

Socio-technical transitions: a case study of co-housing in London

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2016

This dissertation is submitted as part of a MSc degree in Sustainable
Cities at King's College London

KING'S COLLEGE LONDON

UNIVERSITY OF LONDON

DEPARTMENT OF GEOGRAPHY

MA/MSc DISSERTATION

I, Baiba Fogle hereby declare (a) that this Dissertation is my own original work and that all source material used is acknowledged therein; (b) that it has been specially prepared for a degree of the University of London; and (c) that it does not contain any material that has been or will be submitted to the Examiners of this or any other university, or any material that has been or will be submitted for any other examination

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Date: 29/08/2016

Acknowledgments

First and foremost, I would like to thank to all interviewees for sharing their time and knowledge. Your collaborative effort in building and strengthening the co-housing idea was inspirational. Special thanks must go to my supervisor Federico Caprotti for valuable guidance and feedback throughout the process. Lastly, a sincere thanks to Terry for being a source of endless support this last year.

Abstract

Despite the growing government and public interest of community-led housing in the UK, in London co-housing is still very marginal. This dissertation traces the emergence of co-housing in London through the lens of socio-technical transition theory and its multi-level perspective. It examines how and in what ways co-housing as an alternative community-led housing initiative is protected by the UK Cohousing Network. Further, it underlines the challenges that hinder the process of building co-housing by exploring both internal (group) and external barriers. It concludes that complex structural issues of housing delivery and demand in the UK are deeply rooted in and reproduced by socio-technical structures. Despite the growing issues of affordability - there is no clear evidence that alternative housing initiatives are encouraged within London. There is a high level of commitment, knowledge, time and financial resources required from individual group members when building co-housing. It can be suggested that further upscaling of the idea could lead to the professionalisation of co-housing in order to overcome or mitigate related issues.

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Abbreviations

UKCN – The UK Cohousing Network
DCLG – Department for Communities and Local Government
STT – Socio-technical transition
MLP – Multi-level perspective
OWCH – Older women cohousing
LILAC – Low Impact Living Affordable Community
SNM – Strategic niche management
TIS – Technological innovation system
UTL – Urban Transition Labs
PPD – Price Paid Data
GLA – Greater London Authority
NLGN – New Local Government Network
ESRC – Economic and Social Research Council
HHbR – Henley Halebrown Rorrison Architects

1. Introduction

The re-emergence of co-housing has recently received wide academic attention and several research topics have emerged from this including collaborative living; social architecture (Jarvis, 2015); low-impact design/architecture and eco-homes (Pickerill, 2013) and living (Chatterton, 2015); aging and social care (Brenton, 2013). These topics cover a range of disciplines such as geography, sociology, planning and architecture, which thereby provides a spectrum of labelling, with each field emphasising particular characteristics and benefits of co-housing. However, in any case it is argued that the conventional form of housing no longer serves the needs of society.

In this dissertation I consider co-housing as an innovative type of community-led housing and refer to Williams's (2006, p.200) interpretation on what defines co-housing:

'Cohousing combines the autonomy of private dwellings with the advantages of community living. It has private units, semi-private space and indoor and outdoor communal space. It is built at low, medium and high densities and in a variety of layouts and locations; thus, communities are very diverse. The design and processes operating in cohousing encourage a 'collaborative' lifestyle and greater interdependence between residents.'

Despite the proliferated interest in co-housing the amount of existing projects in the UK are still very minor. The UK Cohousing Network confirms that there are now 19 built co-housing communities (UKCN, n.d.) within the UK, whilst in Germany there are over 600 established co-housing groups (in Germany they are called 'baugruppen') (Jarvis, 2016). A recent report, 'Cohousing Shared Futures', which was outcome of a two-year seminar series on collaborative living funded by the Economic and Social Research Council (ESRC), suggests that many co-housing groups struggle to make a start on building the project as the planning, financial and institutional infrastructures are not designed to support this idea (Jarvis et al, 2016). This suggests that co-housing, as an unfamiliar type of dwelling in the UK, is at a structural disadvantage, because it does not fit in the existing industry structures and dominant practices. Furthermore, despite the politically manifested new rights and

powers for communities conferred by the Localism Act (DCLG, 2011) the difficulties in changing the existing system persist.

In this dissertation I explore co-housing through the lens of the transition theory and its multi-level perspective, which has shifted the gaze towards understanding the persistence of the incumbent systems that are historically shaped by various technical and social mechanisms (Vleuten and Hogselius, 2012). Moreover, transition theory suggests that niche innovations can be a source for a path-breaking innovation that seeks to address the persistent social, environmental and/or economic issues at the regime level (Geels, 2004; Nill and Kemp, 2009; Smith and Raven, 2012). Niches can often be seeds of wider socio-technical transformation. Seyfang and Smith (2007) have argued that the co-housing model is fundamentally a social innovation, where the social institution of housing arrangements has undergone transformation, where new alternative living arrangements (housing typology, collaborative living and close community) can open up terrain for more sustainable technologies in order to harness sustainability transitions. In this context, I refer to co-housing as a social innovation that has a potential of seeding new alternative sustainability practices and technological trajectories.

However, in order to facilitate the diffusion of co-housing, a shift towards new structures, regulations and practices on how housing is delivered in the UK, is required. From the socio-technical transition perspective the niches require a protective space that supports and allows innovation to mature, develop networks and mobilise resources as they are too weak to operate within the mainstream environments (Geels, 2002). This protection, to some extent, can determine the success of the niche's diffusion. Therefore, echoing transition theory, I attempt to create knowledge that examines ways that co-housing is protected by exploring the role of the UK Cohousing Network in fostering the idea within the UK. I seek to understand the existing external and internal (group) barriers that hinder the development by considering two co-housing schemes in London.

The dissertation is organised into five parts, including a theoretical background on co-housing; socio-technical transition theory and its multi-level perspective, where in particular, I focus on niche level protection. This is followed by a discussion on the methodology, where I explain the research methods and approaches used in this study. Then follows an empirical examination of the existing pressures within the London housing

market by analysing official statistics. Further to this, I will present the qualitative findings on co-housing niche protection and the discussion on barriers that appear when building co-housing by reflecting on internal group barriers. The final part concludes the research findings and provides suggestions for further research.

2. Literature review

In this part, I seek to explore the theoretical background of co-housing by reflecting on its emergence as an alternative way of living. Additionally, I review some of the acknowledged barriers when building co-housing. Then, I turn to discuss the socio-technical transition theory (STT) and its multi-level perspective by particularly focusing on the niche level protection. And finally, echoing the concepts of STT, I develop research questions, which will frame the basis of the dissertation.

2.1 Co-housing

Community housing projects have a long history, from European and American utopian communities of the 19th century, Soviet social experiments during the 1920s and 30s to Swedish collective housing units in 1970s, which later formed into self-managed co-housing. Often the co-housing model is said to have originated in Denmark and Sweden, where both adopted different approaches regarding to their aspirations. One seeking a stronger sense of community, whilst the later pursued a better work-life balance for women (Vestbro, 2000). Both models dispersed particularly in countries like Denmark, Sweden, Netherlands and Germany and USA (Tummer, 2015; Vestbro, 2000). Development of co-housing was facilitated through international co-housing networks of the national co-housing associations located in countries like Holland, Denmark, Sweden, United States, Canada, New Zealand and in Australia (Sargisson, 2010) and in the UK¹.

Initially, the Swedish collective housing model emerged through the pressures of individual women's groups, which perceived this type of dwelling as a way of reducing the burden of housework through service delivery of collectively employed staff. This support created an opportunity for women to combine work and housework requirements. (Vestbro, 2000). To some degree, this classic, collective housing model can be perceived as support towards women's emancipation.

The first co-housing project was built in 1972 on the outskirts of Copenhagen. 27 families, who were seeking a greater sense of community than that offered by suburban housing typology, initiated the project. They created a new housing type (Figure 1), which

¹The UK Co-housing network was established in 2007

encourages interaction between neighbours through shared common spaces and some resources, whilst not sacrificing individual autonomy and contemporary lifestyles (Durrett and McCamant, 2011).

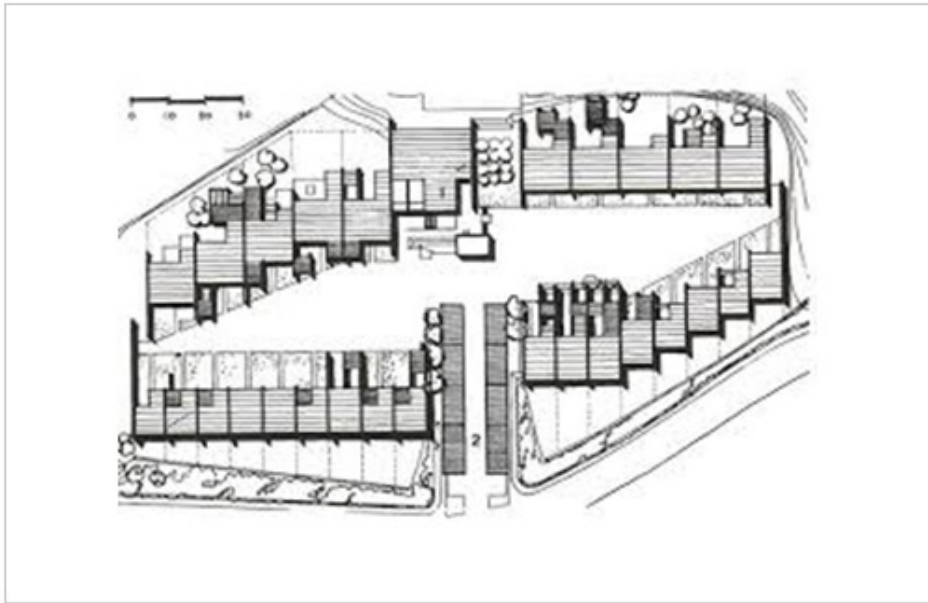


Figure 1: Saettedammen site plan, first co-housing in Denmark. 1: Common house; 2: Parking. Architect: Theo Bjerg. Completion: 1973. Image source: www.habiter-autrement.org

In Germany co-housing is on the political agenda and some municipalities have adopted the co-housing model in their housing and neighbourhood policies. However, co-housing is still perceived as a very niche form of dwelling. Droste (2015, p.89) argues that in Germany the co-housing projects have emerged in places where ‘housing market has failed to provide homes of adequate quality, quantity, adaptability and affordability, and where cities have incorporated co-housing into their development strategies.’ The co-housing residents are middle and lower-middle class individuals ‘with varying degrees of interest in social innovation and little hope that state or market provision might benefit them or society’ (Droste, 2015 p. 79-80). This argument suggests that co-housing can be perceived as an individual’s response to issues within the housing market by creating an alternative solution to a pressing problem.

