Planning for Active Living: Aligning Policy, Product, Practice and Processes

Owen Hawe MSci

Faculty of Computing, Engineering and the Built Environment,

Ulster University

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I confirm that the word count of this thesis is less than 100,000 words

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List of Abbreviations

ABC	Armagh, Banbridge and Craigavon
ALE	Active Living Environments
BHC	Belfast Healthy Cities
BOSS	Belfast Open Space Strategy
BRT	Belfast Rapid Transit
CSR	Case Study Research
DfI	Department for Instructure
DOE	Department of the Environment
DOH	Department of Health
DRD	Department of Regional Development
EHCN	European Healthy Cities Network
EU	European Union
HBEP	Healthy Built Environments Program
HUED	Healthy Urban Environments and Design
HUP	Healthy Urban Planning
ICE	Institute of Civil Engineers
LDP	Local Development Plans
LGD	Local Government District
MDM	Multiple Deprivation Measure
NCDs	Non-communicable Diseases
NDPBs	Non-departmental Public Bodies
NGO	Non-government Organisation
NHS	National Health Service
NI	Northern Ireland
NIA	Northern Ireland Assembly
NIE	Northern Ireland Executive
NISRA	Northern Ireland Statistics and Research Agency
NPPF	National Planning Policy Framework
PCAL	Premier's Council for Active Living
PEDS	Pedestrian Environment Data Scan
PfG	Programme for Government
PHA	Public Health Agency
PHE	Public Health England

POP	Preferred Options Paper
PPS	Planning Policy Statements
RDS	Regional Development Strategy
RG	Regional Guidance
RICS	Royal Institute of Chartered Surveyors
RPA	The Review of Public Administration
RSUA	Royal Society of Ulster Architects
RTPI	Royal Town Planning Institute
RTS	Regional Transportation Strategy
RWN	Real Walkable Network
SDG	Strategic Design Group
SOA	Super Output Areas
SPACES	The Systematic Pedestrian and Cycling Environmental Scan
SPAHG	Spatial Planning and Health Group
SPG	Supplementary Planning Guidance
SPPS	The Strategic Planning Policy Statement
SWEAT	Senior Walking Environmental Audit Tool
TCPA	Town and Country Planning Association
UK	United Kingdom
UN	United Nations
UNCED	United Nations Conference on Environment and Development
WHO	World Health Organisation

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Abstract

As aspects of health and wellbeing are being slowly ‘re-knitted’ together within planning policy and practice, there is a need to consider how the built environment can promote ‘active living’, an articulation of health and wellbeing meaning a way of life that integrates physical activity into daily routines. The rhetoric for better – and smarter – partnership working, which spans professional boundaries, to nurture the creation of healthier urban environments requires greater collaboration between planning and other built environment professionals. The complexity surrounding multi-actor governance approaches represent opportunities and challenges for creating meaningful interaction between professionals for shaping active living environments. With the amount of professions working together in the development process, it is recognised that differing perspectives may be present which could impact in the promotion of active living.

This doctoral research adopts social constructionism to frame the investigation of how planning policy, development practices and professional cultures influence the delivery of ‘active living’ environments. The empirical contributions, combining semi-structured interviews and observational research, are drawn from case studies within Northern Ireland. In examining the relationship between policy discourse, planning practices and inter-professional collaborations, this research reveals different professional attitudes, experiences and perspectives of those working within the development process for achieving the creation of active living environments. There is evidence of how the existence of professional cultures influence the understanding of and approach to the delivery of active living, planning policy and collaboration. Whilst cross-sectoral understanding may be improving, built environment practice remains to be orientated around economic growth which impacts on the emphasis placed on the health agenda. The policy critique demonstrated that rhetorically health is well represented yet has failed to have the intended impetus in practice. Assessing the built environment with regards to active living, using a bespoke active living checklist, identified

contrasting built environments which resembled active living environments and suburban sprawl. Furthermore, initiatives that have recently been developed demonstrated that although to some extent supported active living, they were marred by political pressures, powerful lobbies and conventional practices. The findings indicate that while extensive collaboration amongst professionals exists, this has not translated into meaningful active living outcomes for promoting healthier urban environments. The study concludes that tensions remain for aligning professions, policy, processes and projects for delivering healthy active living environments, and propose recommendations for operationalising the delivery of active living that contributes towards improved health and wellbeing.

Chapter One: Introduction to Research

1.1 Introduction

To be healthy there is a need to be physically active. Modern lifestyles, however, do not always cater for active ways of living even though there is now a strong and well-established scientific basis linking physical activity to health (Edwards and Tsourou, 2006). Nevertheless, studies have found that over one hundred countries have physical inactivity levels of more than 30% amongst adults which adversely affects health and contributes to major public health challenges, such as obesity and other associated diseases (Wang *et al,* 2016; Townsend *et al*, 2015). Creating supportive environments for active communities aims to encourage more people to be active daily by containing the essential components to address physical inactivity (ALR, 2016). Urban planning and health studies have continuously found that a community's built environment influences travel decisions, showing that levels of physical activity increase in areas where opportunities for physical activity are greater (Basset *et al*, 2008; Edwards and Tsourou, 2006).

Urban planning has shown signs of returning to a healthier paradigm with several concepts emerging that incorporate health into urban planning principles. One such concept is 'active living' which encompasses elements of health with a specific emphasis on everyday physical activity through walking and cycling (Edwards and Tsourou, 2006). Active living is the core theme of this research and differs from physical activity, not only as it focuses more on passive exercise but also due to the specific design characteristics associated to it. Active living provides the link between addressing physical inactivity and the contribution urban planning can have.

Active living is a multi-sector agenda requiring advocacy within relevant organisations and agencies, and externally to policymakers (Giles-Corti and Whitzman, 2012). Due to the multi-sectoral dimension to active living there are more opportunities for cross-sector collaboration

with strong partnerships being key to the successful delivery of active living principles (ibid). Yet, as there is no 'blueprint' for how to embed active living into planning, there remains a strong suspicion that local plans and related policy documents are not taking the active living concept, or even health more generally, on board and lack political support (Kurth *et al*, 2015; Barton *et al*, 2013). If active living research is to be reflected into policy and practice, partnerships between policymakers and practitioners is vital (Giles-Corti and Whitzman, 2012).

This introductory chapter provides an overview of the historical and conceptual background to active living in the United Kingdom (UK); which is further elaborated upon in subsequent chapters and outlines the specific aim and objectives of the research. Firstly, the emergence of policy and academic interest in health is briefly outlined to provide a contextual overview to exploring active living in the 21st century. The role of the built environment in enabling active living and, more specifically, the role of planning in shaping such environments is subsequently explored in the following section. Together these discussions highlight the need for leadership, effective governance and collaboration, and the need for more research in this area, and thus provide the overall rationale for the study. The overarching aim and corresponding research objectives are consequently outlined. The research methods are summarised before an outline of the thesis chapters is presented.

1.2 'Health': an evolving concept

A brief overview of the history of public health in the UK begins with Edwin Chadwick, c.1832-1854. Chadwick revolutionised public health by suggesting that acute infectious diseases were caused by poor drainage which resulted in contaminated air. In 1839 he explored remedies in policy and technology in England, Wales and Scotland, and in 1842 produced a report which broadened the original scope that insanitary conditions not only caused biological disease but also social problems, such as alcoholism. In 1845 the need for public health reform resulted in legislation for universal constant water supply, networks of sewers and

recycling of wastes (Hamlin and Sheard, 1998). It was claimed that 'if central government could not create health, it could enforce standards and could, through legal, financial, and technical structures, facilitate and guide the local self-determination that would improve health' (Hamlin and Sheard, 1998, p.317). This is significant as a state of physical health cannot be created at governmental level, rather actions and measures are required to encourage certain behaviours and improve health. The triumph of Chadwick set the foundation for planners, engineers and other successors to achieve what is now regarded as adequate sanitation. In 1848 public health explicitly surfaced as a result of 'The Public Health Act 1848'. Further Acts, notably 'The Public Health Act 1875', directly responded to unclean urban conditions with a significant portion of the legislation emphasising the role of urban environments.

Winslow (1920: p.23-32) defined public health as:

> the science and art of preventing disease, prolonging life, and promoting physical health and efficiency through organized efforts…and informed choices of society, organizations, public and private, communities and individuals.

Winslow (1920) recognised the importance of public health being a collective effort including both individual and organised responsibilities to not only improve health but prevent ill-health. The emphasis he placed on governance, public and private sector relationships, was presented as being vital for the effectiveness of 'preventative medicine'.

In 1946 the definition of 'health' was regarded as a major breakthrough in the twentieth century as it challenged the idea that health policy is only a matter for health care systems, but rather it is a goal many professions and agencies have responsibility for (Barton and Tsourou, 2000). This echoed Winslow's depiction of public health: multifaceted and cross-sectoral. In addition, it also reflected Winslow's public health definition by including the importance of physical health within societies. Health, as defined by World Health Organisation (WHO), is:

> a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity. (WHO, 1946, p.100)

Although well received, the health definition did not come without challenges. One challenge was the inclusion of 'wellbeing' and the condition of 'complete' wellbeing (impossible to measure) and the concept of health being synonymous. Wellbeing is closely linked and often used in tandem with health, although the concept is wrought with ambiguity and is considerably more insubstantial compared to the concise definition given to health (Ellis, 2016). Two main elements have been suggested in the hopes of simplifying wellbeing as 'feeling good and functioning well' which goes beyond health in that it relates to feelings of happiness, sense of purpose and control (Aked *et al*, 2008*)*. Whilst not explored in detail within this research, 'wellbeing' is increasingly incorporated within statutory legislation within the UK.

Throughout the twentieth century infectious communicable diseases which were so rampant during the industrial revolution significantly decreased. A dichotomy emerged from communicable diseases to non-communicable diseases (NCDs) predominantly as a result of an increase in smoking and obesity (Beaglehole *et al*, 2011). Both smoking and obesity are associated to chronic illnesses such as cancers, chronic heart disease and diabetes. According to WHO, NCDs kill 40 million people a year, which translates to 70% of all deaths globally. This figure increases to 86% in the UK. Type 2 diabetes alone, a result from obesity, has been suggested to have the capability to bankrupt the NHS with 3.8 million people suffering from the illness in England and costing 10% of the NHS budget (Kanavos *et al*, 2012). The demonstrable scale of the "NCD epidemic", in its cost to society and the burden on individuals, is significant and a major problem which requires action (Fenton, 2014).

Physical inactivity is listed amongst other harmful lifestyle choices such as smoking and harmful use of alcohol, all of which are largely preventable but present major health problems globally (WHO, 2017; Townsend *et al,* 2015). Concurrently, the original ideologies of public health shifted from Chadwick's movement to 'germ theory', resulting in public health research being investigated in laboratories as opposed to urban infrastructure (Corburn, 2004). Post-

World War II, most medical advancements were towards hospital-based services and away from the built environment consequently ignoring the social dimensions of disease which Chadwick initiated (Kidd, 2007).

In recent decades health has again been reflected upon in relation to wider determinants. This was initially presented in Whitehead and Dahlgren's (1991) much-quoted diagram which illustrated the relationship between health and the physical/economic/social environment and was further developed by Barton and Grant (2005) (Figure 1.1). It has been widely adopted by health agencies, researchers and, most notably, by the WHO Healthy Cities programme (Barton, 2005). Consequently, physical health has been historically linked to overarching responsibilities and determinants, yet it was almost fifty years after the health definition when health re-emerged as being influenced by certain aspects of the built environment. Health and urban planning being re-knitted together once again.

Figure 1.1 best illustrates how the urban development process, the design and planning of settlements, reside in one sphere – the built environment (Barton and Grant, 2006). The diagram is strongly inspired by the urban planning discipline, as well as the social determinants of health and the principles of human ecology. It emphasises the relationship between the built environment (places, streets, routes); activities (moving and living) and lifestyle (physical activity). Here, human activities are described as the 'lifeblood of the settlement' (Barton, 2005: 15). Consequently, it encapsulates all the core elements of the research in one paradigm and illustrates how planning has a direct influence in the design, construction and management of the built environment. Furthermore, the model was also deliberately composed to provide a focus for cross-professional collaboration which demonstrates the significance placed on spanning professional boundaries. This constructs a strong basis for active living research and professional responsibilities in creating built environments which can influence physical activity.

Figure 1.1: The determinants of health and wellbeing in our neighbourhoods

Source: Barton and Grant, 2006

1.3 Research Rationale: consequences of inactive living

Inactive lifestyles can have significant impacts on personal health. With the increased dependence on motorised travel, very few use their bodies for active forms of transportation, such as walking. Lifestyles which consist of high levels of physical inactivity have been explicitly linked to chronic diseases. Furthermore, medical studies have proven physical inactivity to be 'an actual cause of chronic diseases' (Booth *et al*, 2008: 381) (see also: Blair *et al*. 1993; Mokdad *et al*. 2004). Physical inactivity and the environment have been listed as one of the four main areas which contribute to obesity, amongst individual food consumption, societal influences and genetics (PHE, 2016).

Nearly 30% of the global population are overweight or obese, almost two and a half times the number of adults and children that are undernourished (WHO, 2016). Obesity is the second highest cause of morbidity in the UK and third highest globally, seemingly having more prevalence within areas of higher deprivation, amongst low-socioeconomic groups and

inequalities in general (Loring and Robertson, 2014). 15% of health care cost in developed economies are burdened by obesity and if it continues in its current trajectory almost half of the world's population will be obese or overweight by 2030 (Dobbs *et al*, 2014). Therefore, it is not only important to attain individual health but also to achieve healthy environments through society and economies to decrease the obesity trajectory. This can be achieved by planning policies encouraging healthier environments which facilitate healthy and more physically active choices (Leppo *et al*, 2013).

Health challenges associated to smoking is evidence of political commitment to tackling a public health concern and effective change in legalisation. In 2006-2007 (UK) smoking was banned as a direct consequence of the Health Act 2006 in almost all work and public spaces. Reports prior to this, such as 'Report of the Scientific Committee on Tobacco and Health 1998' (The 1st SCOTH Report), 'Smoking Kills: A Government White Paper on Smoking' (Pub. 1998), 'Choosing Health: The Governmental White Paper on Public Health Issues' (2004), and many more, substantiated that smoking and second hand smoke can cause smoking related diseases, such as cancer. There has also been a substantial amount of other measures taken regarding smoking (and alcohol) such as increased taxation, education, enforcement laws and advertising. However, research carried out by Stern (2001, 2002) revealed that obesity is the most serious health problem, linked to much higher rates of chronic illness when compared to smoking and drinking. Pockets of intervention have been introduced but efforts to address the obesity crisis have been piecemeal and lack integration across the board. Tangible outcomes in tackling obesity are in serious need yet little (especially at a statutory level) is being done to effectively address its significant rise (PHE, 2017). Now that various successful policy interventions have been developed relating to smoking and alcohol consumption it is clear that collaborative networks are proving effective and increasing in popularity for resolving complex issues. Those involved in the planning process should be required to connect, collaborate and collectively lead a new frontier to complex and multi-faceted issues relating to active living (Carmona, 2016).

