 (2), 327-349

Slocum, R. and Cadieux, K.V. (2015) 'Notes on the Practice of Food Justice in the U.S.: Understanding and Confronting Trauma and Inequity'. *Journal of Political Ecology* 22 (January 2015), 27–52

Soja, E. (2010) Seeking Spatial Justice. Minneapolis: University of Minnesota Press

- Soler, M., Rivera, M., and García Roces, I. (2019) Feminist Agroecology for Food Sovereignty Cultivate! [online] available from http://www.cultivatecollective.org/in-perspective/feminist-agroecology-for-food-sovereignty/> [8 July 2020]
- Specht, K., Weith, T., Swoboda, K., and Siebert, R. (2016) 'Socially Acceptable Urban Agriculture Businesses'. Agronomy for Sustainable Development 36 (1)
- Sprague, J. (2005) Feminist Methodologies for Critical Researchers: Bridging Differences. Walnut Creek, Calafornia: Altamira Press
- Springtide Resources (2008) An Integrated Anti-Oppression Framework for Reviewing And ... [online] Toronto. available from https://www.yumpu.com/en/document/read/41217628/an-integrated-anti-oppression-framework-for-reviewing-and- [24 September 2020]
- St Clair, R. (2017) Investigating the Impact and Potential of Urban Agriculture. University of Salford
- Staeheli, L. (2008) 'Citizenship and the Problem of Community'. Political Geography 27, 5-21
- Statista (2020) Urban and Rural Population of the UK 2018 | Statista [online] available from https://www.statista.com/statistics/984702/urban-and-rural-population-of-the-uk/ [29 July 2020]
- Steel, C. (2013) Hungry City: How Food Shapes Our Lives. Reprint. Vintage
- Stewart, B. (2019) Lessons in Resilience from Social Justice Focused Farms in the USA. London
- Stout, J. (2010) Blessed Are the Organized : Grassroots Democracy in America. Princeton, N.J.: Princeton, N.J.
- Sustain (2016) London Grows Launched to Promote Volunteering in London's Edible Gardens | Sustain [online] available from https://www.sustainweb.org/news/feb16_london_grows/ [7 February 2021]

Sustain (2012) Roots to Work: Developing Employability through Community Food-Growing and Urban

Agriculture [online] London. available from

<https://www.sustainweb.org/publications/roots_to_work/>

- Sustainable Economies Law Centre (2017) New Hope Farms Case Study [online] available from https://www.theselc.org/new_hope_farms_case_study [1 June 2020]
- Sutton-Brown, C.A. (2014) 'Photovoice: A Methodological Guide'. Photography and Culture [online] 7 (2), 169–185. available from <http://www.tandfonline.com/doi/full/10.2752/175145214X13999922103165>
- Sutton Community (2012) Making Food Fair and Cultivating Community : A Year at Sutton Community Farm Annual Report 2012 - 13 S. London, UK

Sutton Community Farm (2019) SCF Impact Report 2019/20. London, UK

- Sutton Community Farm (2015) Share Offer Launched Supported by Local Mayor and MP Sutton Community Farm [online] available from http://suttoncommunityfarm.org.uk/farm-news/share-offer-launched-supported-by-local-mayor-and-mp/> [6 October 2020]
- Swagemakers, P., Domínguez García, M.D., Milone, P., Ventura, F., and Wiskerke, J.S.C. (2019) 'Exploring Cooperative Place-Based Approaches to Restorative Agriculture'. *Journal of Rural Studies* [online] 68 (December 2018), 191–199. available from https://doi.org/10.1016/j.jrurstud.2018.12.003>
- Swantz, M.L. (2008) 'Participatory Action Research as Practice'. in *The Sage Handbook of Action* Research: Participative Inquiry and Practice. Second. ed. by Reason, P. and Bradbury, H. London, UK: Sage, 31–62
- Swyngedouw, E. and Heynen, N. (2003) 'Urban Political Ecology, Justice and the Politics of Scale'. Antipode 35 (5), 898–918
- Tan, L.H.H. and Neo, H. (2009) "Community in Bloom": Local Participation of Community Gardens in Urban Singapore'. Local Environment: The International Journal of Justice and Sustainability 14 (6), 529–539
- Tandon, S.D., Kelly, J.G., and Mock, L. (2001) 'Participatory Action Research as a Resource for Developing African American Community Leadership'. in *From Subjects to Subjectivities: A Handbook of Interpretive and Participatory Methods*. New York: New York University Press, 200– 217