Present-day emerging co-housing communities can have different ideological backgrounds (Tummer, 2000). For example, the co-housing project LILAC in Leeds, which stands for ‘Low Impact Living Affordable Community’, has a strong emphasis on reducing the impact on the wider environment (appendix A). Whist the Older Women Co-housing

scheme in London is conceived to only house woman over 50. Their aim is to overcome the isolation of single elderly people by having mutual support within the community (OWCH, n.d.). Therefore, to some degree, the pluralistic character of contemporary co-housing differs from the co-housing movement in the 1970s and 1980s.

2.1.1 Acknowledged barriers

Regardless of the growing interest in co-housing, there are still only a small number of completed co-housing projects within the UK. Arrigoitia and Scanlon (2015, p.119) argue that one of the main obstacles for co-housing groups in the UK is having access to land. High land values and availability, along with the existing approach on how land is developed and re-developed in the UK, can significantly hinder the project's progression. This also can eventually demotivate participants as it can become an unaffordable option.

Furthermore, Jarvis (2011) has anticipated existing oppressive deliberations from planners and decision-makers, which often uncover stigma of stereotypes against communal living in the 1970s. Jarvis (2011) argues for wider political engagement with the co-housing idea, as there is a certain resistance within the mainstream debate and by the government. She (Jarvis, 2011, p.575) believes that co-housing as an alternative dwelling is 'testing and demonstrating' innovative approaches to ecology, food production, carbon reduction, and low-impact architecture', therefore, she finds it paradoxical that there is a lack of commitment from the government to explore this alternative.

Whereas, Droste (2015, p.84) argues that co-housing schemes, including long-term leaseholds can be attractive to local government as 'they safeguard the long-term non-speculative use of public land'. However, she (Droste, 2015) indicates a risk in relation to increasing unfairness in terms of governmental support for co-housing groups. Droste (2015) suggests that local authorities should have a transparent selection process and criteria when delivering subsidies in order to elude an unfair system. However, this can lead to a development of rigid rules and criteria imposed by governmental objectives.

2.2 Understanding the sustainability transitions

Despite the growing popularity of notions such as 'sustainable', 'green' and 'zero carbon' futures, and even with the policy-maker's interest in promoting a 'green economy',

there are still uncertainties about how and in what ways the shift towards achieving a more sustainable society could take place (Gibbs and O'Neill, 2014). Additionally, sustainability in itself is a very dynamic, multi-dimensional and context driven concept (Dempsey et al, 2001; Dalal-Clayton and Sadler, 2014), consequently, there is a need for broader and more comprehensive framework, to foster the contexts which allow sustainability transitions to arise, and helps to further conceptualise the transformation process.

There is an increasing acknowledgment in academia that these uncertainties can be explained through transition theory and analysed by applying the multi-level perspective (MLP) to better understand the characteristics of complex societal transition processes (Bailey and Wilson, 2009). Throughout the following sections I will explore the properties of STT and its MLP in order to create a framework for this dissertation.

2.2.1 Socio-technical transition theory

The work of Frank W. Geels on the STT theory and the MLP on transitions has been hugely influential in conceptualising technical transitions, gaining further prominence through a more recent growing academic interest in urban sustainability transformations (Affolderbach and Schulz, 2005; Bulkeley, et al. 2013; Hodson and Marvin, 2013). Geels's (2002) ambition was to provide a more nuanced framework for exploring societal, technological, institutional and infrastructural change, which recognises the co-evolving process of radically new technologies, markets and user preferences. STT perceives transformations as a complex multi-actor process, which recognises the multidimensionality of socio-technical change (Geels, 2011). The STT framework pays particular attention to the dynamics between social, institutional and economic scales (Coenen et al., 2012; Geels, 2004; Lawhon and Murphy, 2011), which can form the process of transition.

A vital part of STT is its multi-level perspective. Increasingly, the MLP has been advocated as a key method, which allows one to analyse and better understand the long term socio-technical sustainability transitions (Coles and Genus, 2008; Coenen et al., 2012; Geels, 2004; 2005; 2011). Affolderbach and Schulz (2005, p. 6) argue that the MLP method provides a systematic framework to study the 'complex processes and actor relationships behind the rise and manifestation of sustainability transitions'. The particular value of the MLP is its ability to anticipate 'what constrains a society, region, industry, or community

from shifting toward more sustainable technical practices and social, economic, and political institutions’ (Lawhon and Murphy, 2012 p. 355).

2.2.2 Multi-level perspective on transitions

The MLP framework is based on three analytical levels: ‘niche-innovations (micro); socio-technical regimes (mezzo); and socio-technical landscape (macro)’, where ‘socio-technical transitions come about through multidimensional alignments of processes within and between these levels.’ (Figure 2) (Geels, 2013, p.15). Geels (2002, p.1259) stresses that these distinctive levels are not an ‘ontological description of reality, but analytical and heuristic concepts to understand the complex dynamics of socio-technical change’. Furthermore, Affolderbach and Schulz (2005, p.4) argue that the green innovation evolution at regime and landscape level should not be interpreted as ‘merely bottom-up transformation process from the niche to the regime level’.

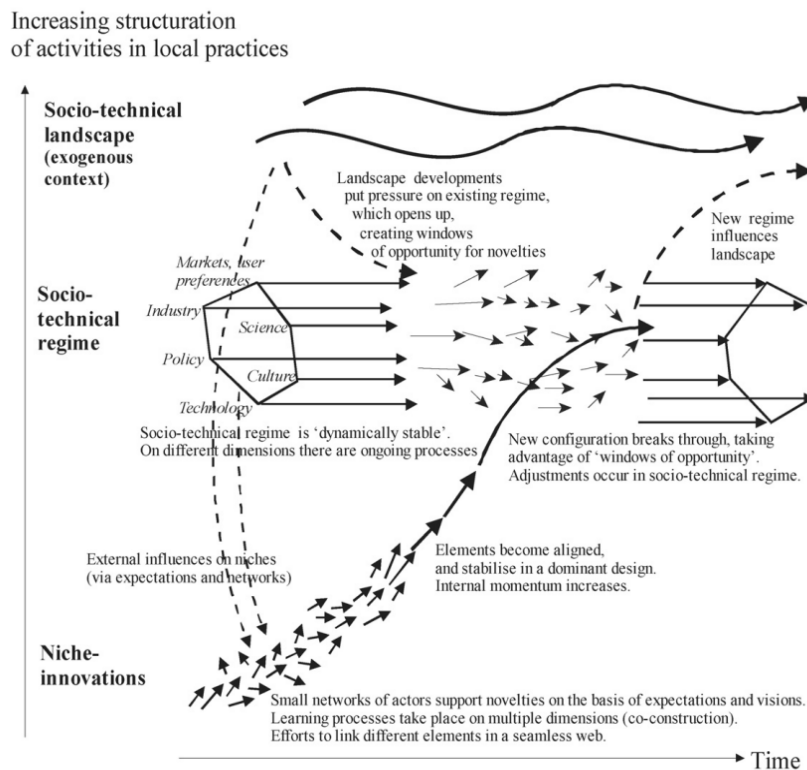


Figure 2: Multi-level perspective on transitions. Source: Geels, W.F. and Schot, J. (2007, p. 401).

The landscape level includes the broader structural trends, this involves: ‘oil prices, economic growth, wars, emigration, broad political coalition, cultural and normative values, environmental problems’ (Geels, 2002, p. 1260). In other words, socio-technical landscape refers to contexts and structures in which different actors operate. Whereas, the regime level refers to the ‘rules that enable or constrain activities of communities’ (Geels, 2002, 1260). Furthermore, the regime level is responsible for preserving stable existing technological development and established trajectories (Geels, 2002). Whilst, the niche level acts as an incubator, where niche innovations are developed, and are also protected from the general market rules. This micro level has a very important role for innovation development, because it provides a site for learning, experimentation and improvement of innovations until they mature into a level in which they can sufficiently operate within regular market conditions (Affolderbach and Schulz, 2005).

The relationship between these analytical levels can be understood as a ‘nested hierarchy of multi-level perspective’ (Geels, 2002, p.1260). Thus, novelties that emerge at the niche level can reflect the contexts of the landscape level and the struggles at the regime level. Therefore, niche innovation development is strongly influenced by all levels. For example, landscape level can put pressure on the regime level, which can create a ‘window of opportunities’ for niche innovations to evolve (Geels, 2005; Geels and Schot, 2007). Destabilisation of the regime level allows the breakthrough of niches, and if successful stabilise their position at the regime level and at some point influence the socio-technical landscape. Therefore, for a transition to take place it requires the right alignment between all three levels.

This section explored the MLP on transitions and briefly discussed each of its levels and their interconnectivity. In order to deepen understanding about the niche level the next section will particularly focus on its role as a protective space.

2.2.3 Niche level protection

Geels (2004) has emphasised the niche level’s role as a protective space for innovations to emerge and develop. The niche level can provide a space for learning and experimentation whilst niche innovations are temporally shielded from mainstream market rules and regulations (Geels, 2004). The initial protection is vital for successive further

development and/or diffusion of the niche innovation as the capacity to compete within the regime level is too weak (Smith and Raven, 2012).

Smith and Raven (2012) suggest that *shielding*, *nurturing* and *empowerment* are the functional properties of the protective space at the niche level. Shielding refers to processes, which allow the protection of niche innovations from the mainstream selection pressures (Smith and Raven, 2012). The shielding itself can be passive or active. Passive shielding is explained as the mobilisation of existing resources and comparative advantages, which are already in place. Whilst, active shielding relates to more strategic support mechanisms such as specific policies, investments and private sector initiatives, which advocate for the innovation development (Smith and Raven, 2012). Whereas, nurturing refers to processes that support the development of path breaking innovation (Smith and Raven, 2012, p. 1027). The nurturing process has most widely been explored through the strategic niche management (SNM) and technological innovation system (TIS) perspectives. Nill and Kemp (2009) argue that SNM is often deemed as a bottom-up strategy, which seeks to nurture the niche innovation by fostering the learning process and supporting the networking process through transition experiments. Whereas, TIS explores the system development by identifying actors, networks and institutions and by analysing the functions of created systems by those involved (Smith and Raven, 2012, p. 1029). TIS perspective has been criticised for being too ‘inward looking’ by not considering the wider social, environmental contexts of innovation. Therefore, the success of innovation diffusion from TIS perspective is considered as an outcome of a successive system (Smith and Raven, 2012, p. 1029).