Hippocrates (born c.460 BC) was a Greek Philosopher who studied the natural history of disease and based his principles on empiricism and application (Batty Tuke, 1911). Coined the “Father of Medicine” he predicted that ‘All parts of the body, if used in moderation and exercised in labours to which each is accustomed, become thereby healthy and well developed and age slowly’. He continued that if the human body is unused and left idle, they become liable to disease (Kokkinos and Myers, 2010). Over fifteen hundred years later, Hippocrates’ thoughts on inactivity still resonate (PHE, 2016; Townsend *et al*, 2015). It is firmly acknowledged that inactive lifestyles do not only contribute to obesity rates but additionally exacerbate problems of unemployment, early retirement, social welfare costs, social isolation and environmental concerns such as air quality (Schrempft *et al*, 2019; NICE, 2013). However, the rationale for this study is based on the premise that inactive lifestyles result in serious public health challenges and chronic diseases, most notably in relation to obesity.

The focus on utilitarian exercise is fundamental to this research as it relates directly to the unintentional, passive, element of physical activity and is clearly distinguishable from recreational exercise, being easier to build into daily routines and maintain over time (Frumkin *et al*, 2004). This validates why research into active living is so important as it places emphasis on using physical activity as a form of transportation in everyday life which can be achieved by implementing specific design characteristics which encourage active lifestyles. More research into practice, along with documented outcomes, is needed to ensure that the importance of physical activity is recognised and endorsed across all sectors and that it is equally included in health promotion recommendations and policies (Economos, 2014). Typically, there is inadequate scientific evidence to support decisions regarding health when it comes to planning, design, and development. Instead, there is a reliance on past practice, political pressure and professional hunch (Barton, 2005). Poor decisions regarding the built environment can hinder people from exercising, having counterproductive influences on public health (Harvard, 2013).

Whilst increased academic attention has enhanced awareness and appreciation of the relationship between health and the built environment there remains a relative lack of knowledge and understanding pertaining to the priority that is awarded to it within policy and practice. This indicates that there could be a gap between policy and practices and consequently the end-product, being the built environment. The result is that unhealthy built environments are being built into the physical fabric of human settlements (Barton, 2015). A research focus into policy, collaborative processes and inter-professional working allows for an interrogation of why gaps between policy and practice, in relation to active living, occur and whether this can be addressed.

1.4 Built Environment and Active Living: a policy and political vacuum?

Built environments have changed drastically within the last century, from compact walkable communities, often with a central business district, to lower density urban areas with segregated land uses and extensive roadway constructions (Dearry, 2004). Interestingly, the change in built environments occurred concurrently to a shift in public health concerns from communicable to non-communicable diseases. The built environment now supports increased accessibility to car ownership and the development of motorways has resulted in suburbanisation, suburban sprawl and a higher dependence on motorised transport. Suburban sprawl caters for car dependence as it allows people to live longer distances from town centres, workplaces, schools and other services (Burbridge *et al,* 2006). Consensus statements and government reports now acknowledge the influence the built environment has on health, especially with regards to physical activity (Jackson *et al*, 2013).

The term ‘built environment’ distinguishes between the aspects of a person’s surroundings which are manmade as opposed to those which are natural and made up of objective and subjective features in a physical setting (Papas *et al*, 2007; Davison and Lawson, 2006). This includes land-use patterns, buildings, spaces and other elements that are the product of human activity (Lamprecht, 2016; Ellis, 2013; Edwards and Tsouros, 2006). The layout and

design of buildings, and spaces around buildings, can either encourage or hinder how people move, predominantly through walking and cycling (Ballantyne and Blackshaw, 2014). For example, in older cities, residences are often above ground-floor retail which is more convenient for walking. The segregation of land uses associated with urban sprawl results in environments where it is difficult to use physical activity to access different locations, and car reliance is often necessary (Saelens *et al*, 2003). This illustrates a contrast between high density, mixed land uses, against low density single land use, and its impact on movement due to two key factors, proximity and connectivity (Lawrence and Low, 1990; Papas *et al*, 2007).

In this regard, the built environment requires a need to consider health when shaping the urban fabric if it is to influence activity levels by integrating land-uses and public transport and having a variety of open spaces and recreational spaces, providing infrastructure that supports walking and cycling (Kent and Thompson, 2012). Therefore, it is crucial, now more than ever, that professionals within the built environment understand how they can impact physical activity in practice and deliver active living outcomes. This is not a straightforward feat and challenges arise throughout the development process due to it being deeply politicised. Additionally, many professional perspectives work together consisting of a collection of heterogeneous fields such as architecture, planning, property development, surveying, design, policy, engineering and transport (Allmendinger and Haughton, 2010; Griffiths, 2004). Each profession must represent the different values, beliefs and behaviours adding to the complexities of collaborative processes (Naidoo and Wills, 2008)

A key element of this research focuses on creating greater understanding of how different built environment professions approach and operationalise ‘active living’, and it aims to appraise the inter-professional dynamics through collaborative working for advancing the built environment products of active living. Hence, there is a need for leadership and increased research and policy and political attention for effective collaboration and action. Governments

can provide such leadership by setting the example and implementing support mechanisms for all sectors to become part of the action towards health concerns. This includes encouraging and endorsing multi-sectoral response, developing and, most importantly, implementing policies, improving funding to help minimalize environments that contribute to physical inactivity and promoting active living (Swinburn, 2008). Through planning policy and the planning process, urban planners have a significant role to play in influencing healthy, active built environments.

Urban planning refers to the institutionalised process of making decisions about the future use and character of land and buildings in city regions (Barton and Tsourou, 2000). Urban planning is unique in that it has traditionally borrowed theories from other specialisms and attempted to translate them spatially. Planning practitioners are largely responsible for shaping the urban environment in a way that is sustainable, equitable and efficient by focusing on development management, policy and spatial planning (Pineo *et al*, 2019; Freeman, 2006). Planning policies have significant impact on everyday lives as they shape, influence and regulate the built environment in which societies live, work and socialise. Currently policies and physical environments are encouraging inactivity as they can limit development densities and land use, often zoning land with one use, and parking supply is often implemented through policy regardless of whether there is a demand which further encourages car usage (Litman, 2015; Blais, 2010). Many planners recognise the need to improve contemporary planning practices, however, planners are uncertain how to appropriately and effectively instigate change as contemporary practices tend to focus on economic development. The result of planning having a core focus on economic development is less emphasis placed on health, quality of life and neighbourhood dynamics (Ellis, 2016).

Many transport policies favour the use of private vehicles over alternative means, giving little consideration to active transport, instead evaluating transport system performance based on motor vehicle travel conditions and other factors catered towards private vehicles (DeRobertis

et al, 2014). Furthermore, data gathered regarding public transit, walking and cycling is often poor (regarding sample sizes and incomplete data) which makes policy recommendations based on data difficult and misleading. As a result, transport planning regularly associates their practice to what benefits motorists, widening roadways to tackle delays and congestion for example. These outcomes are seldom intended. Nevertheless, evidence demonstrates that in terms of promoting health into planning, governments have had little effectiveness and physical activity by active travel is decreasing (DfE, 2017; Carmichael, 2012). Therefore, urban planning provides the link between the built environment and health, as it draws together dimensions from both fields with the aim of improving and promoting human flourishment, through planning for human health. Although, within the day-to-day milieu of competing professional agendas, the explicit recognition of health has been buried deep, demoted to an 'invisible and unidentified pursuit…diminishing its importance' (Kent and Thompson, 2012, p.3). Yet, if the political process is done correctly, goals and objectives will be identified, actions will be established and many stakeholders will be involved to set specific policy outcomes to combat the serious health concerns growing within societies (Breton and De Leeuw, 2010).

Active living encompasses elements of health with a specific emphasis on everyday physical activity. Although difficult to source, it is believed that this concept first emerged in the health field, in a 1996 report entitled 'Physical Activity and Health: a report of the surgeon general' as it makes many references to 'active lifestyles'. Since then, the concept was introduced as a core theme in phase IV of the European Healthy Cities Network (EHCN) and within Healthy Urban Planning (HUP) (see Chapter Two). Active living is defined as:

> …a way of life that integrates physical activity into daily routines (Edwards and Tsouros, 2006: 3).

Lefebvre (2014) elaborates on active living proclaiming that it brings together many professionals, such as urban planners, architects, transportation engineers, public health

professionals and other professionals to build places that encourage active living and physical activity. Active living neatly tailors the built environment elements relating to obesity and physical activity together, and studies demonstrate that this concept can have significant benefits to societies. 40 years ago, Copenhagen had a vision of increasing the rate of cycling as it can be an integral part of infrastructure and one which directly improves the quality of life. The rewards of this vision made Copenhagen one of the most liveable cities in the world (DTU, 2016; City of Copenhagen, 2012). Walking and cycling, which has a positive impact on health, also have an impact on economic and environmental benefits and less strain on health services. The cost of no reaction to proactively endorse healthier environments is starting to mount up with car dominated and unhealthy societies.

Research, into neighbourhood characteristics comparison and correlations with nonmotorized transport, suggests that residents living in communities with higher densities, with greater connectivity and more land use mix report higher rates of walking and cycling for utilitarian purposes compared to areas of lower density that are poorly connected and with single land uses (Saelens *et al*, 2003). The evidence for active living is projected to not only be considered as a key contributor in obesity prevention by increasing physical activity, but can help support local businesses, reducing car travel, fuel emissions and road danger. Active living also influences the public realm by making it more appealing which results in having increased numbers in public places and opportunities for social interactions and inclusion (PHE, 2013).

Active living has since featured throughout urban planning, as well as public health, medical and ecological literature and cross references between disciplines, and the wider elements of determinants of health, are well established. The caveat lies within practice and implementation as there is still no ‘blueprint’ for how to embed health, and healthier concepts, into planning (Kurth *et al*, 2015). Collaboration is imperative to delivering more physically active environments, yet, despite the known benefits regarding active living there remains a

significant gap between research, policy and practice (Kent and Thompson, 2012; Buck and Gregory, 2013; Giles-Corti *et al*, 2015). Tangible outcomes are in serious need.

1.5 Research Aim and Objectives

The overarching aim of this research is:

To critically investigate the contribution of built environment policy and practices for promoting 'active living' outcomes

The corresponding objectives are:

1. To explore the relationship between active living and healthy urban planning;
2. To examine the policy discourse around the provenance of active living in particular professional and geographical contexts;
3. To critically observe to what extent built environment attributes at a neighbourhood level promote active living;
4. To investigate the dynamics across professional cultures and practices in the delivery of active living environments;
5. To advance knowledge and understandings around practice, process and product that help deliver active living outcomes.

1.6 Research Methods Overview

A research framework was developed to fulfil the research aim and objectives. An epistemological position of social constructionism and a qualitative research paradigm were adopted. A social constructionist epistemology provides insight into how planning, and other, practices are part of social dynamics, knowledge systems, cultural expressions and values (Van den Broeck, 2015). This allows for a critical investigation into the professional understandings of policy, product, practice and processes. The qualitative research paradigm must correlate with this position and subsequently an interpretivist social science stance was

incorporated. This, along with symbolic interactionism (a branch of interpretivist social science research) provides the core logic to the research methodology; Case Study Research (CSR). CSR is a qualitative methodological design which develops an in-depth understanding of 'the case' and relies on specific research methods; principally interviews, field observations and documents (Yin, 2003). Primary and secondary data sources were used for the empirical research. The primary data sources consisted of a hybrid of semi-structured interviews and field observational research. Secondary data sources consisted of a policy critique. The research framework is discussed in detail in Chapter Three.

1.7 Thesis Structure

Chapter Two begins by looking at the relationship between health and urban planning in more detail before drawing attention to the tailored themes drawn out of the literature surrounding Healthy Urban Planning; active living environments; governance and; collaboration and leadership. The chapter emphasises the role professionals have in the delivery of active living as well as the professional cultures of built environment professionals.

Chapter Three consists of the research framework which was used as the foundation for the empirical studies carried out. The framework undertook the epistemological position of social constructionism and a research design encapsulated within interpretivism. It then develops the three approaches of the empirical work; a policy critique; field observations and; semi-structured interviews with built environment professionals.

Chapter Four provides the bridge between the conceptual portion of the thesis to the empirical by encompassing the research in a geographical context, Northern Ireland. This chapter begins by unpacking the evolving governance landscape of the UK before focusing on the planning reform which took place in Northern Ireland as part of the Review of Public Administration (RPA). Then, the policy context is considered as well as other projects and initiatives within Northern Ireland, critically setting up the context for the following chapters.

Chapter Five begins the empirical portion of the research and combines a Northern Irish planning policy critique together with the data obtained from the interviews of the empirical research. It is divided into two sections firstly; tackling the deep policy domain in Northern Ireland and critiquing through the lens of active living and secondly; addressing the potential of a policy-practice gap in relation to active living.

Chapter Six presents the field observations, four areas in total within Belfast, two in areas of high deprivation and two in areas of low deprivation. This allows for a cross-case comparison and an assessment of how each area scored in a bespoke active living checklist. Subsequently, the reoccurring projects and initiatives emphasised throughout the interview process will be addressed, as they largely focused specifically on active living and the challenges and benefits are assessed.