- Tax, S. (1975) 'Action Anthropology'. *Current Anthropology* [online] 16 (4), 514–517. available from http://www.jstor.org/stable/2741627>
- Taylor, J.R. and Lovell, S.T. (2014) 'Urban Home Food Gardens in the Global North: Research Traditions and Future Directions'. *Agriculture and Human Values* 31 (2), 285–305
- Teig, E., Amulya, J., Bardwell, L., Buchenau, M., Marshall, J.A., and Litt, J.S. (2009) 'Collective Efficacy in Denver, Colorado: Strengthening Neighborhoods and Health Through Community Gardens'. *Health & Place* 15 (4), 1115–1122
- The Landworkers Alliance (2014) Feeding the Future.
- Thebo, A.L., Drechsel, P., and Lambin, E.F. (2014) 'Global Assessment of Urban and Peri-Urban Agriculture: Irrigated and Rainfed Croplands'. *Environmental Research Letters* 9 (11)
- Tornaghi, C. (2017) 'Urban Agriculture in the Food-Disabling City: (Re)Defining Urban Food Justice, Reimagining a Politics of Empowerment'. *Antipode* (August), 1–20

Tornaghi, C. (2014) 'Critical Geography of Urban Agriculture'. Progress in Human Geography 38 (4)

- Tornaghi, C. and Dehaene, M. (2019) 'The Prefigurative Power of Urban Political Agroecology: Rethinking the Urbanisms of Agroecological Transitions for Food System Transformation'. *Agroecology and Sustainable Food Systems* [online] 00 (00), 1–17. available from <https://doi.org/10.1080/21683565.2019.1680593>
- Tornaghi, C. and Van Dyck, B. (2015) 'Research-Informed Gardening Activism: Steering the Public Food and Land Agenda'. *Local Environment* [online] 20 (10), 1247–1264. available from <http://www.tandfonline.com.proxy.library.uu.nl/doi/abs/10.1080/13549839.2014.949643# .VRgIG0L46qA>
- Tower Hamlets Food Growers Network (n.d.) *HOME* | *Thfgn* [online] available from https://www.towerhamletsfoodgrowingnetwork.co.uk/ [19 February 2020]
- Travaline, K. and Hunold, C. (2010) 'Urban Agriculture and Ecological Citizenship in Philadelphia'. Local Environment: The International Journal of Justice and Sustainability 15, 581–590
- Travers, T., Sims, S., and Bosetti, N. (2016) Housing and Inequality in London. London, UK
- Travis, A. (2013) Immigration Bill: Theresa May Defends Plans to Create 'Hostile Environment' [online] available from <https://www.theguardian.com/politics/2013/oct/10/immigration-billtheresa-may-hostile-environment> [26 October 2020]

Trup, N., Carrington, D., and Wyler, S. (2019) Community Hubs: Understanding Survival and Success.

- Trust for London (2017) *Trust for London* [online] available from <www.trustforlondon.org.uk/data/boroughs/enfield/> [19 October 2017]
- Tsing, A.L. (2005) Friction : An Ethnography of Global Connection / Anna Lowenhaupt Tsing. Princeton, N.J. : Princeton, N.J.
- Turner, J., McClintock, N., Cuneo, M., Novie, A., and Eck, S. (2017) 'Who Is at the Table?: Fostering Anti-Oppression Practice through a Food Justice Dialogue Series'. in *Let Knowledge Serve the City.* ed. by Wortham-Galvin, B.D., Allen, J., and Sherman, J. Sheffied, UK: Greenleaf Publishing Limited, 104–119
- Ubele Initiative (2018) *About* UBELE [online] available from <https://www.ubele.org/about-1/> [27 August 2018]
- UK Food Sovereignty Movement (2015) National Gathering 2015 | Food Sovereignty Now! [online] available from http://foodsovereignty.org.uk/ukfoodsov/national-gathering-2015/> [17 August 2017]
- UK Parliament (1969) AGRICULTURAL WORKERS (PAY) [online] available from https://api.parliament.uk/historic-hansard/commons/1969/jan/31/agricultural-workerspay> [19 February 2019]
- UN DESA (2018) 68% of the World Population Projected to Live in Urban Areas by 2050 [online] available from https://www.un.org/development/desa/en/news/population/2018-revision-ofworld-urbanization-prospects.html [27 October 2020]
- University of Reading (n.d.) Farm Subsidies [online] available from <http://www.reading.ac.uk/~waa5/ecifm/agsup.htm> [12 August 2020]
- Urban Agriculture Committee of the CFSC (2003) Urban Agriculture and Community Food Security in the United States: Farming from the City Center to the Urban Fringe.
- Vaarst, M., Escudero, A.G., Chappell, M.J., Brinkley, C., Nijbroek, R., Arraes, N.A.M., Andreasen, L., Gattinger, A., De Almeida, G.F., Bossio, D., and Halberg, N. (2018) 'Exploring the Concept of Agroecological Food Systems in a City-Region Context'. *Agroecology and Sustainable Food Systems* 42 (6), 686–711