Smith and Raven (2012) make a distinction between niche empowerment which aims to ‘fit and conform’ with empowerment that ‘stretch and transform’ depending on the level of interventions needed for successive niche development. For example, in case of fit and conform empowerment, the existing environments remain unchanged while the competitiveness of niche innovation within the conventional market has grown. This empowerment can have negative implications towards the initial sustainability goals as the pressure to fit and conform is high (Smith and Raven, 2012). Therefore, the success can be associated with internal capacity to progress the innovation and the ability to deploy the existing external advantages and overcome the problematic circumstances. Whereas, to stretch and transform empowerment requires institutional reforms, therefore the niche ability to influence the regime by offering alternative solutions can be closely related to other

external processes within the existing regime (Smith and Raven, 2012). Additionally, the important external aspect is to what extent sustainability advocates have an influence on wider society and the political economy. The niche here is the frontier of alternative practices, which in order to be institutionalised needs to be accepted by a ‘sufficiently powerful coalition capable of bringing the change about’ (Smith and Raven, 2012, p. 1031). This also indicates a necessity for ability and willingness to engage with existing governmental institutions.

2.2.4 Recognised limitations of transition studies

Despite the growing popularity of the STT theory there are existing limitations to this approach (Lawhon and Murphy, 2011). Critiques of STT have been given for various reasons, for example, geographers refer to its lack of spatial sensitivity (Coen et al., 2012; O’Neill and Gibbs, 2014); it also has an inadequately low consideration for the role of power relations involved in shaping transitions (Lawhon and Murphy, 2011; Affolderbach and Schulz, 2015); and, furthermore, it fails to ‘properly consider the social and political nature of sustainability transitions’ (Affolderbach and Schulz, 2015). However, although these limitations exist, the lack of spatial context has received greater attention within academia and this will be further explored.

Coenen et al. (2012) recognise the issue in the absence of spatial context and territorial scale of the STT approach. They argue that often the spatial context within the STT analysis is treated as a passive background of a transition, therefore STT fails to address the associative relationship between space and sustainability transitions (Coenen, et. Al, 2012). Furthermore, there is lack of attention towards the spatial dynamics of innovation and the role it plays in terms of ‘knowledge exchange’ in supporting transitions over long distances (Affolderbach and Schulz, 2015). This can lead to perception that socio-technical transitions can happen anywhere, as long there is potential for the right alignment between the niche, regime and landscape levels.

Furthermore, Coenen et al. (2012) question to what extent that transition theory development has been influenced by the Dutch context, where it emerged and was exclusively developed. Additionally, the empirical studies are mostly carried out in wealthy Western and Northern European countries, and there is currently no evidence of extensive

comparative studies, which could challenge the regional and global dynamics of transitions (Coenen et al., 2012). Their suggested hypothesis state that ‘these (actor network) nodes may hold a privileged position in global transition networks, and make substantial contributions to transition processes in particular localities’ (Coenen et al., 201, p. 976). The interconnectivity of transitions can be as important as the local conditions that are constructing the change when analysing transition processes.

More recently, scholars have questioned the role of cities within socio-technical transitions. The argument predominantly focuses on the problems within existing urban infrastructures and resource requirements specifically associated with climate change. Urban governance is seen as responsible for aligning their priorities with the socio-technical regime priorities in order to achieve a sustainable urban transition (Hodson and Marvin, 2013). Recent emergence of the Urban Transition Labs (UTL), a dedicated space for facilitating the learning process, indicates that there is need for systematic transition strategies within a specific urban context. For example, Hodson and Marvin (2015, p.54) have argued that ‘urban infrastructure transitions require new forms of knowledge and capacity to be produced, communicated and deployed’. This knowledge creation can require specific arrangements and/or platforms, which allow individuals/groups to develop innovative alternatives. Navens et al (2013, p.2015) have argued that UTL as a platform can provide ‘space and time for learning, reflection and development of alternative solutions that are not self-evident in a regime context’.

Cities can be considered as the primary actors that initiate sustainability transitions related to local infrastructure change. However, Geels (2013) argues that they play a very limited role in transitions that involve entrenched market dynamics and have an ability to transform existing national-level systems. Nevertheless, Affolderbach and Schulz (2015) believe that cities have a great potential to be catalysts and drivers of change towards environmental sustainability. They signify the importance of city governments, where often they are ‘forerunners in the promotion of climate mitigation strategies over-complying with or leading national or international norms and regulations’. Therefore, they suggest that critical urban geography has a large potential to inform transition theory in order to overcome the limited conceptualisation of the socio-spatial context, and also could ‘challenge our understanding and expectations of the ways in which sustainability transitions will be substantiated’ (Affolderbach and Schulz, 2015). Socio-technical transition towards

sustainability should not be perceived as a homogenous process, which merely seeks for a better technological fix to overcome existing constraints. The potential of cities in driving sustainability transitions is dependant on the level of autonomy and control that urban governance has over decision-making.

2.3. Research questions

Even though the interest in co-housing is growing in the UK (Jarvis, 2016), there is no indication that the emerging co-housing groups are encouraged to build. From the STT theory perspective, it can be argued that the historically aligned components of planning, finance, building and design practices, consumer desire, habits, stakeholder interests and government regulations are interlocked and reliant on each other, therefore, they are producing a resistance to fundamental change. Being at the structural disadvantage, co-housing requires the niche protection of shielding, nurturing and empowering in order to seed the change in existing systems. This research, therefore set out to explore the following questions that will guide the structure of my analysis:

- What are the main London housing regime pressures?
- How and in what ways co-housing receives niche protection?
- What are the perceived internal (group) and external barriers that obstruct the co-housing development?

3. Methodology

In this section I will reflect on the strengths and weaknesses of the case study approach, this is followed by a discussion on the data collection methods applied and the official data used. Finally, I will explore the research ethics, and uncover limitations of this study in order to reflect on the potential impacts of my research.

Primarily, I employ a qualitative paradigm to my study in order to examine and question the role of co-housing in seeding the transformation of existing urban systems. The inductive case study framework was chosen as the most appropriate research strategy for this exploratory study and theory-testing as there is limited research available about co-housing in London. The field research incorporates 2 qualitative semi-structured interviews with co-housing residents from the Copper Lane scheme along with 3 expert interviews. However, in order to broaden the context of the existing 'regime level' I apply a secondary data analysis, where I explore official statistics allied to the current housing market in London.

3.1 Case study

The case study approach can create an opportunity to study present events by applying a range of research techniques, such as, document analysis, interviews, observations, official statistics and survey analysis etc. (Yin, 2003). Here I refer to the case study as a comprehensive, in-depth analysis of a single or number of cases, where both, quantitative and qualitative research methods can be applied in order to explore social phenomena (Gerring, 2007). The properties of the case study approach allow me to balance a mixture of quantitative and qualitative information in order to gain a comprehensive understanding of co-housing along with its relation and interconnectivity to the regime level.

The case study approach does not seek to justify a sample, but looks for 'within-sample validity' Gerring (2007, p.43). The rationale on how cases are selected is based on the purpose of the study, existing theory and research (Maxwell, 2013). As co-housing projects are an emerging phenomenon in the UK, it means that there are a limited number of cases that can be studied. Therefore, the case study approach was the most appropriate method to explore this subject.

It was only very recently, in 2014, that the first co-housing project called ‘Copper Lane’ was built in London, Stoke Newington. At the time it gained instant media attention, where it was regarded as a cost-effective housing solution, which responds to new social arrangements of living and sharing (Moore, 2014; Ijeh, 2014). Another co-housing project known as the older woman co-housing scheme (OWCH) in High Barnet is currently underway and will be finished later this year. To some degree both projects fundamentally differ from each other in terms of how they were established, organised and financed. Whilst, the immediate differences are based on project size, demography and project development. Parallels exist in manifested values held by both groups, which are to share common space, mutual support and to create an alternative way of living.

Despite the significant differences between these two projects, both of these cases will be incorporated in this study. This will allow me to draw comparisons from the challenges faced by building this unfamiliar type of dwelling.

3.2 Semi-structured interviews and expert interviews.

The primary methods used for this study are semi-structured and expert interviews. Due to their fairly flexible approach, these interviews can provide a more thorough insight about participant experiences, attitudes and behaviours (Lewis and Nicholls, 2014). The interviews are designed in a way that allows ‘people to answer more on their own terms, but still provide a structure for comparability’ (May, 2011. p.135). Therefore, interview questions cover specific topics, although, additional questions can be asked depending on how the interviewee answers (Bryman, 2012).

In this study the interview guidelines were based the initial document review and research assumptions found within the theory. The interview questions for the residents of Copper Lane were structured into question blocks that revealed aspects of the group’s formation, decision-making process, project finance and experience of living in co-housing. It was difficult to contact the Copper Lane residents as they had no publically available contact details or website. Therefore, I made a request to the architectural practice, which designed the project. I was able to then directly invite the residents to an interview and through this two members (male and female) came forward. It was later discovered that the

group receives numerous interview requests from media, researchers and students. Therefore they seek to keep a low profile, as this external attention requires much of their free time.

The OWCH project have readily available information via their website, which helped me to contact their Project Consultant, Maria Brenton, who I later interviewed. Through this interview I was then invited to meet some of the members at their regular Sunday meeting, on this occasion they held an informative meet-up for other women who were interested in co-housing. During the meeting, one of the prospective residents revealed that half of them were currently homeless, as they had sold their houses expecting to have moved in by February this year. However, the move in date had already been delayed several times, but now has been set for October, nearly a whole year out from their original timescale. The decision not to interview the OWCH prospective residents was made consciously due to these difficult times.

I carried out expert interviews with Anna Kear, the UK Co-housing Network executive director (UKCN); Ken Rorrison, project architect of the Copper Lane co-housing project; and Maria Brenton, OWCH project consultant. The interview with Anna was conducted in order to understand the role of UKCN in promoting the co-housing in the UK. The aim of the interview, with the lead architect of the Copper Lane project, was to understand the complexity of delivering a co-housing project. Whereas, the interview with Maria explored the challenges of pioneering an unfamiliar housing project in London. Therefore, interview guidelines were distinctive but included some similar questions to allow me to compare different opinions.

All of the semi-structured interviews with residents and expert interviews were analysed using open coding, which is an analytical approach used in grounded theory. However, it can be applied as a data analysis method outside the grounded theory framework (Strauss, 1987). This approach was employed in order to avoid merely describing the outcomes of the interviews. The open coding process seeks to ‘produce concepts and open up the inquiry’, which allows one to ‘break data apart analytically,’ (Strauss, 1987, p.28-29). Therefore, all conducted interviews were transcribed in order to apply this data analysis approach.