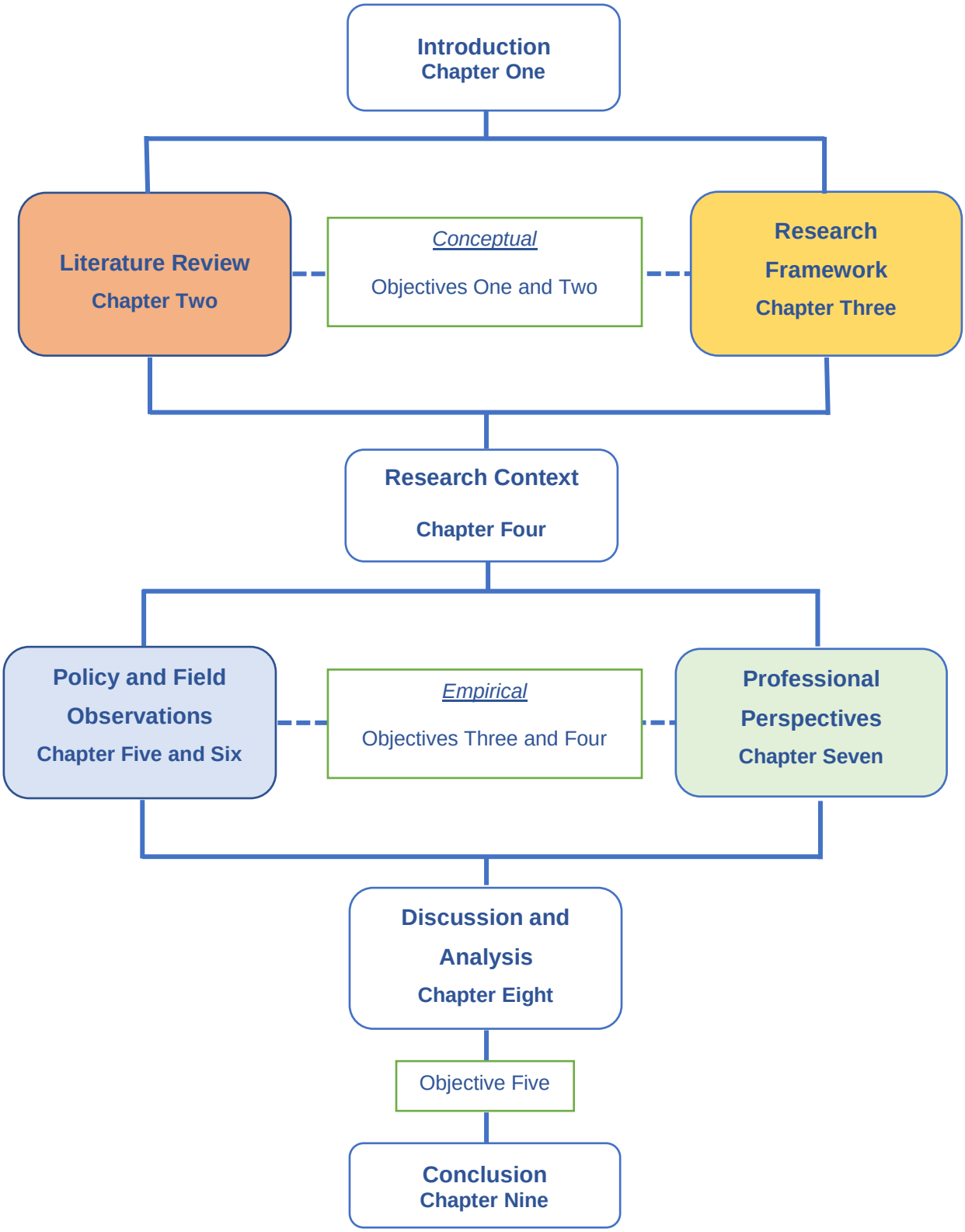
Chapter Seven solely focuses on the data obtained from the interviews, and first considers the practices of professionals, which have been defined as professional cultures. Here, professional perspectives on their own profession, on other professions and on active living are deeply considered. Following this, the professional perspectives of the planning process and the collaboration processes are interpreted, hence, concluding the empirical study.

Chapter Eight then extrapolates all the previous chapters together in one chapter in a discussion and analysis. It encompasses the entire findings and analysis of the thesis, aligning the conceptual chapters with the empirical, demonstrating the validation and divergence between the literature and empirical research.

Finally, Chapter Nine concludes the thesis by signifying how the aim and research objectives have been achieved, the contributions to knowledge and also providing recommendations to help in the delivery of active living outcomes. The structure of the thesis is illustrated in Figure 1.2.

Figure 1.2: Thesis structure relating to the research objectives.

Source: Author's own



1.8 Conclusion

Health is a fundamental right (WHO, 2017). Built environments which encourage physical inactivity have been explicitly linked to contributing to serious societal concerns and public health issues like obesity. There is potential for planning systems to directly promote physical activity but alongside this crisis there is an unwillingness from political and statutory authorities to meaningfully respond (Ellis, 2016). If healthier decision-making is not implemented within the development process physical inactivity levels will continue to increase and societies will become more unhealthy. This could be achieved through the principles of Healthy Urban Planning, although if health is to be taken seriously there must be an explicit focus to increase physical activity and collaborative effort. Active living specifically addresses these elements and as such is the core theme of the research. Less emphasis needs to be placed on roads and infrastructure and more on embedding health back into basic decision making. With all the recognition of healthy environments and the growing understanding of moving away from traditional silo mentalities health is still considered a secondary issue in urban planning which is exacerbated by a lack of political support (Kurth *et al*, 2015; Tsouros, 2015; Barton *et al*, 2013). The research in the following chapters has been investigated through a planning perspective, although, it has been determined that planning procedures cannot simply work alone to achieve healthy built environments. Rather, it is a network of governance and relationships which make such efforts achievable. The exploration into the body of knowledge will help identify the gaps within the phenomenon of active living which can then, in turn, inform the methodology of the research.

Chapter Two: Health and Urban Planning

2.1 Introduction

Many urban environments tend not to be designed in a way which facilitates healthy behaviours (Perdue *et al*, 2003). To nurture healthier behaviours and environments requires input from multiple stakeholders. It is imperative to examine how professionals can influence lifestyle choices, particularly through physical activity, by working together in collaboration (Kent and Thompson, 2012). In practice, collaborative processes vary drastically. Public services, such as health, education, welfare and social services, in the UK are funded in silos and a lack of effective engagement has resulted in a limited understanding of potential opportunities from other sectors (Gilroy and Tewdwr-Jones, 2015). Each sector is becoming ever more comfortable with their specific and separate responsibilities resulting in a lack of, and unwillingness to, collaborate. These systems are failing. Spatial planning seeks to order and regulate land use in an efficient and ethical way and has a key role to play in the design and development of built environments which are more conducive to healthy living. Enhancing the relationship between health and planning has the potential to provide for societal, environmental and economic benefits. Despite increased academic and policy recognition of the importance of this relationship, questions arise as to the extent to which this happens in practice.

This chapter will provide an overview of the history between health and urban planning, then the conceptual themes which emerged throughout the introduction will be addressed in more detail. The themes to be addressed, which were overarching areas drawn out from the literature, are Healthy Urban Planning; Active Living Environments; Governance, and Collaboration and Leadership. Deeper considerations regarding health when making decisions regarding the built environment are vital in addressing contemporary public health concerns, such as the physical inactivity epidemic (Crist et al, 2018; Elbakidze et al, 2015). Yet, planning and development processes are highly politicised and political ideologies

generate power dynamics that can impact on professional decision-making (Gaffikiin *et al*, 2016). Through the lens of active living, this chapter expands on the conceptual topics to the research, exploring the body of knowledge within the research area and identifying a gap which the thesis aims to address.

2.2 Origins of Health and Planning: an overview

Health and planning have had a long, albeit, tenuous relationship. The increase in population during the nineteenth century in the UK caused significant public health problems which necessitated a call for the government to respond. As early as the 1830s, unhealthy living conditions were being recognised, characterised by overcrowded, insanitary conditions that not only harboured disease and illness, such as cholera and typhoid, but also added to economic costs and social unrest, similar to contemporary health challenges (Freestone and Wheeler, 2015). Such conditions led to an increased appreciation of the necessity to govern new urban growth with public health emerging as a central consideration (Cullingworth and Nadin, 2006). The late nineteenth century and early twentieth century produced building bye-laws, specifically targeting sanitation and ventilation to secure healthier living conditions. These early interventions laid the foundation of 'modern planning' where the provenance of the relationship between public health and the built environment commenced.

In parallel, early urban thinkers also began to respond to poor urban living conditions. Ebenezer Howard's Garden City Movement, circa late 1800s, was an urban planning concept which envisioned fusion between the best of town and country characteristics in new urban developments and provided an alternative to crowded, unhealthy cities. His utopian ideas were, and remain, highly influential on suburban design. By the end of the nineteenth century, the Movement was stimulating the creation of healthier urban places (Grant, 2014). Garden Cities were considered one of the first models unifying health and planning professionals (Kidd, 2007). Building on the work of Howard, Patrick Geddes, brought together theoretical influences across biology, sociology and geography, and envisioned regional planning as a

way to decongest the large metropolis and inspire healthier development (Duhl and Sanchez, 1999). Howard and Geddes, offering inspirational leadership, were seminal in pioneering healthy urban planning. The aforementioned regulations and Movements were instrumental at a time when land use planning was in its infancy, predating the Town and Country Act, 1947.

The Town and Country Act 1947 nationalised development rights, requiring planning permission for the development of land for new uses, offering planning professionals greater powers to nurture healthier developments in the public interest. The prominence given to planning during this post-war period was also embodied in the formation of the Ministry of Town and Country Planning, circa 1943 (Cullingworth and Nadin, 2006), but, arguably, was created at the expense of planning responsibilities being removed from the Department of Health. Consequently, planning was to be operationalised separately. Planning has since tended to narrowly focus on land use management and taxation, and in isolation to health matters of the population. Public health thinking and practice gravitated towards medical advancements and shifted more power and investment towards hospital-based services (Kidd, 2007). Undeniably, such detachment and insularism seriously weakened the relationship between both professions. Since then, education, health, development and many other sectors have been separated from one another, giving rise to a *silo mentality*, and as a consequence demonstrating the importance of departmental structuring and the impact that restructuring can have (Corbin, 2005). This restructuring, although well-intended, incongruously, coincided with the public health breakthrough of the World Health Organisation releasing their definition of health, in the 1946 International Health Conference, declaring that health is not only the responsibility of health professionals but requires collaborative efforts.

Throughout the twentieth century, international events provided a catalyst for rekindling the relationship between health and the built environment. Though, planning initially remained

marginalised. The 1978 International Conference on Primary Health Care in Alma-Ata[1] , resulted in the formulation of the ground-breaking Declaration of Alma-Ata, which proclaimed health as a fundamental human right, acknowledged health responsibilities beyond the health sector and unequivocally endorsed intersectoral collaboration as central to addressing health inequalities (Corbin, 2005). The Declaration provided the foundation for health promotion and formalising a commitment to a *Health for All* strategy, agreed by 134 nations. The European Union member states adopted "38 Health for All targets" (including Target 2: Developing Health Potential and Target 18: Multisectoral Policies) which defined the goals of the initiative. Although this did not relate specifically to the built environment, it did influence the later *Healthy Cities* initiative (Kickbusch, 2003). Unfortunately, the Declaration's primary goals were not achieved due to lack of sustained political commitment and issues of governance and corruption (Braveman and Tarimo, 2002; Hall and Taylor, 2003).

The 1986 International Conference on Health Promotion in Ottawa, Canada, was a fundamental step for re-establishing the relationship between the built environment and health (Fry and Zask, 2016). The conference focussed specifically on the need to develop physical and social environments to support health promotion through infrastructure provision, programmes, and services at structural, social and personal levels and aligning to the WHO's 1946 definition of health. Emphasis was placed on positioning health higher on social, economic and political agendas. The conference recognised the importance of political commitment after the failings from Alma-Ata Declaration 1978[2]. Acknowledging the rapidly changing urban environment, one of the key strategies emerging from the conference was the need to 'Create Supportive Environments', which affirmed the inextricable links between people and their environment and called for a socioecological approach to health, emulating

[1] The conference was located in Union of Soviet Socialist Republics (USSR) and organised by WHO and the United Nations Children's Fund (UNICEF).

[2] This was also later bolstered by the Milan Declaration (1990) which specifically recognised the need for political commitment to health, stating: 'We, the mayors and senior political representatives…pledge our political support for healthy public policies and the creation of supportive environments' (The Milan Declaration of Healthy Cities, 1990) seemingly verifying that health promotion now had a strong political backing.

the philosophies of early urban thinkers, e.g. Howard and Geddes. During this time, a new environmental consciousness was emerging, cumulating in The United Nations' 1987 *Our Common Future,* published by the Brundtland Commission, which framed economic development within a wider conceptualisation of sustainable development. The Brundtland Commission recognised the interrelationships between economic growth, environmental protection and social equality, contributing to the overall idea of sustainable development defined as:

> development that meets the needs of the present without compromising the ability of future generations to meet their own needs (United Nations General Assembly, 1987, p. 43).

Arguably, as time has passed and growing empirical evidence indicates, many countries have tended to prioritise economic growth over efforts to significantly improve social and environmental wellbeing.