Valiente-Neighbours, J.. (2012) 'Mobility, Embodiment, and Scales: Filipino Immigrant

Perspectives on Local Food'. Agric Hum Values 29, 531-541

- Della Valle, M. and Corsani, G. (2010) 'Allotment Garden: Opportunity for Pedagogic Experiences in Urban Landscapes'. in *Acta Horticulturae*. held 2010
- Vercauteren, D. (2011) Micropolitiques Des Groupes. Pour Une Écologie Des Pratiques Collectives. Paris: Les prairies ordinaires
- Vergara-Camus, L. (2014) Land and Freedom: The MST, the Zapatistas and Peasant Alternatives to Neoliberalism / Leandro. Vergara-Camus. London: London: Zed Books, 2014.
- Vertovec, S. (2007) 'Super-Diversity and Its Implications'. *Ethnic and Racial Studies* 30 (6), 1024–1054
- Viljoen, A., Bohn, K., and Howe, J. (2005) Continuous Productive Urban Landscapes. Routledge

Visvanathan, S. (2006) Alternative Science Career. 23, 164-169

- Wakeford, T. (2017) 'Participatory Workers: From Tyrants to Critical Thinkers'. in Everyday Experts: How People's Knowledge Can Transform the Food System. ed. by The People's Knowledge Editorial Collective. Rugby, UK: Centre for Agroecology Water and Resilience (CAWR)
- Wakeford, T., Singh, J., Murtuja, B., Bryant, P., and Pimbert, M. (2008) 'The Jury Is Out: How Far Can Participatory Projects Go Towards Reclaiming Democracy?' in *The Sage Handbook of Action Research: Participative Inquiry and Practice.* Second. ed. by Reason, P. and Bradbury, H. Sage, 333–349
- Walsh, C.E. (2015) 'Decolonial Pedagogies Walking and Asking. Notes to Paulo Freire from AbyaYala'. International Journal of Lifelong Education [online] 34 (1), 9–21. available from http://dx.doi.org/10.1080/02601370.2014.991522>
- Wang, C. and Burris, M.A. (1997) 'Photovoice: Concept, Methodology, and Use for Participatory Needs Assessment'. *Health Education & Behavior* 24 (3), 369–387
- Warner, K. (2007) Agroecology in Action: Extending Alternative Agriculture through Social Networks. Cambridge, Mass.: MIT Press
- Webber, A. (2019) Worker Exploitation Commonplace in Supermarket Supply Chains [online] available from [12 August 2020]