3.3. Official Statistics

In order to support my analysis about the current ‘housing market regime’ in London I use official statistics, which is ‘data collected by the state and its agencies’ (May, 2011, p.74). Official statistics can offer a great potential for social and spatial analysis, mainly because of their extensive source of data, which can create a compelling portrait of the population (Hakim, 1982; May, 2011). However, official statistics as a secondary data source, produced for certain purposes, can have limitations in their validity and reliability, because as a researcher you have no control over the data quality (Hakim, 1982; May, 2011; Bryman, 2012).

For statistical investigation I use public data sets available from the Department for Communities and Local Government (DCLG), such as ‘Net supply of housing’; and Official Labour Market Statistics; and Land Registry’s Price Paid Data (PPD). This quantitative data will provide analysis that will support my argument about the existing London housing regime pressures. According to Hakim’s (1982) typology of data sets, the data I am employing for my analysis can be described as ‘datasets derived from administrative and public records’ (Hakim, 1982, p.6). According to Hakim (1982) this type of data can be ‘affected by administrative procedures and concerns’, where data items are based on standard definitions and classifications. This concern applies marginally to my study, only in terms of the kind of data that is available and in what format. The data that I am using is not constructed, therefore, issues regarding to standard definitions and classification does not apply. For example, Lands Registry’s PPD records residential property sales in England and Wales when properties are submitted for registration at the Land Registry. However, if at the time of purchase the property already exists in the registry’s database the registration of property is voluntary (Land Registry, 2012). The fact that the registration secures the ownership of the property serves the interest of the new owner to register the purchase. Therefore, this type of data allows one to access information of so-called ‘hard to reach’ areas and holds a high level of validity.

3.4 Limitations

The small scope of the research can be the main limitation, which could have a potential impact on my findings. As previously discussed, currently there is only one co-

housing project up and running in London and one on its way later this year. This delimits the scope of my study to two cases, which in respect of social character are fundamentally different. For example, The OWCH group are women over fifty only, whereas Copper Lane co-housing is a family based and multi-generational group of people. The other differences between these projects are the fact that the OWCH project is on a relatively larger scale; it will have 25 units, where 8 of them will be available for social rent, while Copper Lane combines 6 family homes, which are owner occupied only. Some could argue that these differences are too fundamental for comparison, however, I believe by studying both projects I can reflect on the diversity of these co-housing projects and this will mitigate the risk of the research outcomes being too homogenous.

Furthermore, after realising the level of difficulties that the OWCH prospective residents currently face, I decided not to conduct interviews with them for ethical reasons. However, Maria Brenton, who is the OWCH project consultant provided valuable insights on how the group was formed and functioned in achieving the older women co-housing scheme in London. The lack of interviews was compensated by attending the OWCH group's meeting, where I had a chance to have brief conversations with some of its members.

4. Analysis and Findings

In this part I seek to reflect on the findings, gained during the fieldwork, through the lens of socio-technical transition theory. Echoing the multi-level perspective (MLP) on transitions, at first I seek to characterise housing regime pressures existing in London by exploring official statistics. The second part of this discussion will focus on my analysis on co-housing as a niche level innovation, where I focus on niche protection, pioneering aspects and internal and external group barriers from the STT perspective.

4.1. London's housing regime pressures

This sub-section will provide an empirical clarification of the present socio-economic issues within the capital. As housing issues are very complex and interconnected with many regime structures and lock-ins, my intention here is not to provide an explicit analysis, but rather reflect the main trends that represent the level of regime pressures.

The debates about the London's housing crisis are omnipresent and yet there is no single definition on it. For some, it is about inequality and ownership, for others it is about quality and sustainability, however, for most of the Londoners this crisis is about affordability. Property prices continue to grow, whilst the inability to afford housing persists (Travers, et al, 2016). For example, the median housing price in London within a decade has increased by 39%, where within the last three years it has risen by about 27% (Figure 3 and 4).

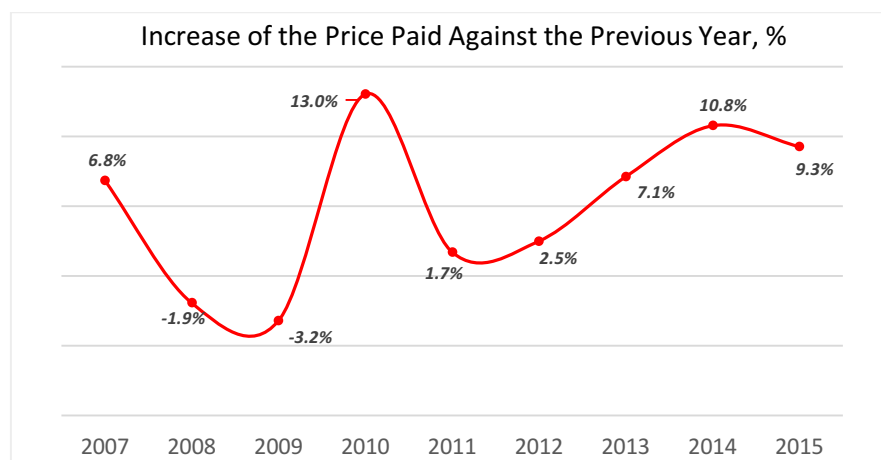


Figure 3: Increase of the price paid against the previous year, London, %. Data source: Land Registry's Price Paid Data.

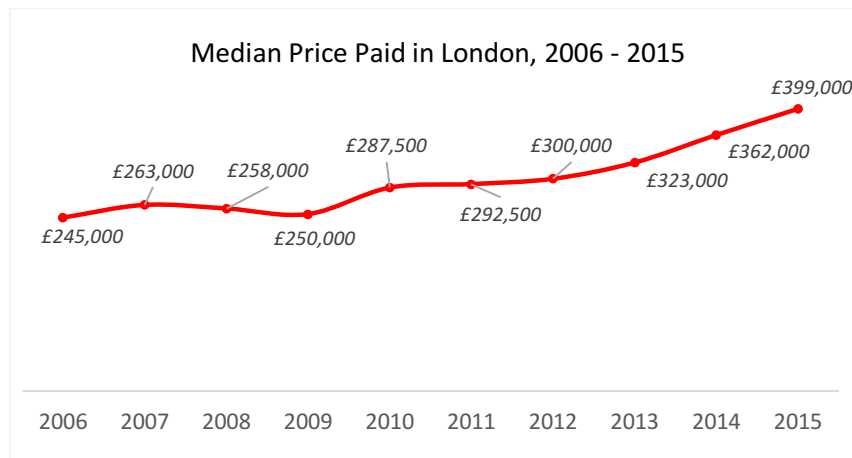


Figure 4: Increase of the price paid over a decade in London. Data source: Land Registry's Price Paid Data.

In 2015 the median price paid for housing in London was £397,500 (excluding the City of London median) (figure 5), whilst the median gross annual income was £29,800 (NOMIS, 2015). Statistically, when buying a property in London an individual would pay 13 times more for their home than their annual income. Furthermore, when comparing these ratios between boroughs the evidence indicates of a high spatial segregation throughout the city (figure 6). London is out of reach for many, where those on the median income, who do not hold any capital assets, cannot afford to own a home in London. For example, the borrowing requirements suggest that the loan-to-income ratio cannot exceed 4.5 times that of an individual income, therefore most of those on the median income and below, without any substantial capital, most likely would fail the affordability assessment (The Money Advice Service, n.d). Therefore, for most salaried workers in London the prospect of owning a home is no longer possible.

Eventually, the affordability issue has driven the growth of London's private rented sector (PRS), where it has increased, from 16% in 2004 to 27% in 2014 (GLA, 2016). The research paper published by the Centre of London (Travers et al., 2016) suggests that the housing cost for those in PRS are directly affected by the supply-demand trends within the housing sector. Therefore, housing costs and living standards can be certainly affected by market forces. Furthermore, the absence of a dedicated long term PRS stock only creates more pressures on those who rent due to the lack of security (Holman, 2015; Travers, 2016).

Median Price Paid by Borough in 2015;
Price disparities from median price, %.

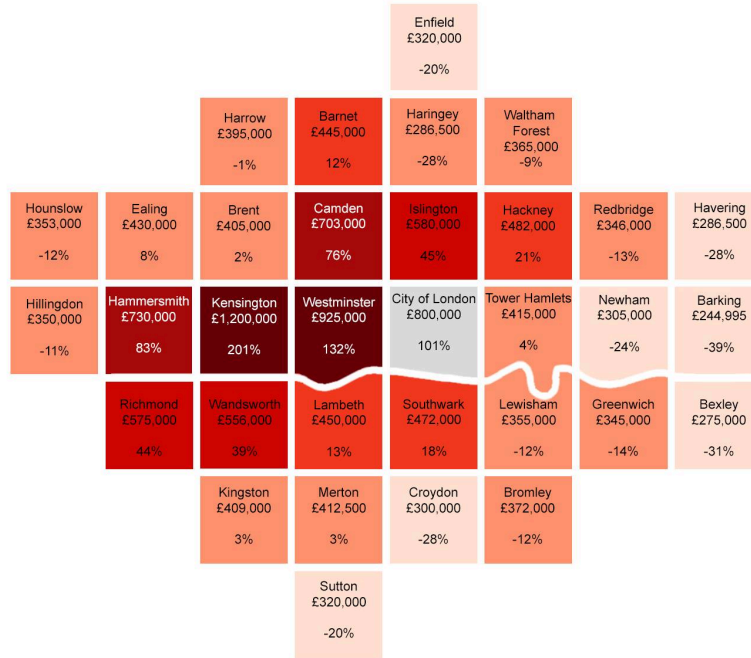


Figure 5: Median price paid by borough and price disparities from median London Price in %; 2015, $n=126,405$. Data source: Land Registry's Price Paid Data, 2015.

**Ratio between median price paid by borough
and median gross annual income in 2015**

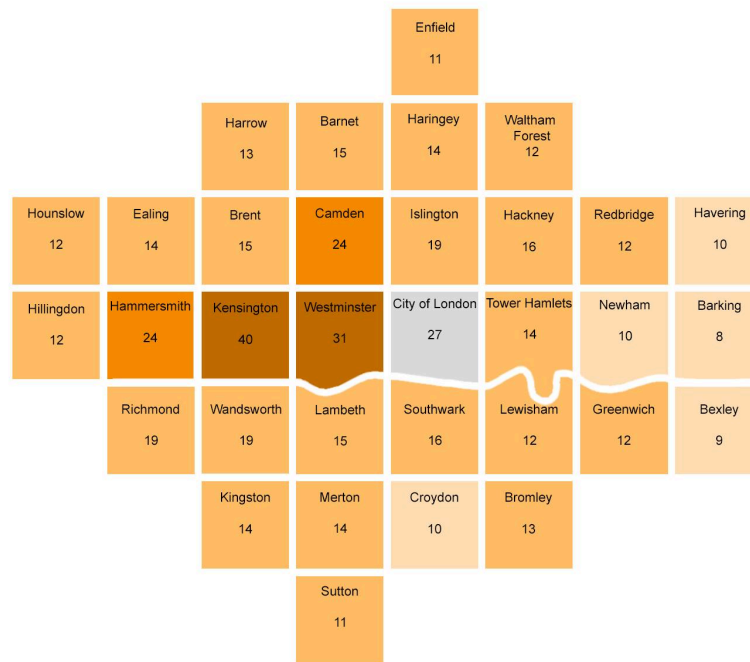


Figure 6: Ratio between median price paid by borough and median gross annual income in London, 2015, $n=126,405$. Data source: Land Registry's Price Paid Data, 2015; NOMIS Earnings by Residence, 2015.