In progressing a discourse that combined social, environmental and economic wellbeing, the 1988 European Healthy Cities Network[3] (EHCN) aimed to further elevate health on the social, economic and political agendas, but importantly recognised a greater need for stronger engagement between central and local government. The EHCN emphasised the importance of how politically supported processes, institutional change, capacity-building and partnership-based planning can better enable health development (WHO, 2015). A Healthy City is defined by the EHCN as one 'that is engaged in a process of creating, expanding and improving those physical and social environments…which enable people to mutually support each other in performing all the functions of life and developing to their maximum potential'' (Hancock and Duhl, 1986: 41). In this regard, a healthy city may be seen as one which continually creates and improves opportunities for its citizens to become more physically active (Edwards and Tsouros, 2008). Conceptually, a healthy city may be interpreted differently according to

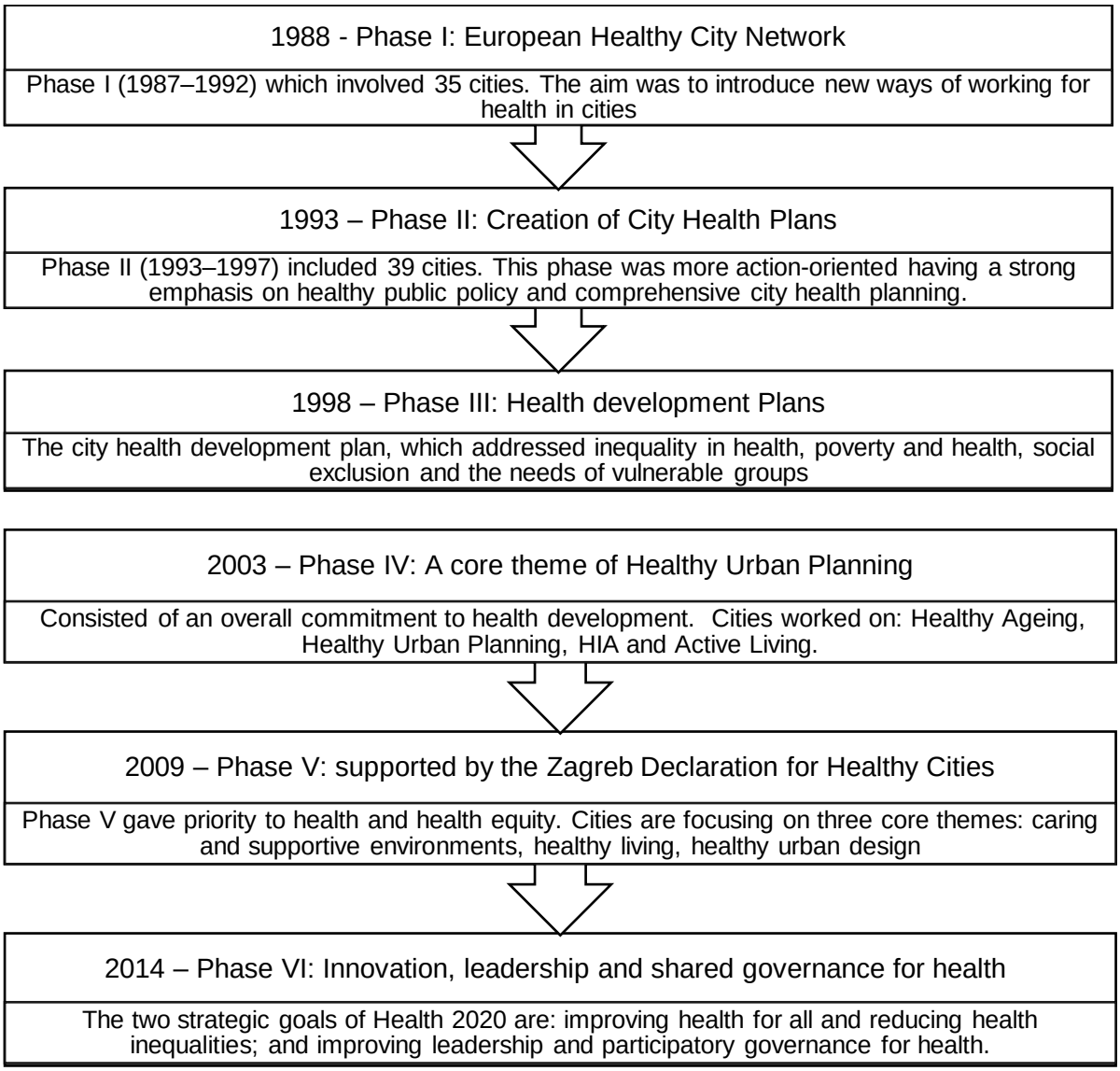
[3] The 1988 Healthy Cities Network was an output from the 1986 Ottawa International Conference involving thirty-five cities with the goal of introducing new ways of incorporating health into urban development.

interests, training, culture and values. Hence it is broad in nature, incorporating ideas from fields of geography, sociology, philosophy and more.

The European Healthy City Network acknowledged how local governments are in a special position of power which enables them the means to protect and promote health and wellbeing. Health affects every citizen and by addressing health inequalities, participatory governance and the determinants of health the EHCN hoped to improve the health of local urban populations by introducing new ways of approaching the improvement of health outcomes in urban contexts (WHO, 2015). The EHCN was divided into five-year phases with each phase focuses on core priority themes. Phase I commenced in 1988, although explicit links to planning through the concept of *healthy urban planning* did not emerge until Phase IV in 2003, along with *active living* (Figure 2.1).

Figure 2.1: The Phases of the World Health Organisation's Healthy City Movement.

Source: Author's own

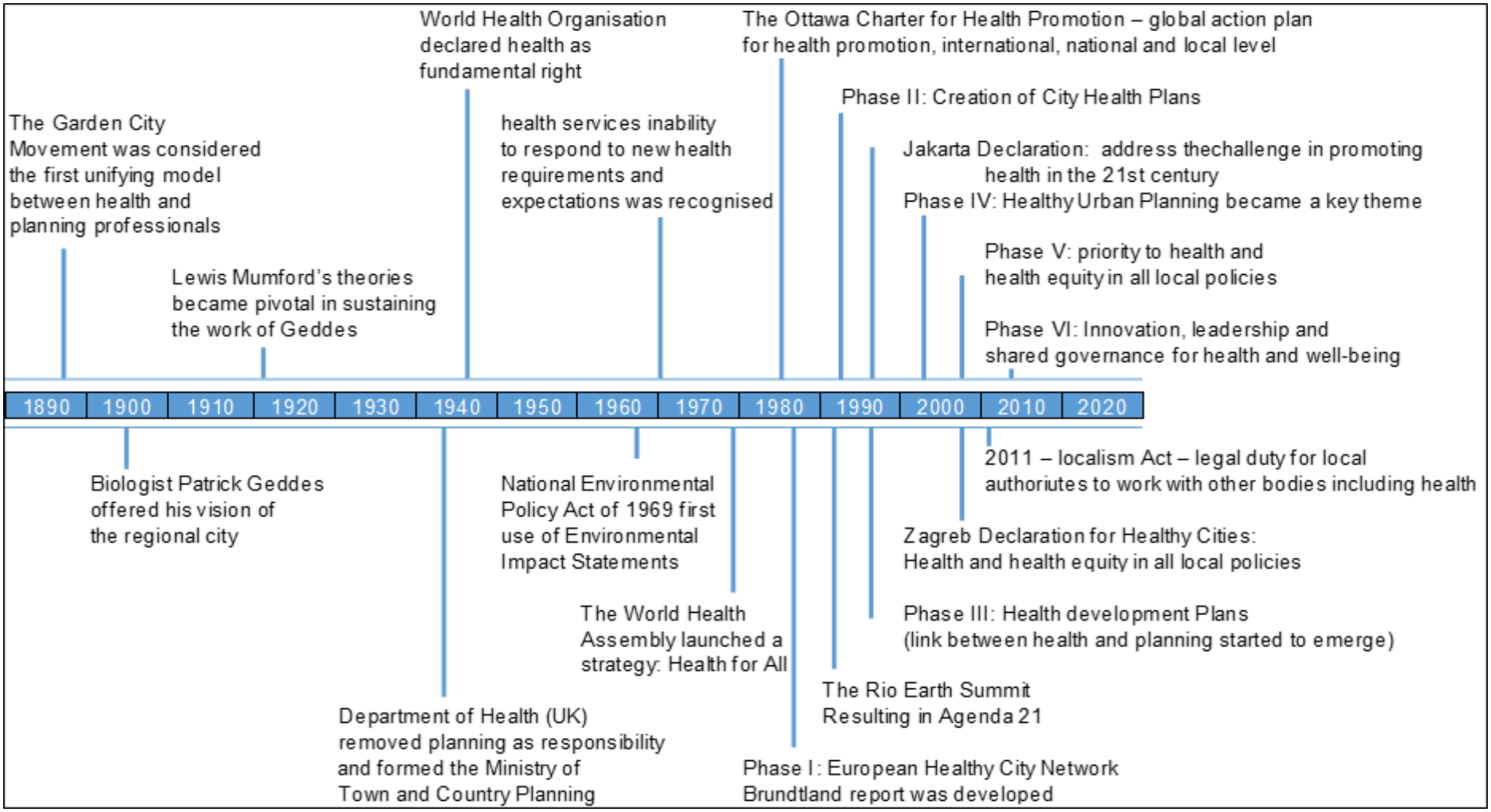


Healthy urban planning was the result of a collaborative effort between the Centre for Urban Health, WHO Regional Office Europe, WHO Collaborating Centre for Healthy Cities and Urban Policy at the University of the West of England, Bristol (Barton and Tsourou, 2000). An exemplary case of practice/academic collaboration providing the commentary for healthy planning practice for almost two decades. However, there remains a strong suspicion (supported by extensive non-systematic evidence) that local plans and related policy documents are not taking health on board and lack significant political support (Barton *et al*,

2013). Key decisions from politicians, developers, as well as professionals still treat health as a secondary issue (Tsouros, 2015).

The WHO European Healthy City Network and the emergence of *healthy urban planning* (as discussed in the following section) reinvigorated the relationship between health and urban planning, and initiated momentum within the public health and planning fields. This is evident and summarised in Figure 2.2 which illustrates how utopian ideals (The Garden City) and international goals (Health for All) have shifted towards local policies and legislation. With the emergence of the EHCN momentum is also visible, as the health agenda was driven forward. The incremental changes demonstrate concerted efforts to tackle global health issues and how mechanisms and tools in tackling such issues have evolved over time. Yet, a common theme emerges, global goals are not being achieved. This raises questions about how professionals in a governance context can collaborate more meaningfully to deliver outcomes related to collective concerns surrounding healthier built environments which facilitate physical activity. The early movements, regulations and international events paved the way for *healthy urban planning* to emerge, however as greater urbanisation occurred, urban areas themselves transformed and evolved, contributing to contemporary health challenges.

Figure 2.2: Timeline of key planning and health milestones from the 19th Century to present day



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2.3 Healthy Urban Planning

This section addresses the concept of Healthy Urban Planning (HUP) which provides the conceptual framework to the thesis. HUP is a concept which evolved through the work of the EHCN and helped bring such principles to the forefront of urban planning. The concept:

> "highlights the importance of recognising the health implications of policy and practice in urban planning and the need to go one step further, by pursuing health objectives as a central part of urban planning work" (Barton and Tsourou, 2000: 1).

During the network's initial phases, there remained inadequate scientific evidence to back decisions regarding health concerning planners, designers and developers. Instead, reliance was placed on past practice, political pressure and professional hunch (Barton, 2005). It became crucial to obtain evidence on how health in planning could change people's quality of life (Takano, 2003). Consequently, professionals in the built environment began addressing the gravity of building unhealthy human environments and providing services through cooperation and partnership (Barton *et al*, 2015; Barton and Tsourou, 2001).

In 1998, WHO began working with urban planning professionals and academics and eventually published 'Healthy Urban Planning – A WHO Guide to Planning for People' (Barton and Tsourou, 2000) which made the case for health as a central goal of urban planning policy and practice, highlighting the relevance of the EHCN (Barton *et al*, 2003). This material was subject of the WHO Seminar on HUP in Milan which explored ways of driving the HUP initiative forward. It was not intended to be definitive or to provide a panacea, rather its intention was to stimulate and inform the debate on the overall concept. Phase III of the network (1998-2002) developed HUP principles and practices, whilst in Phase IV (2003–2008) HUP became a core theme and theoretical development was supported by a key text (Barton and Tsourou, 2000) and tested through the experience of cities within a thematic sub-network (Grant, 2015; Barton *et al*, 2003). The goal of HUP is to integrate health considerations deep into urban

planning processes and to establish the capacity required, along with political and institution commitment to achieve this (WHO, 2009). Since the mid-2000s, a consensus within the literature has grown on how urban environments can exacerbate or mitigate health outcomes and that not only personal factors play a role in determining health and again, emphasising the importance of policy, political and institutional processes (Barton, 2015; Grant, 2015). This must be sustained by leadership and be open to collaboration, reaching above and beyond the traditional boundaries and be prepared to engage, discuss and mediate amongst stakeholders. Integrating these duties with the public health responsibility for local government is critical (Chang and Ross, 2013). However, not only have councils taken on new public health and planning responsibilities, there have also been unprecedented cuts to budgets potentially hindering intended progress.

Healthy urban planning is associated heavily with the health map model (Figure 1.1) and how individuals, whilst at the centre, are surrounded by spheres of an abundance of other influencing factors. To elaborate, each sphere, or external influence, are elements that can be amenable to planning policy but in particular the built environment. The external influences of lifestyle may be affected by safety and quality of routes and density which may affect behaviours such as choosing to walk. Community influences comprise of the impact urban renewal may have on social networks, and local economy including availability of housing and work which can result in poor health. Planning policy even has considerable influence within the natural environment in air, water, climate and soil, some of which are critical to health (Barton, 2005).

Healthy urban planning may have come as a response to the limited success the EHCN had in involving urban planners during the 1990s. At that time planning practitioners even considered health incompatible with planning policies, especially with regards to the rigid standards of zoning and design, excessive levels of motorised transport and the overall lack of attention given to the everyday needs of citizens. A change of professional mindsets was

initiated through the concept of sustainable development which seemingly resonated more with urban planners across Europe. The concept, although emerging from the Brundtland Commission report came to the forefront of planning in 1992, through Agenda 21 a non-binding action plan. It was the product of the United Nations Conference on Environment and Development (UNCED), also known as Rio Summit and/or Earth Summit and led planners to consider issues of quality of life, wellbeing and ultimately, health in cities. Thus, health and sustainable development are intimately connected (Barton, 2005; Barton *et al*, 2003).

The Athens Declaration for Healthy Cities stated that 'health is promoted most effectively when agencies from many sectors work together and learn from each other' – however, intersectoral cooperation can be extremely difficult to achieve. Individuals may resist, motivated by their sectoral view of problems. HUP could potentially widen the scope of planning practice by introducing new concerns that impact on people's health and scholars have argued how conscious governance of the built environment could result in substantial health improvements (Hofstad, 2011). Yet, despite the increased attention to the links between health in planning, it is feared that neither the practice of planning, nor the policy of government, have fully recognized the intimacy of the connection between space and wellbeing (Crawford *et al*, 2010). The relative paucity between health and planning does not mean that they have not been linked in practice, rather that the link is implicit, not explicit, lacking a systematic or comprehensive approach (Barton *et al*, 2009)

Healthy Urban Planning (Barton and Tsourou, 2000), set guidelines for intersectoral cooperation in developing projects to help address the difficulties outlined above. 12 principles were agreed upon and provided a close parallel to sustainable development goals. These comprised:

1. promoting healthy lifestyles (especially regular exercise);
2. facilitating social cohesion and supportive social networks;
3. promoting access to good-quality housing;
4. promoting access to employment opportunities;

5. promoting accessibility to good-quality facilities (educational, cultural, leisure, retail and health care);
6. encouraging local food production and outlets for healthy food;
7. promoting safety and a sense of security;
8. promoting equity and the development of social capital;
9. promoting an attractive environment with acceptable noise levels and good air quality;
10. ensuring good water quality and healthy sanitation;
11. promoting the conservation and quality of land and mineral resources; and
12. reducing emissions that threaten climate stability.

Pioneer groups consisted of Milan, Gothenburg and Belfast who pursued a goal of health integrated design and planning. In Belfast this triggered a new engagement between local and national agencies who previously guarded their autonomy (Barton, 2005) demonstrating how HUP places collaboration at the centre of the decision-making process. This recognition is important as in most cases urban planning agencies are not necessarily the power responsible for factors relating to health objectives of urban planning and therefore, collaboration is essential (Barton and Tsourou, 2000). Research shows that public health practitioners find it hard to shift focus from their core activities to engage in planning processes, and planning for health, and that successful cooperation between planning and health departments is rare as a consequence (Hofstad, 2011).