- Weiler, K. (1994) 'Freire and a Feminist Pedagogy of Difference'. in *Politics of Liberation: Paths from Freire*. Firest. ed. by Lankshear, C. and Mclaren, P. Routledge
- Wekerle, G.R. (2004) 'Food Justice Movements: Policy, Planning and Networks'. Journal of Planning Education and Research 23, 378–386
- West, C., Stewart, L., Foster, K., and Usher, K. (2013) 'Accidental Insider: Living the PhD Study'. Collegian 20 (1), 61–65
- Wezel, A., Bellon, S., Doré, T., Francis, C., Vallod, D., and David, C. (2009) 'Agroecology as a Science, a Movement and a Practice'. *Agronomy for Sustainable Development*
- Wezel, A., Brives, H., Casagrande, M., Clément, C., Dufour, A., and Vandenbroucke, P. (2016) 'Agroecology Territories: Places for Sustainable Agricultural and Food Systems and Biodiversity Conservation'. *Agroecology and Sustainable Food Systems* [online] 40 (2), 132–144. available from http://dx.doi.org/10.1080/21683565.2015.1115799>
- Wezel, A. and Soldat, V. (2009) 'A Quantitative and Qualitative Historical Analysis of the Scientific Discipline of Agroecology'. *International Journal of Agricultural Sustainability* 7, 3–18
- White, M. (2010) 'Shouldering Responsibility for the Delivery of Human Rights'. *Multidiciplinary Global Contexts* 3 (2), 189–211
- Wicks, P.G., Reason, P., and Bradbury, H. (n.d.) LIVING INQUIRY: PERSONAL, POLITICAL AND PHILOSOPHICAL GROUNDINGS FOR ACTION RESEARCH PRACTICE [online] Discussion Papers in Management 06/05. Exeter. available from https://business-school.exeter.ac.uk/documents/papers/management/2006/0605.pdf>
- Wikipedia (n.d.) British Co-Operative Movement [online] available from https://en.wikipedia.org/wiki/British_co-operative_movement#Worker> [29 August 2017]
- Windfuhr, M. and Jonsén, J. (2005) Food Sovereignty: Towards Democracy in Localized Food Systems. ed. by FIAN. ITDG
- Winson, A. (1993) The Intimate Commodity: Food and the Development of the Agro-Industrial Complex in Canada. Toronto: Garamond Press
- Winter, M. (2003) 'Embeddedness, the Newfood Economy and Defensive Localism'. Journal of Rural Studies 19 (1), 23–32

- Wittman, H., Desmarais, A., and Wiebe, N. (2010) Food Sovereignty: Reconnecting Food, Nature and Community. Winnipeg: Fernwood Press
- Wolch, J.R., Byrne, J., and Newell, J.P. (2014) 'Urban Green Space, Public Health, and Environmental Justice: The Challenge of Making Cities "Just Green Enough". Landscape and Urban Planning 125, 234–244
- Wolves Lane Flower Company (n.d.) *Wolves Lane Flower Company* [online] available from https://www.wolveslaneflowercompany.com/ [28 September 2020]
- Women's Budget Group (2016) New Research Shows Poverty, Ethnicity & Gender Magnify the Impact of Austerity on BME Women - Womens Budget Group [online] available from <https://wbg.org.uk/media/new-research-shows-poverty-ethnicity-gender-magnify-impactausterity-bme-women/> [20 February 2020]
- Wong, H. and Yee, J.Y. (2010) An Anti-Oppression Framework for Child Welfare in Ontario [online] Ontario, USA. available from http://www.oacas.org/wp-content/uploads/2017/01/Framework.pdf>
- Woods, D. (2019) 'Invisible Women : Hunger, Poverty, Racism and Gender in the UK'. Right to Food and Nutrition Watch (11), 26–32
- Wright, E.O. (2010) Envisioning Real Utopias. London: Verso
- Yancy, G. and hooks, bell (2015) Bell Hooks: Buddhism, the Beats and Loving Blackness The New York Times [online] available from https://opinionator.blogs.nytimes.com/2015/12/10/bell-hooks-buddhism-the-beats-and-loving-blackness/#more-158658 [15 August 2018]
- Yap, C. (2018) The Politics of Self-Organisation and the Social Production of Space in Urban Community Gardens. University of Coventry
- Yeo, C. (2018) Briefing: What Is the Hostile Environment, Where Does It Come from, Who Does It Affect? [online] available from https://www.freemovement.org.uk/briefing-what-is-the-hostileenvironment-where-does-it-come-from-who-does-it-affect/ [26 October 2020]
- Young, I.M. (2011) Justice and the Politics of Difference. Reissue 20. Princeton, N.J.: Princeton, N.J.: Princeton University Press, [1990]
- Yuval-Davis, N., Wemyss, G., and Cassidy, K. (2017) 'Everyday Bordering, Belonging and the Reorientation of British Immigration Legislation'. *Sociology* 52 (2), 228–244