The majority of new residential developments in London are delivered by volume builders and thus, the supply of new housing is most likely determined by their decision making process. Holman et al (2015) has argued that developers ‘follow a tested model of ‘drip feeding’ new housing onto the market, rather than releasing large chunks of stock at the same time.’ The rationale is based on profitability, established processes and ambition to not slow down the market. For example, the growth of new housing stock within the last 5 years on average was about 0.7% per year, where within the last three years’ local authorities showed a negative growth supply (table 1). Alongside the dramatic fall on government grants for affordable housing since 1990s (Chaloner, 2015), there has been, a decrease in housing delivery from local authorities. Further to this, within the last three years’ local authorities have been engaged in setting up their own housing companies and consequently are entering the private sector (NLGN, 2016). This adopted strategy, to some degree, allows local authorities to overcome a lack of central government funding for social housing, by allowing them to borrow more money; mitigate the risks of losing the affordable rent housing stock through Right to Buy policy; and in meantime respond to pressures of housing people.

London housing stock – number of dwellings					
Year	Local Authority	Private Registered Provider	Other public sector	Private sector	Total housing stock
2011	404,225	376,799	6,153	2,481,270	3,358,180
2012	412,820	385,000	12,510	2,572,700	3,383,030
2013	410,010	390,770	11,320	2,591,970	3,404,070
2014	406,390	392,430	11,260	2,617,570	3,427,650
2015	401,740	397,690	5,350	2,649,730	3,454,490

Table 1: London housing stock. Data source: Dwelling stock: Number of Dwellings by Tenure and district: England. Data source: DCLG.

The evidence suggests that the developer-led housing delivery system has failed to address the core problem of affordability and local concerns. This begs us to question, to what extent local authorities welcome alternative solutions in order to bring diversity to the

housing supply. The London Plan (2016) echoes the previous coalition government's Localism act and 'Big Society' agenda, by endorsing community-led projects and Community Right to Build. However, the role of alternative housing is still marginal within the existing housing regime indicating that there is still lack of commitment to develop an alternative solution, which is not manifested within a regime context. Holman et al (2015, p.12) have argued that the supporting the development of an alternative, self-managed form of housing would provide additional living options that respond to the 'diverse needs and desires of the city's population'. However, the ability to utilise and access individual local authority land are the main barriers for these projects to establish themselves within London (Holman et al, 2015). Although, there is an aspiration to encourage the local community to solve local issues, there is lack of support, which could protect these communities from market rules. Furthermore, without changing the regulations the small-scale community-led developments are not able to compete within the existing regime (Seyfang and Smith, 2007)

In this section I focused the discussion on the most pressing housing regime issue in London, which is affordability. The scale of the affordability crisis suggests that the current housing delivery in London has failed to provide enough housing for people on a median income and below. Furthermore, there is no evidence that alternative housing developments, either community-led or profit-driven, are widely supported or encouraged within London.

4.2 Niche protection

In countries like Denmark, Sweden, Germany and the Netherlands collaborative housing is part of a deep-rooted tradition of sharing and mutual support, whereas in the UK it is a relatively recent phenomenon. According to UKCN (n.d.) currently there are 19 built co-housing communities throughout the UK. The first co-housing project in London was built very recently in 2014. This section will explore the niche level as a protective space by discussing the role of shielding, nurturing and empowering the co-housing as a path-breaking innovation in the context of the UK. I will focus the discussion by looking at the UKCN, which is an advocate for co-housing groups in the UK.

UKCN's role as a network, in a wider sense, is well exemplified by their mission, which is to 'help communities to use the cohousing model to create better places to live by reducing isolation and loneliness, growing street level social capital to share facilities and

services and the use of the model to reduce living costs' (UKCN, n.d.) This involves working with existing members by helping them navigate the process of building co-housing, facilitate networking and knowledge transfer between different actors and by hosting learning webinars (UKCN, n.d). Both network building and the facilitation of learning can be perceived as niche nurturing, which supports the development of co-housing. Whilst at the same time UKCN works towards strengthening the role of co-housing in both the local and governmental levels. As a path-breaking innovation co-housing is at the structural disadvantage, because it does not fit in the existing industry structures and dominant practices. Therefore, UKCN has taken up the role of providing active shielding by engaging with local authorities and housing organisations. Therefore, advocacy is an important part of the development of co-housing in the UK:

'The more we get co-housing understood and known of, the easier the role becomes for the individual groups and localities, because people don't think it is something bizarre or insane.' (Anna Kear, UKCN)

Another role of UKCN is to broaden the relationship network with other community housing organisations and forming a community-led Housing Alliance. Creating stronger relationships with other networks can enable a sound resource and knowledge mobilisation. This can contribute towards the empowerment of individual co-housing groups, for example, path-breaking innovations often require different policies and regulations than incumbent industries, and therefore there is a need for internal capacity to facilitate the growth of niche innovations:

'The alliance has so much more potential, for example we went to Department for Communities and Local Government (DCLG) to speak about the government announcement that there will be a £60 million fund for community-led housing within rural and coastal areas. What we have been doing is working together to actually show that we are a coherent group of organisations and we are currently making a proposal for the government about how that funding should work.' (Anna Kear, UKCN)

Moreover, the mobilisation of generic governmental support for community-led housing can be perceived as passive shielding as the policy support is not directly addressing co-housing. The former Chancellor of the Exchequer George Osborne announced that Budget 2016 sets out a plan to ‘provide £60 million of the additional receipts from higher rates on additional residential properties to enable community-led housing developments, including through Community Land Trusts, in rural and coastal communities where the impact of second homes is particularly acute’ (HM Treasury, 2016, p.38). Therefore, the active shielding by UKCN in the lobbying government policy could create a positive environment, which is important for niche diffusion. For example, an appropriate funding system, which could alleviate the initial pleasures and fortify individual groups:

‘There shouldn’t be only capital funding, it also needs to be revenue funding. For example, pre-development work for co-housing groups. And also some of the revenue needs to go into infrastructure, like technical support for groups.’ (Anna Kear, UKCN)

The UKCN is also actively involved in gathering new evidence on community-led housing and facilitates knowledge exchange at local and international level. For example, in a partnership with six UK universities UKCN organised a knowledge-exchange and research seminar series that were funded by ESRC. Each seminar was organised around a different theme, exploring aspects of collaborative living from different perspectives (table 2). The final seminar was held in London, where in June 2016 the seminar partners launched their final report ‘Cohousing: Shared Futures’ in Parliament. The key asks for the central government was to improve access for funding and land, widen engagement with co-housing initiatives; and change the political and cultural framework of housing (Jarvis, et al, 2016, p.8). Whereas, local governments should make public land more available for groups and to provide technical support (Jarvis, et al, 2016, p.8). From social and private developers, the central request was to ‘integrate co-housing into mainstream housing and funding structures’ (Jarvis, et al, 2016, p.8). This indicates active engagement for niche innovation empowerment by advocating change within a specific environment. Raven et al (2012) classifies this as a ‘stretch and transform’ empowerment, as it seeks to re-structure these environments in ways advantageous to co-housing.

SEMINAR ONE	COLLABORATIVE HOUSING AND COMMUNITY RESILIENCE
SEMINAR TWO	BEYOND SPECULATION: DE-COMMODITISING PROPERTY IN COLLABORATIVE HOUSING
SEMINAR THREE	BREAKING OUT OF THE BRICK BOX: INTERROGATING THE SOCIO-SPATIAL FORM OF COHOUSING
SEMINAR FOUR	COLLABORATIVE HOUSING, MUTUAL SUPPORT AND SPECIALIST CARE
SEMINAR FIVE	SHARING THE FUTURE: HOW COLLABORATION INFLUENCES ECOLOGICAL BEHAVIOUR
SEMINAR SIX	MAINSTREAMING COHOUSING IN URBAN DEVELOPMENT: BARRIERS TO KNOWLEDGE TRANSFER

Table 2: Seminar series: 'Collaborative Housing and Community Resilience'. Source: UKCN

However, niche empowerment is not entirely an internal process, but relies upon other, wider processes within the regime level. For example, the rapid growth of the sharing economy (Hamari et al, 2015) can open up more opportunities to co-housing groups. The direct outcome of this is the emergence of peer-to-peer finance, which allows co-housing groups to access financial resources that otherwise would not be possible, as these co-housing groups often are classed as a higher risk investment or do not have an existing asset that allows them to borrow. Peer-to-peer financing such as microloans and crowdfunding services are a relatively recent phenomenon that have been made possible through technological developments (Hamari et al, 2015). Crowdfunding can be divided into the following categories: 'donations, rewards-based (also called pre-selling), lending, and equity crowdfunding', where the latter has shown the greatest growth potential in the UK (Vulkan et al, 2016). Mobilising the momentum of a sharing economy and diversifying the finance options for co-housing groups can be important, as the established industries are often resistant to engage:

'We are starting to look at some peer-to-peer lending initiatives. Some of the existing groups, after works have been completed and the building starts earning capital, actually are interested in lending to other forming groups. It is having a momentum across the country. (...) Existing groups, because they are considered as high risk (...) there rates are somewhere between 6-8%. Where actually they are saying from peer-to-peer, some people

are lending at 0%, but even if they are getting 2% it makes it so much more affordable.'
(Anna Kear, UKCN)