With Agenda 21 bringing sustainable development to the forefront of planning, it brought with it the emphasis on the importance of action at the local level, stating the significance at the local level as the determining factor in achieving the goals of Agenda 21, and referred to as Local Agenda 21. A shift from the initial health movements has therefore occurred, from global health goals, to healthy cities and to local level. With HUP focussing more at local level, studies have consistently found evidence of the relationship between neighbourhood environments and health, and with that the conceptual paradigm of neighbourhood planning was conceived to support local level actions.

Neighbourhoods are places where people live and have been described as the core building block of HUP due to the scale being small enough to facilitate active living, yet large enough to support key economic functions (Ellis, 2015). The size of a neighbourhood depends on local densities, urban form and community composition but generally refer to areas within around 10 minutes of a local centre, or the size of a small village. At this scale, with adequate densities, it is possible to provide a wide range of local services, such as food outlets, schools, clinics and local employment within walking distance and support public transport to nearby larger centres. Contemporary residential design caters towards privacy, impacting on social interactions, and the sense of community. Concurrently, car ownership has increased along with home-based activities such as watching television and time spent on computers, therefore, central to the neighbourhood planning concept is accessibility by foot (Barton and Tsourou, 2000).

Many studies[4] have found that physically measurable attributes of residential neighbourhoods can be associated with challenges to health (Grant, 2015). Neighbourhood characteristics such as residential density, walkability, presence of local amenities, access to nature, land use patterns and access to work can be associated directly to active living (Weeks, 2014). Currently, the acknowledgement of built environments impacting on the determinants of health has never been stronger generated by the emergence of HUP. Since its emergence in the healthy city programme HUP has changed and adapted overtime however the core principles remain the same (Kurth *et al*, 2015). In Phase V of the European Health Cities Network, Healthy Urban Environments and Design (HUED) emerged (which heavily incorporates the 12 healthy urban planning principles listed above) alongside two other core themes of Caring and Supportive Environments and Healthy Living. Each theme had core issues, with HUP now evolving to HUED and active living being subsumed into Healthy Living, which is considered

[4] A full list is presented in “Table 2: Full list of HUED case studies” in Grant, 2015

the most popular subtheme (De Leeuw *et al,* 2014). The importance of physical activity is an important factor and focus of HUED research.

It can now be said with confidence that incidental foot and bike trips are affected by a number of spatial variables: distance, density, form and layout, the provision of pavements/bikeways and the perceived aesthetic quality of the neighbourhood. (Barton *et al,* 2009). Consequently, many cities are beginning to shift their mobility towards pedestrianisation and investing in cycling infrastructure, restricting parking and increasing public transport provision, such as Copenhagen (Nieuwenhuijsen and Khreis, 2016). This relates to a key expression formulated in the Ottawa Charter for Health Promotion (1986) which stated that 'Health is created and lived by people within the settings of their everyday life' (WHO *et al,* 1986, p. 7). The WHO EHCN has acted as a catalyst for HUP across Europe, and as a result, attitudes are changing. However, it is suggested that while urban planning can influence health, planners do not perceive it as part of their role, their priorities remain elsewhere (Crawford *et al,* 2010). Whilst HUP and Active Living are no longer core themes in the EHCN[5], they remain an integral part of academic research (ALR, 2019; Fry *et al*, 2018; Harris *et al*, 2019; Copolongo *et al*, 2018).

Planners have recognised the opportunity, ability and responsibility to create attractive, safe and convenient environments. These environments should encourage people to pursue active lifestyles by walking and cycling to work, shops, schools and other facilities (Barton and Tsourou, 2000). Unfortunately, planning remains a deeply politicised process, full of tensions from within and beyond the profession who have drastically different and often competing goals and objectives. Key decisions from politicians, developers, as well as other built environment professions still treat health as a secondary issue (Tsouros, 2015; Allmendinger and Haughton, 2010). Therefore, by bringing health into the heart of decision-making processes, healthy urban planning aims to assist planning in integrating health more fully;

[5] Due to phases of EHCN evolving every five years. Furthermore, Active Living and HUP are still included within Phase VI: Creating Resilient Communities and Supportive Environments, albeit not as explicitly.

including efforts to enable and encourage active living (Edwards and Tsouros, 2006). Due to the explicit link to how built environments can encourage physical activity, the next section explores active living environments.

2.4 Active Living Environments

In this section, it is discussed how the design of the environment influences how people move (Black and Macinko, 2008), focusing on two main models of urban growth; the traditional neighbourhood and suburban sprawl - opposite in appearance, function and character - and how they affect how people live in different ways (Duany *et al*, 2000). With a shift to urbanisation during the industrial revolution, urban growth has taken another shift in the form of suburbanisation during deindustrialisation. This has been in correlation with levels of physical activity declining, contributing factors including new technologies, automation advancements and changes within the built environment (*Ibid*). The private car has substituted active travel[6], which was once part of everyday lives, and urban sprawl exacerbates automobile dependence. Europe has relied heavily on the private car, usage of which has increased by 150% since the 1970s (Edward ad Tsouros, 2006). Housing characteristics within the United Kingdom have evolved to consist predominantly of detached or semi-detached dwellings located outside or on the periphery of cities, sometimes even resulting in new urban areas altogether. In Britain, 86% of the population lives in detached, semi-detached or terrace housing compared to Spain's population of 65% living in apartments (Anderson, 2011).

The built environment can support active living by integrating land use and public transport, having a variety of open spaces and recreational spaces, providing infrastructure that supports active travel and design elements which encourage active behaviour (Townsend *et al*, 2015; Kent and Thompson, 2012). Planners can help create active living environments by ensuring

[6] Broadly defines any travel made by physically active means (Waygood *et al,* 2015)

built environment professionals consider such elements and that land use decisions are also considered in terms of their contribution towards the promotion of health (Sallis *et al,* 2016; Jones and Yates, 2013).

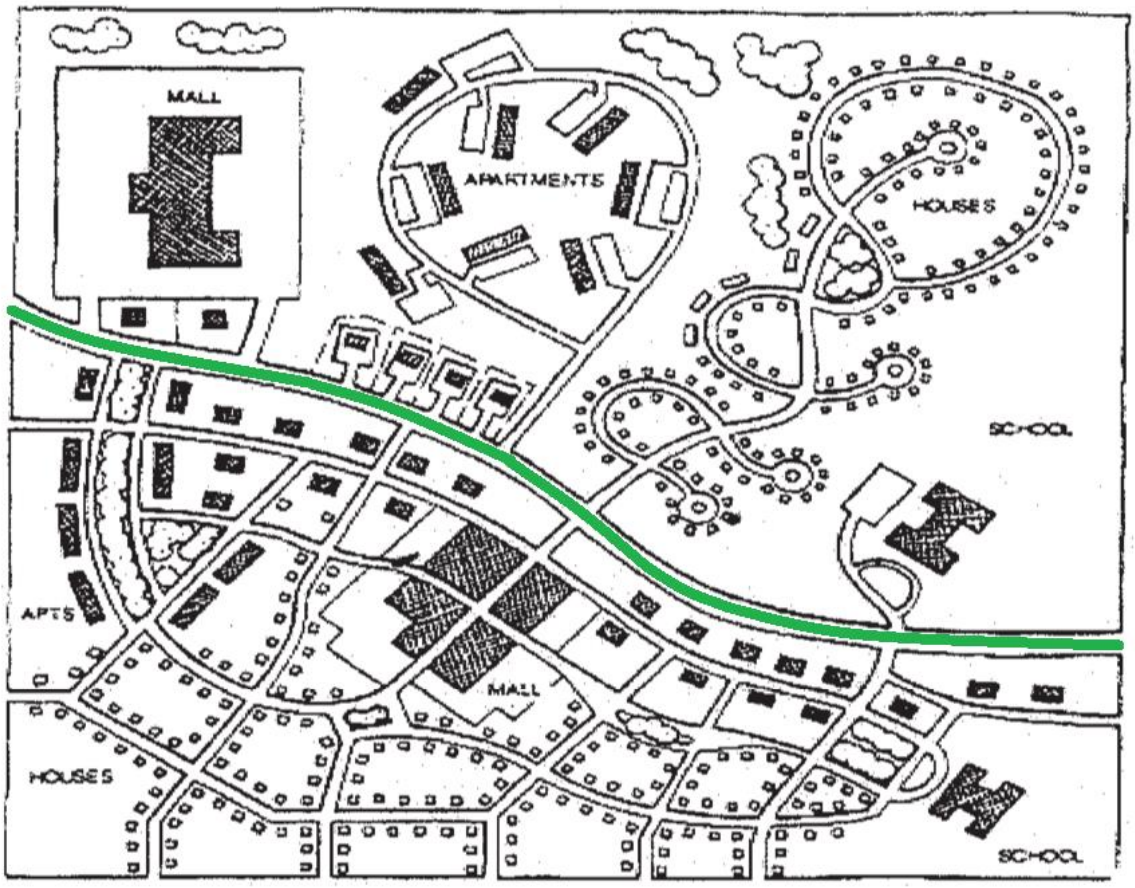
Active living has been defined “as a way of life that integrates physical activity into daily routines and at a professional level the concept brings together urban planners, architects, transportation engineers, public health professionals, activists and other professionals to build places that encourage physical activity” (Lefebvre, 2014). Active living is crucial in tackling inactivity due to physical activity being the core component encompassed within a broad range of activities (such as active commuting to schools and work, shopping), settings (such as neighbourhoods) and experiences (slower traffic making road crossings safer, more interactive environments to live) (Harvard, 2013; Iwasaki *et al*, 2006).

Physical activity within the built environment may be recreational or utilitarian – the former being intentional exercise and the latter where physical activity is incidental. Utilitarian physical activity is easier to build into daily routines and maintain over time, therefore translates well into active living, conceptually. Walking to public transport, using steps, and walking during lunch and other forms of active travel, results in moderate levels of daily physical activity, representative to a recommended amount of exercise. This should be at least 150 minutes of moderate exercise per week according to the WHO and NHS guidelines and over time has significant health benefits (Frumkin *et al*, 2004). Active living environments (hereby referred to as ALE) manifest specific design traits and other concepts are grounded by similar principles including neighbourhood planning, compact cities, new urbanism and smart growth.

The opposing characteristics of suburban sprawl and ALE give great insight into how the physical environment impacts on physical activity. Research suggests that one of the most important determinants of physical activity is one’s immediate environment and why ALE are consistently associated with encouraging physical activity and reduced body weight status,

while sprawl is linked with physical inactivity and obesity, both influencing weight and physical activity (Ewing *et al*, 2014; Mackenbach *et al*, 2014; Black and Macinko, 2008; Jackson, 2001). Figure 2.3 illustrates how the two design types in juxtaposition compare with the top portion denoting design characteristics akin to sprawl (sometimes referred to as a conventional network) and the lower portion that of ALE (sometimes referred to a traditional network). Both network types have streets, houses, shopping centres, apartments and schools. The conventional network is characterised by a framework of widely spaced arterial roads with limited connectivity due to the divided system of blocks, curving streets and cul-de-sacs. The traditional network, in contrast, is typically characterised by the pattern of short block, straight streets and a higher density of junctions and crossings (ITE, 2010). These differing designs significantly impact on connectivity and route choices.

Figure 2.3: Two distinct community designs. 'The Traditional Neighbourhood Development: How Will Traffic Engineers Respond? Source: Spielberg, 1989, ITE Journal, 59, 18.



2.4.1 Contributors and consequences of sprawl

Sprawl[7] in an urban context consists of large areas of land containing uniform residential dwellings, curvilinear street patterns and no destinations available within walking distance resulting in a car-dependent environment (Giles *et al,* 2015; Frumkin *et al,* 2004). The phenomenon of urban sprawl is not new, stemming from the success planning had separating factories from residential areas in the response to poor living conditions during the industrial revolution, which then only applied to incompatible uses (Duany *et al*, 2000). It is believed that it was originally conceived through misunderstandings of early planning concepts like The Garden Cities Movement and has been exacerbated by many factors including policies which encouraged urban dispersal, the introduction of motorways allowed cities to expand into rural areas and the new suburban house type offered a private plot with a garden and were much more affordable than the smaller, inextricably expensive, properties within inner cities (Conisbee, 2017; Frumkin *et al,* 2004; Savitch, 2003).

Wide roads and large corner gradients cater for car uses rather than pedestrians, encouraging higher speeds and feelings of danger being linked to pedestrian footpaths alongside roads, attributed though policies and engineering codes (Davis and Parkin, 2015). The road infrastructures required to provide access to sprawling areas also cost significant amounts in terms of development and maintenance, with government funded services in water, sewers and electricity also being expensive to provide (Conisbee, 2017). Heightened 'road rage' is also associated to infrastructure within urban sprawl as the design of such areas is proven to have significant impact on traffic congestion, often exacerbated by adding lanes which makes traffic worse. This has been mathematically demonstrated through Braess's Road Paradox which states that in a certain road traffic model, vehicle travel times can be extended by adding a new connection to the road network, also related to Lewis-Mogridge's law on the effects of widening roads, again symptoms relating to sprawl (Burnewicz, 2017). Although this is a

[7] defined as 'to spread or develop irregularly or without restraint' – Merriam-Webster

mathematical construct it has been observed empirically in real transportation networks such as in Seoul, South Korea, where the removal of a six-lane motorway to build a park resulted in improved travel times in and out of the city even though traffic volume stayed the same (Easley and Kleinberg, 2010).

Physical activity was once woven into the fabric of life. The amount of physical exertion once required for working, getting to places and even household chores (vacuuming, washing, cutting grass) has been largely eradicated. Now, escalators replace stairs, farming machinery replaces farming by hand, washing machines, dryers, blenders, leaf blowers and lawn mowers have replaced traditional everyday tasks. Simple acts such as buying something small, banking, having a quick lunch can all be done from your phone or without even leaving a car seat (Savitch, 2003). But most noticeable from a planning perspective, travelling by foot and bike has given way to the car which is being provided by built environment decisions (Frumkin *et al,* 2004). Hence, unhealthy built environments are being built into the physical fabric of our settlements (Barton, 2015).