Ziaei, R. (2018) Reflections on Gentrification, Food Justice and London – Community Food Growers Network [online] available from <https://www.cfgn.org.uk/2018/09/reflections-on-gentrificationfood-justice-and-london/> [13 October 2019]

Appendix

Appendix A: Interviews

Name	Detail	Date(s)
J	LGWC co-op member	April 2019
Anonymous Market Gardener	LGWC co-op member	May 2019
Dunya	LGWC co-op member	April 2019 May 2019

Appendix B: *Food for Thought*; towards food principles at Wolves Lane, April 2019

- 1. We aim to create a healthy, growing, food community with integrity
- 2. We believe food brings together diverse communities, cultures and generations through exchange of old and new knowledge, skills and ways of growing and preparing food
- 3. To make eating joyful we encourage sharing and making positive connections within the community
 - 4. We aim to promote emotional well-being, leading to personal growing within all our community to inspire a safe space for all
 - 5. Allowing love, healing and spirituality to grow organically
 - 6. To identify yourself with others through our memories gives us joy and a sense of achievement
 - 7. We value and respect the cycle of life as an interconnected, regenerative relationship leading to positive health and wellbeing for all life forms

8. We value food and avoid waste

 Sourcing and growing healthy, nutritious and affordable food that embraces the food ways of diverse diaspora communities

10. We aim to source foods from localised systems as much as possible

11. Creating food habits that do not have an adverse impact on food growers around the world

12. All this can be achieved by people working together and making decisions in a democratic way

Appendix C: Background Information on LGWC Profit and Loss 2015-2020 (Table 4)

In reading Table 4 it should be noted that:

- Organiclea was a conduit for LGWC's funding from 2015 into 2016 and there was a handover in the financial year 2016–17. LGWC did its own accounting from the point of company registration in June 2016.
- The table does not reflect the unpaid labour that workers put in working in the garden and in their role of co-op members developing the organisation i.e. organisational meetings, funding bids, partnership development, financial and admin work. Some of these roles began to be paid intermittently in 2018–19 when there was money available.
- 'Additional grant expenses' refers to expenditure related to specific social programmes (i.e. volunteer expenses), with wages for delivering these programmes included in 'Growers' Wages' for running gardening volunteer sessions, and 'Organisational Wages' for programme co-ordination. In aiming to obtain 'full cost recovery' for the running of social programmes, grants would include contribution towards insurance, administration, and gardening materials if appropriate.
- In 2017–18 a lot of the time spent on the 'Growers' Wages' involved setting up the growing rotations and putting new beds into Wolves Lane Horticultural Centre and Pasteur Gardens, rather than growing produce.
- The figure of £8,708 for 'Additional grant programme' expenses in 2018–19 includes £6,055 for the repayment of a grant and being a conduit for a local community kitchen's funding.

Appendix D: Background considerations on an estimated budget for setting up LGWC (Table 10)

The background of the infrastructure costs is that the seven-acre site was largely covered in 10- to 15-foot-high brambles and had no toilets, electricity or running water. The multi-functional covered space is budgeted for in Year 2, reflecting LGWC's plans to co-design and build with residents and schools. The budget includes four part-time roles to cover the activities of the co-operative, set at \pounds 30k per annum (£18k pro rata) including pensions and sick pay. This figure is based on the being close to the £12.50 per hour that the co-op set in 2017 as a liveable wage (see section 6.1.1), and reflects recent jobs advertised with the Landworkers' Alliance, the UK's largest agroecological union (Landworkers' Alliance 2020b). As regards to running costs, this includes running expenses for a public gardening session one day a week, with volunteers working with the paid growers;

while the rent is based on what we paid at WLHC. The running costs do not include other education programmes, taking the position that this would be dependent on what partnerships were made.

Appendix E: Additional Coventry University 'Certificate of Ethical Approval'



Certificate of Ethical Approval

Applicant:

Robert Logan

Project Title:

How can urban agriculture contribute to food justice? - a case study in London, UK

This is to certify that the above named applicant has completed the Coventry University Ethical Approval process and their project has been confirmed and approved as Medium Risk

Date of approval:

03 August 2017

Project Reference Number:

P47502