Manifested potentials through the Localism Act and its Big Society agenda, is another regime context which provides greater acknowledgement on local decision making. Therefore, co-housing as an alternative can potentially gain considerable appeal from the governmental and private sector. For example, Arrigoitia and Scanlon (2015) have indicated the growing interest of UK policy-makers about co-housing and what benefits this model of living can create. For example, Homes & Communities Agency, which is the non-departmental public body sponsored by DCLG, has expressed an appeal towards the co-housing model. The agency's recommendation from the report entitled 'Housing our Aging Population: Panel for Innovations' (2009, p.45) states that 'mutual and co-housing models be supported, where a group of households meet their own needs by collectively procuring and managing their retirement housing'. From this perspective, it suggests that co-housing has a potential of addressing issues related to an aging society. Whereas, the previously mentioned report 'Cohousing: Shared Futures' suggests that the co-housing model could have a significant role in solving the housing crisis by offering an alternative type of housing oppose to one that is produced through the speculative volume building model (Jarvis, et al, 2016, p.). However, whilst government is aware of the demographic burden caused by an aging society, the idea of alternative housing is at the margin. Therefore, co-housing often is deemed as very inaccessible for the majority as it requires a group that is knowledgeable in order to orientate around the existing housing regime:

'A lot of people see co-housing as a very white and very middle-class thing. I agree to a certain extent, and the reason why, is because the successful pioneers had two things: money and skills. There was no help available at all. The ones who succeeded were those with money and skills. That doesn't make co-housing white middle class, it means it's the only way how to live there. (...) Even when doing partnerships with housing associations you have got to be really careful, otherwise it is overpowered by money and skills, whilst the group is disempowered. That is why, it is really important to put that investment in support for groups to have that kind of power (Anna Kear, UKCN)

The UKCN's role exemplifies the different properties of niche protection. The evidence shows that niche as a protective space does not only require a strong internal capacity, but also active engagement with other community-led housing groups and with existing regime structures. Another important aspect is that the advocacy around co-housing, at both local and governmental level, is only possible because of the established, united and coherent network of actors involved. However, the political will to engage with the idea of co-housing can be effected by uncertainties and high risks. This begs for evidence based examples in order to justify any investment in the vision projected by those involved. In the next section I will explore the role of pioneer and the main obstructions that occurred while developing the OWCH project, which is the UK's first purpose-built, senior co-housing scheme exclusively for older women.

4.3 Being a pioneer

The OWCH project from its early stages were keen to create a living environment which enables sociality and mutual support, along with inclusivity by providing social housing units within the scheme. Maria Brenton's idea to bring co-housing, which is dedicated to specifically older woman, to the UK, dates back in 1998. After returning from her research work in the Netherlands where she explored collaborative living arrangements for elderly people, she found that this model could be translated into the UK context. This resulted in an 18-year long journey to make this project possible. The OWCH group dealt with a lot of disappointment and refusal from local authorities and housing associations. However, later this year the OWCH scheme will be completed in High Barnet, North London, and will provide 25 units where 8 of them will be social rental (figure 7).

Socially inclusive co-housing was made possible by the knowledge developed over the years and with substantial charity support, whilst Governmental grants for social housing slowly dissipated. Therefore, the support from the third sector was allowing the OWCH group to bear a significant amount of uncertainty and risk of building unfamiliar housing model in London:

'So, about 7 or 8 years ago, I was pulled in by a charity in West London (Tudor Trust – auth.), which is very interested in design, architecture and new urban developments,

and they wanted to help us to achieve a senior co-housing group. So, what they did was put in about 10 to 20 thousand pound a year or something. Some money to support me to keep going and money to support the hire costs of the room and the communications and such (...) We went back and said 'look, we are not going to be able to include social interest and the project may just fold'. And they said, 'We want this to succeed we will give you £1 million'.



Figure 7: OWCH project's architectural rendering. Image Source: Pollard Thomas Edwards Architects.

The charity safeguarding of the project was allowing the group to continue to work and achieve its vision. The aim of the charity investment was to build and evidence that the idea could work and therefore OWCH could act as an exemplar project allowing others to learn from this project. However, Brenton has been quite certain that the OWCH project is not replicable in the current context as to be socially inclusive requires a large financial injection in order to deliver the project. In OWCH's case this was provided by the charity, therefore, the group is responsible to share any knowledge gained from this process:

'One of the requests from the charity is that OWCH should help other people to learn about co-housing. I keep reminding them of that obligation and I am prepared to help them to do it. I am also very aware that they are getting older, some of them not in their best

health. In spring, we are going to commission a short film, about 3-4 minutes, about senior co-housing, focusing on OWCH.’ (Maria, OWCH)

Despite the financial support, which often can be the main barrier for innovative experiments, there were a couple of other key obstructions that proved the resistance of the existing structures. For example, the fact that the group encompasses only older women, from mid-fifties and to around eighty, was perceived as a burden to local council’s services:

The council (LB of Barnet – auth.) held up the development of the scheme for at least two years by opposing the group going into that borough. They did not want older people going into their borough to make demands on their social care. They would never say it officially, they said it unofficially. It took me two years to get in the door to see a new Director of Adult Social Care in Social Services, to tell her about the scheme and she was really supportive. It was people in the housing department who were trying to keep us out, they saw us as sheltered housing, old helpless people, that’s their image. (Maria, OWCH)

Another major hurdle was to create a partnership with the housing association. The need to work with them was due to the fact that the group wanted to attract government funding to subsidise the social units at that time. The requirement was that they needed to work with the housing association to achieve this. As an unfamiliar housing development it made it quite difficult to prove feasibility for the housing associations to engage in the project delivery:

‘We have been through 8-10 housing associations, trying to interest them, telling them what co-housing is. Meeting after meeting, and they lost interest.’ (Maria, OWCH).

Lack of governmental financial support and local authority’s interest has had significant impact on the OWCH development. These or other difficulties can be seen as a part of being a pioneer, but also the fact that they aim to be inclusive was contradictory in a way that it almost obstructed the process:

'The fact that OWCH has taken 18 years really scares me. You have to understand this is the first co-housing scheme (for older people – auth.), absolute pioneer. Because of the values, it made it difficult. It has been difficult, because they wanted to have a mixed tenure and a mixed community, all of these things make it harder to work.' (Anna Kear, UKCN).

Another obstruction, which I would like to separate from labelling as a 'resistance of regime' is access to land. In this context, I perceive this as an outcome of regime or, in other words, regime pressure. Lack of available land, which is financially feasible, can affect any development in London and in any other growing city. In addition, often the 'high land values lead to expectations of continued increase' (Holman, 2015, p.5), therefore creating fundamental resource challenge. Furthermore, the complex process of obtaining planning permission and procurement is not aiding the empowerment of small-scale builders and self-builders (JRF, 2012, p.10.). Due to the scope of the co-housing projects, as a small-scale development, they often are left with available odd parcels of land (complex site plan and/or conservation areas), where developers are not interested to develop because of the cost issue. In the case of OWCH, the site in High Barnet was found and bought by Hanover, the housing association they partnered with in 2010. Without professional help, it would be difficult for them to achieve this:

We went around the whole of London, looking at all these scraggy ends and bits of land behind the railways, behind factories and such. We never got hold of them. Land in this country is greedily sucked up by developers, especially London. They are land-banking, they are buying spare land and keep it empty for years. (...) It was clear that we have to have somebody professional who could help us to find a piece of land. (...) We only found a site in 2010. That was a very long time and that was the 4th serious site that we found. The group had to deal with a lot of disappointments (Maria, OWCH).

This discussion revealed some of the main tensions that triggered the suspension of the OWCH project. The obstructions could be related to the fact that OWCH is the first project of its kind built in London. However, it also revealed stigma around old age that may have had a certain impact on the project delivery. It also illustrated a need for substantial

support from a third sector to allow the group to achieve their vision of being socially inclusive by providing social units in their scheme.

4.4 Social aspects of building co-housing

The guiding principle of co-housing is not grounded on the notion of profit and loss or passive consumerism, but rather reflects the group's active involvement and commitment to realise elements of sustainable living. Smith (2007) has argued that the analysis of exemplary eco-house projects often focuses on the 'technical and economical aspect, whilst, overlooking the social processes and guiding principles underpinning those principles' (Smith, 2007). Building co-housing is a complex and time consuming process that requires groups to have high solidarity and commitment to the project. Here I will reflect on social aspects and internal group barriers that are not common in the conventional housing development and therefore require different ways to address them.

The Copper Lane co-housing project in Stoke Newington (figure 8 and 9) emerged through an opportunity to purchase a site. Initially, the land was owned by the local authority and later it was sold to an Ethiopian church, which aimed to build a new church. However, they failed to receive planning permission and therefore, the land was put back onto the market. Individuals from the Copper Lane project were aware of the expressed interest from several developers in buying the land plot. In order to secure access to the site, the individuals approached the church directly expressing their similar values and common interests, resulting in a successful acquisition of the land. Therefore, the time pressure of acquiring the available site made people act quickly and soon a new group made up of 6 families was formed:

'There was no time to act. We either did it or didn't. It wasn't like we formed a group and then spend 3 years looking for the land, like what normally happens with co-housing. The site was a one-off chance. We knew that it would not happen again, so we thought that we just have to act and then we will assemble some kind of group, a core, and then we will find out how it will go later.' (Resident 2, Copper Lane).

Although, mainly guided by the opportunity to acquire land, the Copper Lane group was also organised around the idea of alternative living that considered some level of a shared communal space, which later formed the idea of co-housing:

'It was about sharing and wanting to stay in London, and not to build on greenfield land, but to develop a set of ideas about what it might meant to co-habit a space which was both private and also communal (...). A very simple set of values which was really about how to do something in a city that might demonstrate alternative ways of living, but it is a recreation of many centuries of living and it is not a new thing at all.' (Resident 1, Copper Lane)



Figure 8: Copper Lane co-housing scheme, 2014. Image source: HHbR Architects.



Figure 9: Copper lane co-housing scheme; common room; 2014. Image source: HHbR Architects.