Differentiating between sprawl and suburbia is important. Sprawl specifically relates to areas where residence is built separately and away from commerce, schools, leisure and other forms of social activity (Savitch, 2003). The difference between urban sprawl and suburbia is significant because suburbs can provide good schools, public transport, connectivity and retail, encouraging social engagement and physical activity and these suburbs were the basis of Howard's Garden City Movement. Much like the contrast between sprawl and suburbia, in terms of connectivity there is significant difference between accessibility and adjacency. Many suburban sprawl developments are also located beside shopping centres however, a barrier (be it a wall, a fence or a motorway) often divides the two areas. What could be a two-minute walk is made into an expedition of traversing through the residential estate, onto a 'collector road'[8], back into the shopping centre and then a walk from the car park to the store –

[8] Roads designed to provide access to residential areas

unnecessary resources being used such as fuel, road capacity and parking space. Even when parking is designed, it is located as close to final destinations as possible for 'convenience' (Jackson, 2001).

With many more roads being built and a governmental ethos of public services being 'free at the point of delivery', there are few disincentives for excess road use in terms of road pricing mechanisms which charge for personal road usage. This only encourages people to travel excess distances to work and again makes sprawl too 'practical', rising demand for suburban housing (Pennington, 2000). Urban sprawl seems to be a simple solution to affordable housing in growing cities, but it is proven to be unsustainable for the future generations and contradicting the fundamental planning principle of meeting the needs of the present without comprising future generations' ability to meet their needs (Conisbee, 2017). There have been interventions introduced to contain urban sprawl, such as green belts, but this has also resulted in challenges such as increased commute times and house prices. The five simplistic homogenous components of urban sprawl (Duany *et al,* 2000) which occur independently and strictly segregated from each other are summarised below:

1. *Housing Subdivisions*: These consist only of residences. They are often identified by their contrived names which often pay tribute to the natural or historic resource they have replaced
2. *Shopping Centres:* These are places which are used exclusively for shopping and where no one is likely to walk to. Easily distinguishable from its traditional main-street counterpart by the lack of housing/offices, single storey height and vast car parks between the building and the road.
3. *Office/Business Parks:* Places that are only for work. Distinguishable usually by a large building in the middle of a car park. It is isolated in nature and often surrounded externally by motorways and roads.

4. *Civic Institutions:* Town halls, churches, schools and other gathering places are the fourth component to urban sprawl. Traditionally, these served as neighbourhood focal points, but sprawl has shifted this to large and infrequent buildings, unadorned due to limited funding, surrounded by parking and located 'nowhere in particular'. Pedestrian access is to often non-existent as the design is based on the assumption of mass motorised transportation.
5. *Roadways:* This component is necessary so to connect the other four components together. Daily lives involve many activities and since sprawled environments have segregated land uses, residents spend a lot of time and money simply moving from one place to the next. Vehicles are mostly occupied by a single person resulting in sparsely populated areas generating more traffic compared to a larger traditional town.

The consequences of housing within urban sprawl is also closely related to the lack of walkability. No other services or facilities are available within walking distances, therefore citizens are resigned to use the car for almost everything, particularly for going to work and leaving children to school. A significant, and negative, by-product to this is social isolation as less social interaction is occurring, which feeds into other areas of health, principally mental health (Conisbee, 2017). Car-dependence results in traffic problems exacerbated through sprawl as a consequence of housing design, as entrances and exits from residential areas are limited as well as the route to the next destination, which leads to a bottlenecking of traffic.

Typically, sprawl increases (per capita) land consumption by 60-80% and motor vehicle travel by 20-60% (Litman, 2015). Developing countries, such as China and India, provide explicit examples of sprawl due to the rapid nature of their urbanisation. Studies have demonstrated that sprawl led to health problems resulting in a substantial economic burden on the city of Hyderabad, India (Thapar and Rao, 2015). Other negative health impacts associated to its design which are not related to physical activity, consist of but are not limited to; environmental impacts, motor vehicle crashes and motor vehicle fatalities. Studies suggest that sprawled

urban areas typically have two to five times the traffic fatality rates compared to ALE (Litman, 2015). Sprawl can also contribute to the degradation of ecosystems, water and air quality highlighting the multi-faceted impacts of sprawl and the extent to which this design can have, not only on physical activity but many other dimensions of everyday life. William H Whyte (1958) rather bluntly summarised sprawl as being 'bad aesthetics, bad economics. Five acres is being made to do the work of one and [doing] it poorly. This is bad for the farmers, it is bad for communities, it is bad for industry, it is bad for utilities, it is bad for railroads, it is bad for the recreation groups, it is bad even for the developer.' It is evident that urban sprawl does not only have adverse impacts on health but a plethora of other variables and why active living environments are so important to consider within this discourse.

2.4.2 Contributors and consequences of active living environments

The 'neighbourhood' concept has strong ties to Healthy Urban Planning, attributed by the availability of local facilities, being pedestrian friendly and having a strong sense of local community (Barton and Grant, 2015). Unlike sprawl, neighbourhood characteristics are consistently associated with encouraging physical activity, reduced body weight status, high levels of connectivity due to increased accessibility. Certain densities are essential within neighbourhoods as it determines the presence, proximity and viability of local amenities, such as public transport, shops and services (Black and Macinko, 2008). The traditional neighbourhood, especially those pre-dating automobiles, tend to be more pedestrian orientated and are a more sustainable form of growth (Duany *et al,* 2000) yet, many current regulations regarding development do not cater towards traditional neighbourhood design and are often illegal, particularly with regards to densities (Frumkin *et al,* 2004). Compact styles of urban growth, the traditional networks which are characterised in older urban areas before the influx of cars, eases pressure on green belts preserving farmland and has been found to save 20%-45% in land resources, 15-20% in road construction costs and 7-15% in water and

sewage provision (Duany *et al,* 2000). However, high density alone does not encourage physical activity any more than low density sprawl does, hence the need for land use mix.

Land use mix, referred to the heterogeneity of land uses, has been shown to increase physical activity behaviours by offering non-residential destinations within walking distance (Duncan *et al*, 2010). Uses tend to include residential, commercial, institutional, industrial, recreational, and agricultural land uses, however, these uses must co-exist with one another as not all uses are a compatible mix. Locating employment near a variety of mixed land uses has been shown to reduce travel demand and residential neighbourhoods with mixed land uses facilitate shorter trips and these trips can be achieved through sustainable modes. Land use mix is also associated to many societal benefits due to the encouragement of social interaction, sense of belonging and community cohesion (Bahadure and Kotharkar, 2015). Land zoning has greatly impacted on the decline of mix use developments as land uses are assigned according to a particular function.

As transport is such a vital part to everyday life, the strong link between both types of environments is unquestionable. The contrast between sprawl and ALE regarding transport is convenience and choice. Accessibility to many choices of transport provides people the ability to benefit from the facilities that are located within proximity, hence, also relating to the importance of connectivity, and not simply adjacency which has been previously outlined. With better connectivity, proximity and accessibility to other land uses, such as green spaces, people are more likely to use parks, paths, and bikeways (Jackson, 2001). Research has found that those living in high-walkable areas walked up to five times the amount compared to those in low-walkable areas, especially in utilitarian trips (Frumkin *et al,* 2004). Other benefits to ALE include urban development which would reduce the strain on the public purse, encourage investment in infrastructure, improve the quality of services, and result in safer, more vibrant towns and cities with healthier, wealthier, better connected citizens (Anderson, 2011).

Connectivity is high when streets are laid out in a grid pattern and there are few barriers to direct travel between origins and destinations. With high connectivity, route distance is similar to straight-line distance. In addition to direct routes, grid patterns offer the choice of taking different routes to the same destination providing greater opportunity. Studies have demonstrated that gird designed streets are more pedestrian friendly, particularly those that have implemented the provision of facilities effectively on pedestrian only routes at the centre of neighbourhoods. These not only serve as optimal routes for pedestrians, increasing route choices, but also provided a green and safe environment away from traffic (Jin and White, 2012). Grid styles often result in less crossings for pedestrians, less distance required to walk to services, less pollution exposure and more social interaction opportunities.

There is a considerable amount of literature which focuses specifically on the relative impact ALE have on health and social cohesion (Jones and Yates, 2013). Conceptually, neighbourhood planning hosts among its fundamental principles of building communities. A community exists where there is social cohesion and this is born from social interaction through compact, mixed uses where ground floors are inhabited by shops and cafes, street life is less intimidating and infused with social cohesion and people walk more, advocated extensively by Jane Jacobs (Anderson, 2011). To illustrate the contrasting elements to sprawl and ALE, see Table 2.1 below. Following this, the role of planners in delivering environments which support active living is discussed in more detail.

Table 2.1: Characteristics of Sprawl and Neighbourhood Design by Litman (2015), adapted by Author (2019).

Characteristics	**Sprawl**	**Neighbourhood Design**
Density	Low density with dispersed activities	High density with clustered activities
Land Use	Single or segregated	Mixed
Services (shops, schools)	Consolidated, requiring automobile access	Local, distributed and accommodates walking access
Transport	Automobile orientated	Multi-modal, supporting walking, cycling and public transport

Connectivity	Unconnected road and walkways	Connected roads, sidewalks and paths
Street Design	Designed to maximise traffic volume and speed	Accommodates diverse modes
Planning Process	Little coordination between stakeholders	Coordinated between stakeholders
Scale	Large Scale	Neighbourhood Scale
Growth Pattern	Urban periphery	Brownfield development

2.4.3 The role of planning in the delivery of active living environments

The previous section illustrates the consensus in design to promote active living, with many concepts reiterating similar parallel themes, yet contemporary developments largely contradict the fundamental principles of ALE (Frumkin *et al*, 2004). Regarding physical activity, health benefits can be significant by simply choosing to walk for short journeys. This requires planners, along with all other built environment professions, such as architects, engineers and developers, to fully and whole heartedly commit to active living strategies. Identifying and setting priorities for active travel in policies, plans and programmes would be a significant step, however this must translate into 'on-the-ground' realities; street design, road networks, mix use and implementing the characteristics of neighbourhood design into tangible outcomes and products (Edwards and Tsouros, 2008; Allen and Allen, 2015).

Planners can help create more active environments by ensuring built environment professionals consider ALE elements and that land use decisions are also considered in terms of their contribution towards the promotion of health (Sallis *et al,* 2016; Jones and Yates, 2013). The caveat to compact design particularly in the UK is that building regulations and design codes often mean that traditional neighbourhood design is often illegal (Duany *et al,* 2000). In addition, there is a cultural draw towards semi-detached and detached dwellings on the periphery of towns, as they are in demand, they are supplied. Therefore, citizens must be more open to ideas of apartment living which must be viewed as a better option and incentivised (Conisbee, 2017). Development tends to be a battle ground for developers to

maximise profit and this is too often at the expense of good quality built environments, making it much harder to instigate a cultural shift in housing (Savitch, 2003). There has been limited investment into active living even considering how many prerequisites of health and active living can be influenced by a number of factors at both community and government levels (Faskunger, 2013). Municipalities and governing bodies must plan for ongoing interdisciplinary collaboration and the promotion of the ALE principles. This highlights the importance of professionals and governmental procedures regarding the built environment and impacts on health.

Local governments can play an important role in active living, more so now than ever, as planning powers are the responsibility of local councils (see Chapter Four). Urban sprawl and large residential developments must be controlled and reduced by improving public transport networks, restricting car use in cities and embedding workplaces, schools and amenities within neighbourhoods which would facilitate walking and cycling, which can be achieved through policy (Edwards and Tsouros, 2006). It is recommended to create a comprehensive plan for walking and cycling into existing and future developments and integrating that plan into broader transport planning. Traffic policies must also support walking and cycling, being put into practice by implementing traffic calming measures while providing attractive green infrastructure which allows for a safely perceived and comforting environment (Edwards and Tsourou, 2006). Parking could be taxed heavily, and park and ride schemes should be used only where levels of public transport are poor, implementing parking restrictions, greening programs, speed limits, traffic calming measures and car sharing (BMA, 2012). However radical steps are met with caution as they can be polarising and cause tension amongst professionals and politicians. These interventions have been described as ‘active ingredients’ and even though they may be radical, they are imperative for active living (Roberts *et al*, 2016; Edwards and Tsourou, 2008).

Ultimately planners must have a stronger role to play. They must be allowed to formulate consistent, evidence based, long term, cross cutting strategies and work with local communities and businesses (Barton and Grant, 2015). An important step could be priority given over to pedestrian and cyclists and effective public transport provision. Some cities have successfully achieved radical shifts in transportation modes such as Copenhagen, Denmark. Between 2009-2014 Copenhagen invested 268 million Euros into 338 bicycle projects and as a result over a quarter of all shorter trips (less than five kilometres) are carried out by cycling, with 34% of trips taken to workplace, 12% to place of education and 15% for errands. The total annual health benefit in Copenhagen based on the number of people cycling is estimated at around £223 million (DTU, 2016; City of Copenhagen, 2012). The example in Copenhagen demonstrates what can be achieved through investment into active living environments and is far from being the sole exemplar. Other places, such as Belfast in Northern Ireland who also implemented a cycling initiative called Belfast Bikes, have struggled in this regard not only due to a lack of investment in active living infrastructure but a pre-existing high level of car dependence.

Proper consideration of active living would likely increase physical activity in populations permanently, contributing to the reduction of diseases (Sallis *et al*, 2016). This should provide enough impetus for collaboration amongst sectors to promote ALE as the direct and indirect outcomes would be significant. It is crucial that new developments take health into serious consideration and do not exacerbate the problem of unhealthy living by continuing to build sprawling suburbs with no thought into daily life.

Failing to consider health for future developments will result in a missed opportunity to improve health and reduce inequalities; applying more needless pressure on health services, economy and the environment (SPAHG, 2011). Planners have a leadership role in designing and maintaining the built environment in ways that promote active living. They can become champions of active living advocating for physical activity and act as catalysts in key

discussions on plans and policies (Edwards and Tsouros, 2008). Planners do not, however, act alone as they are part of a much larger network of government and non-government actors, known as governance. Evidence regarding the governance mechanisms through which the built environment may influence physical activity has only recently emerged within the last ten to fifteen years and urban changes take time, making previous errors difficult to rectify (Papas *et al*, 2007). Therefore, consideration into governance is important to understand the role of government and the relationship planning has amongst the plethora of other agencies involved within development processes.

2.5 Governance

It is acknowledged that there is a burgeoning volume of research related to governance. This section focusses specifically on contemporary understandings of governance, and to what extent collaborative governance plays a role in operationalising active living. Like healthy urban planning, governance involves state, market and civic actors collaborating to collectively solve complex societal problems, co-design appropriate rules and regulations and to co-deliver specific services (Hancock, 1996; Fukuyama, 2013). The system of governance in a society relates to how collective affairs are managed, allocating resources among community members and providing for the welfare of members of society (Healey, 2006). Therefore, to create a healthy city one must develop a holistic approach to government and governance.

The following section will unpack several conceptual themes surrounding governance, including urban governance and power. Governance has been expressed as the precondition in the search for solutions to complex, wicked problems (Perry *et al*, 2018). 'Wicked problems'[9], such as climate change, health care, obesity and income disparity, often have little consensus on how they should be addressed and solved, and difficulties are added as such

[9] Wicked Problems are impossible to know, contradictory and difficult to define, uncertainty whether or not the problem has been solved. These problems are seldom linked to anything other than public policy issues and are highly resistant to change (Rittle and Webber, 1973).

concerns cross over separate policy arenas (Rittel and Webber, 1973). Effective governance can be used as an instrument to unravel wicked issues. Although competing interests exist amongst government, non-governmental actors and organisations, governance aims to achieve collaborative advantage through the attainment of goals beyond the capabilities of organisations acting alone (Vangen *et al*, 2014). Governance refers to the coordination of inter-dependent organisations and the relationship between the overlapping spheres of political, economic and social life, aiming to influence collective action (Corburn, 2015). Furthermore, not only does governance include the formal conflicts between institutions and organisations, but also the informal norms and practices.

The synthesis of governance tends towards the structural connections between different partners, the processes (communication, shared responsibilities, decision-making) and actions of individuals who can influence and enact the agenda of collaboration. Thus, governance is defined as:

> "the design and use of a structure and processes that enable actors to direct, coordinate and allocate resources for the collaboration as a whole and to account for its activities" (Vangen *et al*, 2014: 8).

The connections of governance are not only horizontal in nature, rather different levels of government are also included, who have complementary or competing competencies and can result in conflicting interests (Steurer, 2013). Regulatory instruments can heighten such conflicts due to the array of mandatory (hard) and voluntary (soft) rules within governance. Hard regulations relate to when legislators, ministries and public agencies define rules as binding and executive and judicial branches of government monitor and enforce compliance[10]. Soft regulations are not legally binding, often leveraged through persuasion through guidance

[10] Obvious hard regulations consist of laws, metaphorically referred to as 'sticks' and less obvious, economic instruments 'carrots' such as taxes (Steurer, 2013).

documents and certain policies. How regulations relate to one another and the effectiveness of ‘soft’ rules are causes of concern.

Governance is not to be confused with government. The terms are often conflated and it is therefore necessary to make clear distinctions between the two (Evans *et al*, 2005). In sociological terms a shift is understood to have taken place regarding the diminishing role the ‘the state’ possessed in favour of steering tools in inclusive governance with non-state actors (Lo, 2017; Steurer, 2013). Governance is synonymous with the wider view of steering and regulation, formulating, promulgating, implementing and enforcing societally relevant rules by government, business and societal actors in which the rules can either apply to others or themselves (Steurer, 2013). The conceptual shift from government to governance may have occurred due to traditional modes of government not being capable of tackling many ecological and social issues and consequently new modes of action were actively sought (Sotarauta, 2016). Thus, governance tends to be free from the archaic hierarchical structures associated to traditional government (Lo, 2017); although with the vast amount of inclusion from many levels, confusion regarding authority is suggested to be common as decision-making becomes further removed from elected political structures (Bell and Stockdale, 2016). If there is not a designated lead organisation in governance proceedings, there can be concerns regarding accountability.

Such ‘fuzziness’ makes it difficult to oversee who steers whom and with what means and produces questions of who are the regulators? What is being regulated? How is regulation being carried out? (Steurer, 2013). With limited local autonomy, financial pressures and fragmented administrations (at all levels) conflict can occur between government authorities which results in some matters, such as public health and preventative medicine, becoming more marginalised than others, such as the NHS. This results in slow and cumbersome decision-making and limited integration of land use, transportation planning and public health, causing difficulties for concepts such as active living to be embraced (Sotarauta, 2016).

Consequently, planning practice was one such field that reflected the shift from government, being a single actor, towards governance, being multi-actor (Pagliarin, 2018).

Planning is now emphasised on being spatially coordinated and integrated within regional and local partnerships, with vested interests within the political arena of government and additionally drawing on the resources and expertise of public, private and not-for-profit organisations of governance (Vangen *et al*, 2014; Tewdwr-Jones, 2012). Pennington (2000) proposes that planning is readily subverted by powerful interest groups, or lobbyists, who can exploit areas of public consultation for their own interests. The influence planning decisions have on the economy, society and the environment mean that it is prone to controversy and political calculation (Adams and Watkins, 2014). The planning system is often seen as 'little more than a creature of business elites driven by capitalist profit making rather than concern for the wider collective interest' (Healey, 2010: 15). Therefore, planning objectives concerning health are difficult to pursue when aspects of transport, housing, health, and regeneration do not coincide with one another, requiring more cross-cutting work, and not thinking solely of short-term economic gain (PHAC, 2008). There is a need for a radical paradigm shift in the way cities and human settlements are planned, developed, governed and managed.

The jostling of planning responsibilities (see Chapter Four) sets the framework for the shifting scales of power, referred to as territorial capacity, which is constrained by institutions, constitutional roles, politics and power (Tewdwr-Jones, 2012). It is not easy to construct a shared vision which orientates separate actors in one direction, thus leaders must move collaboratively and act on behalf of wider interests (Sotarauta, 2016). The values and cultures behind practice, vary considerably, accepting societal, environmental and other responsibilities (Steurer, 2013). What is of interest is how inter-relations between actors with vastly different responsibilities and goals address an overarching shared goal, such as to improve health.

The political processes of spatial planning (place making), with its mixture of contexts, actors', arenas and issues, has been referred to as urban governance (Corburn, 2015). Urban governance regarding health shifts the focus away from people to include the changing political processes and organisations in order to drive health (Meijer & Bolívar, 2015). Urban governance relates to how government and stakeholders decide to plan, finance and manage urban areas. It includes a continual process of negotiation and contestation surrounding the allocation of social and material resources and political power. Urban governance plays a significant role in (Slack and Cote, 2014):

- shaping the physical and social character of urban regions
- influencing the quality and quantity of services
- determining the sharing of costs and distribution of resources
- citizens ability to access local government

The relationship between the many actors involved in urban governance determines what happens within a locality. Governments are required to forge strong partnerships with key stakeholders to effectively plan and manage urban transformation. Urban governance is vital for managing ever expanding cities and populations by optimising institutional mechanisms of coordination, planning and accountability among many stakeholders (Fox and Goodfellow, 2016). However, urban governance structures can lack the vision to address critical concerns, such as urban growth.

Regional development plans, such as the Regional Development Strategy (RDS) in Northern Ireland, are not designed to guide different actors directly. Many such plans are in fact arenas for discussions, battles and quarrels (Healey, 1997). In the hands of skilled leaders, they are powerful tools. Conversely, in the hands of bureaucratic planners they can result in hollow planning cycles without any true impact, or even having negative impact (Sotarauta, 2016). Governance dynamics and planning are significant factors in containing or encouraging urban

sprawl, with many academics believing sprawl to have originated from local planning practices (Oliveira and Hersperger, 2018). Perceptions and cultures can unconsciously pander to housing preferences, such as suburban low-density housing, supplemented along with low quality, ill-thought inner cities; hence triggering sprawl. Conflicting interests on whether compact urban areas are desirable have continuously reoccurred, despite the strength behind such concepts and research. Furthermore, regardless of this conceptual support there is an accommodation among actors in planning for sprawl (Pagliarin, 2018). Sprawl cannot solely be attributed to urban governance; however, a study carried out by Pagliarin (2018) compared the cities of Barcelona and Milan and found associations between specific governance structures and different suburbanisation patterns as a result of the materialisation of decisions regarding land use allocation and management.

There is a necessity to harness specific actors and groups' practices and their governance dynamics characterised by specific traditions and cultures. The difficulty remains. Planning is a deeply politicised process, full of tensions and competing interests from within and beyond the profession (Allmendinger and Haughton, 2010). As a result, the political economy has direct influence on the types of development and will largely assist the interests of those in power. Both political and non-political actors will lobby to benefit their interests and priorities to a relevant power figure or institution (Ghita, 2012). Roles and leadership can either be used or abused, opening dialogue to another concept to add to debate, power. Unfortunately, weaker actors can struggle to actively promote and achieve their goals within large governance networks, sometimes even following the actions of the more powerful in an effort to reflect a small representation of their involvement (Martens, 2007). Public Planners are appointed in advisory roles to management or to political power. Planning bodies are largely responsible for supplying information and knowledge to decision makers who wield power, appointed or elected officials for example (Benveniste, 1989). Governance requires leadership, leadership involves influence, and where there is influence there is power.

There are a variety of ways to conceptualise power. Wrong (1997) defines it as the capacity to produce intended and foreseen effects on others. With regards to development, power should not be used to cause a professional to do something they would not normally do, rather to induce them to willingly do something they would not have done otherwise (Sotarauta, 2016). However, power imbalances are inevitable in any structure, whether it be tensions between the shifting power away from elected bodies and public agencies to shared power among stakeholders; or skewed in favour of lead organisations (Vangen *et al*, 2014). Struggles over power can manifest in tacit day-to-day routines (Corburn, 2015). The question is what leads those to use or abuse power, and how much does it impact on overall governing proceedings.

Benveniste (1989) claims that authority is the legitimate use of power, yet formal authority does not tend to play a significant role as inclined to believe, informal influence can be just as significant (Sotarauta, 2016). An example in Denmark demonstrated how, in a transparent and respected democracy, planning was manipulated by various power configurations to serve in the interest of specific groups (Pagliarin, 2018). Therefore, power can result in those empowering some groups and disempowering others which will establish what agenda is being driven, perhaps giving the platform and a voice to actors who are not well represented. Power is not new to planning and, even though it is highly debated, power relations cannot be overlooked (Pagliarin, 2018). The highest form of power resides in how collective thinking can be influenced and how challenges are defined and framed for action. Leaders must be able to draw the attention of other stakeholders and translate that into the issues that require facing, collectively. In other words, exercising interpretive power (Sotarauta, 2016: 52).

Without stringent codes and statutory and political parameters provided by central government, more ad hoc governance is appearing in a display of fragmentation and responsibility. It is unclear then, who may take responsibility and ownership of the collaborative efforts within this governance dynamic and how it manifests into more formal

mechanisms. Particular concerns raised are that of certain commitments being reliant on key individuals, and how the governing form would endure if those actors divorced themselves from its (the governance structure) functions (Tewdwr-Jones, 2012).

2.6 Collaboration and Leadership

Collaboration is a core component of contemporary governance as it is an intentional process which deals with matters of collective concern (Healey, 2006). Although perspectives and outcomes may differ among stakeholders in professional practice, collaboration can change how individuals view one another as well their views on principles and beliefs of other professions. The previous section outlined exactly what governance is; the involvement of government and non-government actors who intend to solve complex societal problems. A collaborative emphasis is placed in such a process so that issues and concerns can be tackled effectively. The relationship between governance and the collaboration process has been merged into a concept known as collaborative governance and is defined as:

> A governing arrangement where one or more public agencies directly engage non-state stakeholders in a collective decision-making process that is formal, consensus-oriented, and deliberative and that aims to make or implement public policy or manage public programs or assets (Ansell and Gash, 2007: 544).

The collective decision-making process of collaboration is widely accepted in both planning and health fields, each recognising the necessity to collaborate with one another throughout the literature, however it often does not fulfil the intended potential (Michie, 2016; Addison, 2015; Thompson and McCue, 2015). The cause of such shortcomings in collaboration is largely due to a lack of understanding of professional assumptions, processes, language and silo-cultures of organisations (SPAHG, 2011). It is important to explore the differences and

difficulties of collaboration and go beyond the remit of the blinkered visions of individual professional sectors (Elbakidze *et al*, 2015).

The term ‘professions’ broadly consist of a group of people who are sought to provide advice and carry out specific services, having knowledge and skills others do not, referred to as professional practice. It is distinguishable from non-professionals, who also have acquired knowledge others do not have, as the services sought and the outcomes met from professions cannot be judged by others (Barker, 2010). For example, a planner may provide advice to a client who may not know the quality of the advice, even after a project has completed. The outcome may have been more, or less, favourable had the advice been different. The client could ask another planner, yet they would still be unable to distinguish the better advice between the two, as the planner is the expert in that area and the client is not. This example could also be applied to architects, engineers, and other professions within the built environment, demonstrating the likelihood of a battle between professions within the collaborative process.

Although differing professions have separate responsibilities and end goals, the intention of collaboration is to offer a collective space, or arena, to tackling shared interests and complex social policy concerns. These differing values has been termed ‘cultures’ which, although difficult to define, relates with Matsumoto’s (1996: 16) definition of culture as:

> ... the set of attitudes, values, beliefs, and behaviours shared by a group of people, but different for each individual, communicated from one generation to the next.

Culture is explained as socially constructed; shared by those in various groups and cannot be reduced to single individuals. Culture is what guides behaviour, rather than the behaviour itself (Alvesson and Sveningsson, 2008). Within the built environment there are many groups of professions working together, each potentially having their own diverse set of core values. Planning is a professional culture which consists of a set of specific learned values and

habitual responses. With planning practices being embedded within a wider cultural framework of the built environment, composed of an interactive process among involved actors in a vast structure of collaborative governance, it can be ascertained that there are many different professional cultures implicated.

A research emphasis on professional practice, or cultures, provides an opportunity for professionals to reflect on their own role and addresses values and principles which may normally be found at a more conscious level. This enables further understandings of professional roles and the interactions between different perspectives (Håkansson, 2015). It has been argued that professional cultures can impact on the quality of the collaborative governance, facilitating or constraining the propensity to radically transform or refine the collaborative gains of achieving shared outcomes (Hall, 2009; Bloor and Dawson, 1994; Greed, 1998).

A report produced by the Town and Country Planning Association (2016) identified that planners and public health teams need to collaborate more effectively due to active living being a multi-sector agenda. It also identified the major challenges of collaborative practices through data obtained from multi-professional workshops. In total, 14 workshops were held across England and data was extrapolated from 290 evaluation forms completed after the workshops. 52% of participants identified silo mentalities within departments and professions as a significant challenge, and how that threatened health promotion in their work. Silo mentalities are the mind sets of departments or sectors who do not want to share information with others in the same organisation (Gleeson and Rozo, 2013). The term has been used for thirty years and, unlike many trends and terms in business, this one continues to impact on governance networks. The root of silo mentalities comes from conflicting leadership which results in more serious long-term problems; often with deep cynicism and resentment within departments and organisations. Leaders are held accountable to recognise such issues and rectify it by creating effective, long term solutions that are scalable, executable and realistic which raises

concerns about the style of certain leadership. Silo mentalities must be identified and broken down for collaborative governance to be effective. Gleeson and Rozo (2013), therefore provide five ways to encourage a unified front are:

1. Create a unified vision

   Silo mentalities waste resources, kill productivity and jeopardise achieving goals and so contextual issues must be addressed at the heart of organisations. People in leadership roles must agree to a unified vision, departmental objectives and long-term goals. This helps generate trust and have an 'our organisation' outlook as opposed to a 'my department'.