Often co-housing groups establish rigorous rules and policies, which can clarify and lead to the further processes of project development and this was the case of the OWCH project. Within 18 years of developing the scheme it also created a vast amount of policies and procedures that covered aspects of mutual support, membership, equality and diversity, conflict resolution and more. Whereas in the case of Copper Lane, the group's decision of not having strict rules and internal policies were made consciously by referring to other co-housing group experiences. As one of the resident's recalls:

'Quite early on we had some conversations with people who were involved in the Lancaster co-housing. I was looking on their website, they started with 25 PDFs about different rules about what you could and couldn't do, before they even started anything. (...) As the community was forming it gave them loads of time to have loads of disagreements about lifestyle issues and those sorts of choices. People left the project before even building anything; people moved in and then left, because they couldn't stand being there. I think that for me was a lesson learnt: don't make any rules. When a problem arises, deal with the problem then; don't try to predict what the ideal world would be like, deal with what it is and if there is.' (Resident 2, Copper Lane)

To some degree, the scale of the Copper Lane project allowed the group to progress without rules, where decisions were made by a consensus. To achieve this with a larger group can be difficult. The OWCH project approved that it was crucial to have a set of rules and procedures along with, to some extent, internal governance. For example, every OWCH member belongs to an individual or couple of task groups whereby people focus on specific questions, which need to be addressed. In addition to this, the group elected a committee and as Maria Brenton explains, all of this was required in order to progress the work forward:

'They are all spread around London, they live in 14 different local authorities and some of them live outside London. There is no way you can achieve anything in-between the meetings. So we have now this elected committee, which will step down when they move in and another group will be elected. I work very close with them, we plan, we strategise, we take safety measures, we plan the Sunday meetings, and we look at what topics have to be addressed.' (Maria Brenton, OWCH)

To some extent the scale of the project can also have an impact on how the group and decision making process is organised. With smaller co-housing groups the organisation can be more flexible, whilst a larger group requires a more transparent and democratic decision-making process, which can be time consuming, but less emotional. Both residents of Copper Lane admitted that working as a group involved a lot of compromises that challenged individuals and the group as a whole:

I think in the end people did manage to find in themselves a place of compromise. It was really tough when you have to give up something that you have decided you cannot live without. Everyone had to approach something very core in themselves. Which is about accepting a limit, to give-up something in order have something else, which really means to compromise, and also give up something when you see someone will be able to have it. (...) That is a really tough thing to manage, because you have to still continue living next door. (Resident 1)

The type of decision-making process can have further implications on the group's success. For example, if the group does not have enough coherence it can prove to be very difficult to practice consensus decision-making. This can have a wider impact on the group and others involved in the process. In the case of Copper Lane, this created some tensions that arise throughout the design process. Because of the time pressure and lack of group's coherence this made the process very challenging for the architect team to address:

'In reality what happened was that people were agreeing to things they didn't agree with, because there was pressure from the group. Because it had to progress, so people were agreeing on things, but then you realise that they didn't agree at all and it started to kick back. This caused huge problems for us and huge problems for the group.' (Ken Rorris son, HHbR architects)

In co-housing projects, individuals have a greater participation in the design and development process. This can complicate the development process, because of the amount of decisions and facilitation that needed to be made in order to achieve the shared vision of the project. This can require external social and technical help that can guide the group and

move the project forward. In the Netherlands, as co-housing projects are more common, a new role of ‘Social Enabler’ evolved (Dijkhuis, 2016). A Social Enabler manages the opinions and makes room for minority ideas that often are suppressed by dominant voices within the group. They help people to address issues and avoid unnecessary tensions that can obscure processes (Dijkhuis, 2016). In the case of the OWCH project Maria Brenton took on this role as Social Enabler, helping to lead the group through the development. Whereas, in the case of Copper Lane, processes were organised by individuals with some of the burden taken away by the architects. This made it very challenging for the architects to work with the group:

‘When you come to the meetings the decisions should be made already. In reality that didn’t happened. We ended up mediating the people in the room whilst they were disagreeing. It was quite difficult. People cried, there were many tears, there was crying going on in the office and it wasn’t just me. People were getting very upset. So we tried to control the situation, but there were very difficult individuals in the group’. (Ken Rorrison, HHbR)

In both cases, frequent meetings were needed and new roles were formed, which changed over time. Both Copper Lane residents admitted that time resources can be very critical for a successful project delivery due to amount of work that goes into the development of the project. One of the residents perceived time constraints as a major obstruction for the diffusion of co-housing in the future:

I’m quite cynical I suppose, in terms of scale. You cannot scale it up. In order to do this you need to have a time, and for many, time is not available. It is not just money, but you need time in the day to do extra things. That’s why it, in a way, it works for older people, because they actually have time, because the main resource you need is time. You need money, but you also need time, because there is so much decision-making and negotiation between yourselves, council or architects. (Resident 2):

In both projects, finance was another important aspect, which was conveyed by all research participants, where in each scheme different financial models were applied. In the

case of Copper Lane, the financial commitment, to some extent, allowed the project to come to life. As the project was funded through peer-to-peer finance, each member was lending money to each other depending on financial availability because the capital finance was gained from members selling their previous houses. This can indicate a level of trust amongst them, however, residents admitted that the legal agreement made between them had a significant role in achieving the project delivery as it determined that the individual financial investment was made non-returnable until the whole project was finished:

'We drew up this legal agreement between us at the very beginning, which governed the process on joining, leaving the project and financing the project. It was drawn up by a lawyer who had done something similar decades earlier but not a co-housing project. No one actually read the small print of the document, other people even shared it to their own lawyers and even those lawyers didn't notice it. It basically says: once you put your money in you can't take it out till the whole project is finished however long that is.' (Resident 2)

In the case of the OWCH project, the financial commitment in building co-housing was made at the very last stage of the building process. As the project was financed by Hanover housing association with some financial support from the charity, it allowed the group not to undertake any financial risks in building the housing. This had implications on the group's ability to make decisions. To some extent, the relationships formed with the housing association determined and constrained their collective agency. Maria explained that part of this was about risk taking:

'They (Hanover housing association - auth.) are carrying all the risk. They are reminding us that they are taking risks. I mean, that's what they do, you develop buildings – you take risks. That's part of their business, so I don't feel too sorry for them. On the other hand, I don't want to hold them up or delay anything. They have been reasonably good with OWCH. OWCH is a discrete, dedicated project with its own site.' (Maria Brenton, OWCH).

This discussion explained some of the aspects that may constrain a co-housing development from the internal group perspective. The access to finance, time and expertise are featured as important elements that can determine a group's success in building co-

housing. The size of the group can suggest different types of internal group organisation and decision making process's, where larger group can require an explicit organisational model and transparency.

As the internal group dynamics can put pressures on the project development the role of social enabler can be important. In the case of the OWCH project this external support performed throughout the planning and preparation process, which helped the group to articulate a common vision and gain its resilience.

As the group's coherence can change over the project development time, the established policies may aid further development, however, the financial commitment can be as important. The legal arrangement between Copper Lane members, to some degree, required the group to progress the project in order to return their financial investment.

5. Conclusion

This research highlighted how and in what ways co-housing as a niche type of dwelling is strengthened and supported in the UK. Furthermore, it underlines some of the challenges of building co-housing in London by focusing on perceived external and internal barriers. Overall, today co-housing can be seen as an alternative type of dwelling that seeks to address many individual and common issues. In this research it was evident, that those involved were seeking for affordability, social interaction and connection that facilitates mutual support and involvement in the decision making on how their homes are designed.

One of the main reasons of the slow and problematic emergence of co-housing in the UK is that existing housing delivery and demand is deeply path-dependent and locked into socio-technical structures that try to preserve themselves from a radical change in order to maintain relatively stable existing housing regime. This places co-housing at the structural disadvantage, therefore, efforts in building co-housing can result in complex and time-consuming process. The UKCN is an active agent that helps to strengthen the role of co-housing in the UK by building relationships at both local and governmental levels; policy mobilisation; knowledge creation and diffusion; engaging with the other community-led housing organisations; awareness rising and more. All these activities contribute towards the empowerment of new co-housing groups and can facilitate a system change that can simplify the process of building co-housing in the future.

The scale of the affordability crisis in London indicates that the current housing system is failing to address the issues on the ground. Related to these pressures, the difficulties arise for co-housing groups when acquiring land. High land values and access to land obstruct the co-housing development. Usually only odd parcels of land are available for groups, whereby commercial developers are not interested to purchase them due to the cost-issue. However, this is not just an issue for London, as this can arise for many communities in other growing cities. This regime failure combined with other social, economic, environmental problems and shifts can create an opportunity for alternative ideas and guiding principles to enter the mainstream debate.

Other issues can arise from internal group dynamics and are dependent on pre-existing skills and financial ability. In this study each group had different organisational structures and implemented decision-making processes. Depending on the size, groups can

require external support in order to develop coherence and facilitate the commitment. This is a time consuming process, which requires a high level of involvement. Further to this, the level of commitment can be a major barrier for many as it requires great amount of financial resources, depending on the legal structure. The OWCH project showed that the social enabler/project facilitator had a significant role in aiding the project development and helping the group mobilise the absent resources and knowledge. This can indicate, that, to some extent, there can be a future potential of the professionalisation of co-housing that could aid the upscaling of co-housing projects. Furthermore, the upscaling can require co-housing groups to partner with a wide range of stakeholders in order to access and mobilise knowledge and financial resources. There can be risks related to what extent co-housing groups will be disempowered and, therefore, will risk losing the fundamentals of co-housing as a way of living. These possible developments in the UK call for further comparative study which explore the empirical evidence in different European countries, where the idea of co-housing has been further developed.

Appendix A: LILAC in Leeds



*Figure 1: LILAC in Leeds. The UK's first ecological co-housing project. Completion: 2013.
Image source: © 2016 white design.*

Appendix B: Ethics and Risk Forms

Department of Geography PGT Research Ethics Screening Form King's College London

Please Note: Filling out this Geography PGT Research Ethics Screening Form does NOT constitute College Ethics Approval.

This Geography Research PGT Ethics Screening Form will help you to determine if you must submit a College Research Ethics Application to the College Research Ethics Committees before starting your research, under the guidelines for working with human participants set out by the Social Sciences, Humanities & Law Research Ethics Sub-Committee (SSHL RESC), and the Geography, Gerontology and Social Care Workforce Research Unit Panel (GGS REP).

In order to complete this process, please

- Familiarise yourself with the professional research ethics guidelines of *The British Sociological Association*: <http://www.britisoc.co.uk/equality/> (Statement of Ethical Practice)
- Read "Which kinds of research require ethical approval through the KCL Research Ethics Committees?" (p. 2 of this form).
- Answer the questions in Table 1 below, sign the form and also obtain the signature of your supervisor.
- Return the signed (by both you and your supervisor) *Geography PGT Research Ethics Screening form* to the Geography Department office and KEEP A COPY which you will place in Appendix 1 of your IGS/dissertation.
- If ethics approval is needed (answering 'yes' to question 2 in Table 1), you must apply for college ethics approval through the appropriate *College Research Ethics* committee, and **not start ANY research (including preliminary 'trials')** until ethics approval has been granted in writing.

Table 1. Department of Geography PGT Research Ethics Screening Questions.

1) Have you read and familiarised yourself with the professional research guidelines of <i>The British Sociological Association</i> ?	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No
2) Does your research "involve human participants" and/or "raise other ethical issues with potential social or environmental implications"?	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No

If you answered 'No' to question two, you do not need to submit your research for ethical review. If you answered 'Yes' to question two, please read the following web pages with information to establish your ethical risk level and where you need to apply: <http://www.kcl.ac.uk/innovation/research/support/ethics/about/index.aspx>, <http://www.kcl.ac.uk/innovation/research/support/ethics/applications/apply.aspx>, <http://www.kcl.ac.uk/innovation/research/support/ethics/applications/briefingpage.aspx>.

Table 2. Three levels of ethical risk for project types, and how to obtain College Research Ethics clearance.

Project type	How to submit?
Minimal ethical risk	Running on a pilot basis in 2014/15. PDF-based checklist and guidance are available online: http://www.kcl.ac.uk/innovation/research/support/ethics/applications/MR-pilot.aspx
Low ethical risk	Submitted online using REMAS: http://remas.kcl.ac.uk . The level of ethical risk is determined by your answers to a series of questions.
High ethical risk	Submitted online using REMAS: http://remas.kcl.ac.uk . The level of ethical risk is determined by your answers to a series of questions.

You **MUST** sign and return this *Geography PGT Research Ethics Screening Form* to be kept on file with the Department Office, and if a Masters student, submit a copy of this at the end (as part of Appendix 1) of your Dissertation. In cases where there is minimal, low or high ethical risk, you **MUST** complete the *College Research Ethics Application* at least one month before you intend to start your research and obtain written approval from them **BEFORE** carrying out any research.

Carrying out research without ethical approval by the College Ethics Committee may result in a charge under misconduct regulations as "action that deviates from accepted institutional, professional, academic or ethical standards will be regarded as misconduct and an infringement of these regulations" "Academic regulations, Regulations concerning students & General regulations" B3 – 1.1, King's College London. You should note that your research will not be covered by the College's insurance until you have completed the College ethical review process. This means that unless you receive ethical approval for your research, if a participant makes a legal claim regarding the research, then you would be personally liable. It is your responsibility to submit your research for *College Ethical Review* in good time to carry out any research.

Provisional dissertation title: *'Socio-technical transitions and urban planning. A case study of co-housing in London'*

Student Name: *BAIBA POELE* Student Card No: *1450986*

Student Signature: *[Signature]* Date: *20/04/2016*

Supervisor Name: *FEDERICO CARROTTI*

Supervisor Signature: *[Signature]* Date: *15/12/15*

Last updated 9 April 2015



Research Ethics Office
King's College London
Rm 5.11 FWB (Waterloo Bridge Wing)
London
SE1 9NH

27 August 2016
TO: Baiba Foglele
SUBJECT: Confirmation of Registration

Dear Baiba,

Thank you for submitting your Research Ethics Minimal Risk Registration Form. This letter acknowledges the receipt of your registration; your Research Ethics Number is **MR/15/16-334**. You may begin collecting data immediately.

Be sure to keep a record your registration number and include it in any materials associated with this research. Registration is valid for **one year** from today's date. Please note it is the responsibility of the researcher to ensure that any other permissions or approvals (i.e. R&D, gatekeepers, etc.) relevant to their research are in place, prior to conducting the research.

Record Keeping:

In addition, you are expected to keep records of your process of informed consent and the dates and relevant details of research covered by this application. For example, depending on the type of research that you are doing, you might keep:

- A record of the relevant details for public talks that you attend, the websites that visit, the interviews that you conduct
- The 'script' that you use to inform possible participants about what your research involves. This may include written information sheets, or the generic information you include in the emails you write to possible participants, or what you say to people when you approach them on the street for a survey, or the introductory material stated at the top of your on-line survey.
- Where appropriate, records of consent, e.g. copies of signed consent forms or emails where participants agree to be interviewed.

Audit:

You may be selected for an audit, to see how researchers are implementing this process. If audited, you will be expected to explain how your research abides by the general principles of ethical research. In particular, you will be expected to provide a general summary of your review of the possible risks involved in your research, as well as to provide basic research records (as above in Record Keeping) and to describe the process by which participants agreed to participate in your research.

Remember that if you have any questions about the ethical conduct of your research at any point, you should contact your supervisor, the Research Ethics office, or a member of your Department's Research Ethics Panel for advice.

Feedback:

If you wish to provide any feedback on the process you may do so by emailing crec-minrisk@kcl.ac.uk.

We wish you every success with this work.

With best wishes

Research Ethics Office

Minimal risk application - Baiba Fogeles



Whyton, Annah on behalf of kcl - crec-minrisk

Thu 21/04, 16:46



Minimal risk letter 2104...

167 KB



Download

Save to OneDrive - King's College London

Dear Baiba,

Many thanks for confirming this, we're now happy to confirm your minimal risk registration. This email acknowledges the receipt of your registration form, and the attached letter provides confirmation of registration. Your Research Ethics Number is **MR/15/16-334**; please be sure to keep a record of this number and include it in any materials associated with this research.

Please note it is the responsibility of the researcher to ensure that any other permissions or approvals (i.e. R&D, gatekeepers, etc.) relevant to their research are in place, prior to conducting the research.

Please take note of the requirements for audit detailed in the attached letter as you will be expected to provide this information upon request.

Kind regards,

Annah

Annah Whyton

Senior Ethics Officer

King's College London

5.11 Franklin-Wilkins Building | Waterloo Bridge Wing | London SE1 9NH

annah.whyton@kcl.ac.uk | 0207 848 3871

Geography Safety and Risk Management Plan

(This form is available electronically via <http://www.kcl.ac.uk/geography> → "For Current Students" / "For Current Staff" → "Student Forms" → "Universal Forms")

For further guidance on how to complete this form, please see page 11.

PERSONAL DETAILS

Data Protection: This information will remain confidential and will only be used by the Department in the event of an emergency or urgent need to contact you.

Please note that, other than for very low risk environments, we do not sanction lone field working. Even in low risk environments, you must have a nominated contact who should know where you are, be in potentially immediate contact with you (by phone) and who should have the timings of your departure and return from work, so that an alarm might be raised.

Student Name: Baiba Foglele

Student Number: 1450986

Degree/Year: MSc /2nd year

Next of Kin (name): Sabine Spaille

Next of Kin contact details: Address: 55 Arnhem Road, Chelmsford CM1 2EN; Mobile: 07788 218070

Any relevant medical information which might impact upon your study or safety: No

Address of nearest local hospital(s) to project or fieldwork site(s): St Leonard's Hospital, Nuttall St, London N1 5LZ

Name of local contact person(s) if applicable: Terry Clark, mobile: 07557 792104

PROJECT DETAILS

Please ensure you complete the [TRAVEL NOTIFICATION AND INSURANCE FORM](http://bit.ly/kclgeotravel) (available at <http://bit.ly/kclgeotravel>) at least two weeks before leaving. For work outside of the UK, please do not forget to obtain insurance in accordance with College regulations.

A. The project title.

'Socio-technical Transitions and Urban Planning. A case study of Co-housing in London'.

B. The date(s) of when data will be collected / Travel dates.

I am planning data collection during 1 Jun - 17 July.

21 Jun, London, London School of Economics. Seminar: Mainstreaming cohousing in urban development: barriers to knowledge transfer. (Building not yet confirmed). This is the most likely date when I will meet the UK Co-housing network executive director for the interview.

17 Jun Expert interview with the project architect of the Copper Lane co-housing project. HHbR Architects, 21 Perseverance Works, 38 Kingsland Road, London E2 8DD.

27 Jun, 1-6 Copper Lane London. Copper Lane co-housing project members.

C. The location(s) where the data will be collected. (Have the FCO advised against this area? If so, why is it essential to work there?)

London. (Exact locations provided above, question B.)

D. The overall aim of the project.

The overall aim of this project is to develop an understanding of the barriers and potentials of co-housing projects as a niche innovation within the existing 'housing and urban planning regime' in London. Question the role of the UK Cohousing Network in adapting and mainstreaming the idea of co-housing in the UK.

E. Can you identify any risk to others of the activity that you propose? (If yes, please elaborate.)

No.

3 SAFETY AND RISK MANAGEMENT PLAN AND ASSOCIATED DOCUMENTATION


After reading through ALL risk categories (pages 4-9), please select RISK TYPE A or B below.

RISK TYPE A

You are only eligible for RISK TYPE A if ALL of the following are true:

- Your work takes place within: college premises or home or within organizations/premises that have their own clear risk assessment in place.
- Your work involves ONLY library/archival data or existing on-line/other data.
- Your work WILL NOT expose you to risks greater than in everyday life i.e. you are carrying out activities that are normal for your everyday life and thus you are accustomed to managing associated risks.

DECLARATION: I have considered ALL categories in this form (see page 4 onwards) and I declare that I am undertaking a student project/dissertation where: a) NONE of my research will be outside of college premises or home or organizations/premises that have their own clear risk assessment in place; and b) it does not involve ANY of the risks identified in ANY of the categories of this risk assessment form, except those I experience in my everyday life. Should my research project change, such that there are now risks involved, then it is my responsibility to resubmit this form after completing an assessment for Risk Type B.

SIGNATURES OF PERSON FILLING IN A RISK ASSESSMENT AND COUNTERSIGNATURE.
A. Person filling in this risk assessment
Signature (TYPE YOUR NAME AND STAFF OR STUDENT ID IN PLACE OF A SIGNATURE): Baiba Fogeles
Date: 20/04/2016
B. Countersignature and date. I sign to indicate that I have read this and consider it an appropriate assessment FOR THE REASONS I GIVE BELOW [if no reasons are given this form may be returned] (Students – Research Supervisor; Research Staff – Project Leader; Academic Staff – Head of Department)
REASONS: The student has indicated a solid risk plan and risk awareness and the intent to follow the risk and safety procedures of the organisations where interviews will take place.
Signature (TYPE YOUR NAME AND STAFF OR STUDENT ID IN PLACE OF A SIGNATURE):  Federico Caprotti 5500124565
Date: 21.04.2016

RISK TYPE B

Fill out THIS PAGE and ALL OTHER PAGES in this form.

DECLARATION: I have considered ALL categories in this form and have indicated which risks apply to me that are greater than in everyday life and normal activities (writing yes/no for every section). Where I have answered 'yes' then I have also indicated the degree of risk from 1–5 (1=low, 5=high) and, where appropriate, added notes or comments relating to the level of risk. I have identified and added any additional risks not explicitly covered by this form in the final section.

SIGNATURES OF PERSON FILLING IN A RISK ASSESSMENT AND COUNTERSIGNATURE.
A. Person filling in this risk assessment
Signature (TYPE YOUR NAME AND STAFF OR STUDENT ID IN PLACE OF A SIGNATURE): Baiba Fogeles
Date: 26.04.2016
B. Countersignature and date. I sign to indicate that I have read this and consider it an appropriate assessment FOR THE REASONS I GIVE BELOW [if no reasons are given this form may be returned] (Students – Research Supervisor; Research Staff – Project Leader; Academic Staff – Head of Department)
REASONS:
Signature (TYPE YOUR NAME AND STAFF OR STUDENT ID IN PLACE OF A SIGNATURE):
Date:

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