2. Work towards achieving a common goal

   It is important to get to the underlying roots causing the ripple effects of silos. When the problem has been identified it is important to work together in solving it reemphasising achieving a common goal which applies unity and promotes collaboration. All employees should be made aware of this objective and know how they can individually become involved.

3. Motivate and Incentivise

   Knowing how to motivate employees and for them to communicate effectively is a vital component at a leadership level. Motivating employees through common interests, encouragement and a shared voice improves productivity and avoids an attitude of 'it's not my job'.

4. Execute and Measure

   Goals should be well established and defined. Regular meetings with each employee held accountable for the completion of their specific task. A team will thrive under routine and reinforcement.

5. Collaborate and Create

   A team should have knowledge, collaboration, creativity and confidence. These will come as a result of the previous four traits driven by leaders who allow, and foster,

cross-departmental interaction, without creating needless and too frequent meetings within for no significant purpose.

It is essential that local authorities have the necessary tools and expertise to carry out collaborative practice and to recognise the importance of moving away from the traditional bureaucratic silos (Conrad, 2008) and towards characteristics of: trust, leadership, mutual respect, unity in a common purpose, lack of recrimination, clear ground rules, sharing skills/best practice, communication, shared costs and benefits (Addison, 2015: pp.346). There are ways of fostering collaboration to achieve shared goals, to implement health into planning and advocate active living. Working together in research, policy and practice is suggested to influence concepts such as active living which is advocated by many scholars who support the building of dialogues between different professions

Thompson and McCue (2016), in their study in New South Wales, Australia, found that a lack of collaboration between health and planning sectors can be considered a 'wicked problem'. The New South Wales State Planning Agency included ten evidence-based active living indicators which were provided to local councils to help demonstrate progress towards more supportive environments for active living. The indicators identified were:

1. Land use environment
2. Facilities
3. Transport environment
4. Aesthetics
5. Travel patterns
6. Social environments
7. Land use economic
8. Transportation economic
9. Policies
10. Promotion

It highlighted the necessity of interagency collaboration for increasing health, through physical activity, especially at the higher levels of professional practice. The Healthy Built

Environments Program (HBEP) and Premier's Council for Active Living (PCAL) shared the agreement that contemporary planning systems must endorse a vision of the future, centred on public health. From here there was a series of forums, discussion papers, meetings and groups until there was a strong message with research evidence that could be delivered to politicians. It was agreed to include common goals and a combined position to get a comprehensive health objective in a new Bill in 2013. Although this example is from Australia, it demonstrates that a wicked problem was recognised and more importantly persistently addressed, the outcome being health implemented as an objective in the new planning bill and an applicability gap was bridged. This example is admittedly rare, although it shows that traditional ways of working may not be appropriate to tackle 'wicked problems' (Thompson and McCue, 2016). The Australian Public Service Commissioner advised that 'broader, more collaborative and innovative approaches' will be needed (ASPC, 2007: pp.iii).

Collaborative partnerships can have the potential to nurture collaborative gain in working towards shared outcomes that drive inter-professional engagement. This is recapitulated in the Marmot Review (2010) which explains how it is crucial that designers, planners and developers are aware of health and the potential impact their work will have in addressing health concerns (Tomlinson *et al*, 2013). Successes have been documented within the United Kingdom with Wales introducing the Active Travel (Wales) Act 2013, making it a legal duty for local authorities to consult with local communities and develop the mapping of active travel routes and facilities, particularly for children and their journey to schools. National Health Service England launched a Healthy New Towns initiative which introduced ten Healthy New Town Principles. Ten new housing developments across England are being delivered specifically to unite public health, National Health Service (NHS) and planning to build healthier places.

Alternatively, there are well-documented examples of ineffective collaboration as a result of silo mentalities of departments. A study on Whitehall departments concluded that there was

no cross-departmental work being carried out and as a result there was confused planning with uncertainty of roles, service duplication with different departments carrying out similar projects (Gash, 2015). Due to the lack of coordination, professionals were confused about their roles, 'turf wars' initiated when officials refused to finance multiple agency initiatives and overall 'patchy' service provision from the local government (Conrad, 2008). Ultimately, the silo mentalities found within Whitehall departments undermined local governments contribution to tackling cross-departmental policy challenges such as obesity.

The physical inactivity epidemic, along with many other contemporary health issues, is recognised as being cross cutting in nature, however, for most local authorities, collaboration is not practiced (Addison, 2015). Leadership has recurred throughout the discourse on collaboration and governance and requires a closer look as to how it can help nurture productive cross-sector working. Leadership is carried out by both formal and informal leaders whose intention is to strengthen the network of relationships in their organisation, building on allegiance and organisational norms (Morphet, 2015). Two types of leadership have been categorised by Macmillan and Tampoe (2000: 197) that of a more charismatic style that carries 'hearts and minds' or that which is transactional, which is 'task forced'. Governance structures can both constrain and enable leadership processes and therefore one cannot be addressed without the other, and leadership should be central to governance systems (Sotarauta, 2016). Leadership is based on the ability to direct many heterogeneous actors towards solutions which go beyond their individual ambitions, through acknowledgment and respect.

Within the built environment the leaders are largely political, supported by planners who act as a proxy in negotiation. Some political leaders have strong views on development while others are more open to professional advice. Public sector leadership roles must demonstrate that specific standards are met and maintained and if such leadership does not exist it should manifest on an informal basis (Morphet, 2015). It is not uncommon for leadership to be enacted by individuals with no formal positional authority, therefore governance must

incorporate the idea of key actors – leaders without legitimate power to lead – given the scope to embrace, empower and involve partners and the ability to steer the collaboration towards agreed-upon outcomes (Vangen *et al,* 2014). Leadership should then construct a collective belief of what should be done, aiming to influence actors and their thinking (Sotarauta, 2016). Ultimately, the leadership role is reliant on an individual and therefore they are required to communicate their views in a credible manner. The question raised is whether leadership is communicated through their individual view, or the delivering of dialogue extended from collaboration (Morphet, 2015).

Leadership is vital to how planning is practiced, perceived, resourced and trusted. In the UK, planning practices effectiveness has been deeply criticised and scrutinised and silo-based working has resulted in professional cultures being inward-looking. A lot of this scrutiny is aimed at local governments, where the operation of planning has responsibility. Within local authorities planners were once leaders of strategy, however it is argued that since the 1990s, separation has occurred between professionals and committees. This can be bolstered by councillors who appreciate planning and those who do not, unsurprisingly, as many planning decisions are contentious in local politics (Morphet, 2015). The leadership challenges faced in planning are often the result of bias, being identified with regulatory restrictions rather than problem solving, and operating in a political environment.

Planning is a mechanism, not an outcome. This must be reflected in practice. Planning professionals are similar to lawyers, in that they advise others who take the decision. Part of their professional role is to evaluate proposals and policies with the framework of planning and identify a project's intended use, ensuring that the conceptualisations are consistent with reality. However, three distinguishing planning theories emerge regarding this, identified by Benveniste, (1989). First, normative planning theory details how planning and policy should be and have been referred to as ideal explanations of what should happen, often used by practitioners to explain or justify what they are doing. Second, 'in use' theories of planning

derive from actual experiences, from practice. Third, espoused theory is what planners say they are doing, which differs from normative theory in that what planners say they are doing may differ from their ideal version of what should happen. It also differs from 'in use' as what they say they are doing may differ from what they are actually doing.

Both private and public sector planning requires leadership. In the private sector, those who develop a scheme show leadership through its conceptualisation, communicating it to funders, landowners and potential users, extending to the planning authorities and other regulators involved in the process (Morphet, 2015). Many places struggle aligning governance, economy, social and ecological issues, and in finding strategies to manage growth or decline (Sotarauta, 2016). Leadership can provide policymakers and practitioners with added insight on how to ensure regional development policies and practices are not only more strategic but more effective. Studies have demonstrated how cultural change within planning has previously occurred through leadership, and theoretically could reoccur. The previous sections have, however, presented just how complex these proceedings can become, providing insight to the challenges regarding leadership and delivery for integrated policy and common goals in terms of creating active living environments.

If active living environments are the foundation to which the activities of leadership unfold, at a variety of levels (neighbourhood) and a variety of boundaries (professional cultures) along with contemporary health challenges (physical inactivity) in which the literature has linked planning; it is evident how formal leadership roles lie outside traditional 'comfort zones' of practice. Even the generative fundamentals of the rhetoric around producing fairer societies and engendering sustainability can seem contradictory due to the contrasting drivers on competitive economies and continuing urban sprawl. Hence, it can be argued that leadership principles are a fundamental determinant of how effectively policy is conceived of, resourced and operationalised (Collinge and Gibney, 2010: 388). In the context of the increasing

socioeconomic complexities and the delivery of active living environments and policy, this leadership ‘style’ is more significant in the long term.

Reuniting health and planning requires strong leadership and commitment from all related disciplines and politicians. It should address capacity and grasp multiple perspectives. Even though many councils within the UK are now considering health, decisions made in line with such policies and supplementary guidance have been overturned in appeal (Townsend *et al*, 2015). Ultimately, planners must ensure walking and cycling are considered and work to accrue health outcomes and translate the promotion of healthy places from policy into on-the-ground realities (NICE, 2012).

2.7 Conclusions

Due to world’s wealthiest countries failing to address fundamental public health challenges, there is a significant and urgent need for new approaches (Barton and Tsourou, 2000), yet, there remains no blueprint for how to embed health into planning (Kurth *et al,* 2015). There is a need for a fundamental rethink of how contemporary health concerns are dealt with, treated and tackled. The literature is clear how built environments can contribute in tackling physical inactivity by increasing and encouraging the opportunity of daily physical activity. By considering active living environments along with effective collaboration it may just be enough to instigate change. This can be done through policy, rethinking the decision making processes and a potential change to the foundations of planning and development procedures, moving away from traditional silos which are hindering progress. There is an abundance of evidence which demonstrates the positive relationship between planning and health, but this has never been deemed adequate to prompt a change in policies. The concept must be presented differently in order to lobby for change (Kent and Thompson, 2012).

Physical activity is too often regarded as a secondary issue by built environment professionals. Even though the rhetoric between public health and built environment academics

acknowledges the necessity in considering health over economies to combat major health concerns. It is evident in practice and widely accepted conceptually that active living through urban design, land use patterns and transportation promotes walking and cycling, more active and healthier communities, which would result in significant economic, social and environmental benefits (PHE, 2016).

The literature reviewed validates an inseparable relationship between health and urban planning. However, there is clear recognition from multiple sectors that improving health through the built environment is a collective effort, raising questions around professionals' leadership roles and practices within contemporary governance, which are central to this doctoral research. Health still has a disappointing lack of political support contradicting what the Milan Declaration set out to achieve, back in 1996 and remains neglected and marginalised by other priorities, most commonly economic (Barton *et al*, 2013). To effectively achieve healthier environments there is a necessity for these political conditions to change. The literature review clearly demonstrates the need to investigate the built environment quality of local neighbourhoods, since many prerequisites of health and active lifestyles are influenced by factors at neighbourhood level (Faskunger, 2012). Questions on the wider role of governance has come at a time of governmental reform in Northern Ireland where local authorities now have planning powers and with that, more responsibility with regards to the built environments. Consequently, research on active living within Northern Ireland, will not only focus on planning professionals but rather on the collaboration and actors within the entire governance structures, from public to private, and local to regional.

This research project intends to investigate professional practices of those working within the built environment and obtain information on how active living is manifesting itself in the context of Northern Ireland. The research will be framed within 'four P's' which have been drawn out through Chapters One and Two. The first 'P' is **Policy**, which will (not only) be critiqued from the perspective of the researcher with regards to the associations towards active living, but

also how professionals perceive the utility of policy in practice. The next ‘P’ is that of built environments **Products** (projects and initiatives), focusing on field observations and products discussed throughout the participant interviews. And lastly, the professional **Practices** and **Processes** between different actors at different levels, the relationship between one another, their values, experiences and opinions towards active living. Subsequently, in order to deliver this empirical study a rigorous research framework was designed and is presented in the following chapter.

Chapter Three: Research Framework

3.1 Introduction

The previous introductory chapters have established the rationale for the research and explored the conceptual basis framing the research. The methodological chapter explains and develops the philosophical lens the research and the research methods deployed. Designing a research framework involves customising several core concepts in a logical way to maximise the validity of the research findings (du Toit, 2015). This allows the research objectives to be achieved as unambiguously as possible. Within the context of social sciences, it is required to apply a particular philosophical position which frames the approach of the research undertaken (O'Gorman, 2017). To comprehensively construct a research framework five interlocking concepts should be specified; ontology, setting the nature of the world and the place research has within; epistemology, which sets about the way in which valid knowledge is obtained; methodology, which defines the strategy to achieving the intended aim, techniques and data analysis.

By ensuring the clarity in which valid knowledge is obtained, the very nature of any knowledge claimed to be known is framed succinctly. The intention of this chapter is to recognise and justify the interlocking choices which ultimately reflect and represent the entire research framework (O'Gorman, 2017). All research has its limitations and it is the researcher's responsibility to design the best possible study to maximise coverage by weighing up the relevant considerations. This chapter provides the framework on which the empirical portion of the research is built. It tackles the philosophical underpinnings and provides context to the perspectives of the undergone research. The structure of this chapter begins with epistemological paradigm, followed by the qualitative research paradigm, the methodology, the research methods and ending with ethical considerations.

3.2 Epistemological Paradigm

Research is expressed through an array of different positions, perspectives, methods and methodologies and these choices help stabilise and direct the development and processes of a research project (Crotty, 1998). It is therefore important to discuss the theoretical perspectives relevant to the area of study and to acknowledge the researcher's assumptions about reality. Thus, the characteristics of the research, what knowledge is hoped to be attained and how the research is to be analysed are crucial considerations for developing a robust research project and for the researcher to interpret and bring meaning to the phenomena being studied (Snape and Spencer, 2003; Crotty, 1998).

Planning research emerged through the positivist research paradigm, meaning that a researcher's role in gaining factual knowledge through data collection was observable and quantifiable allowing no provision for human interest and the world being viewed as external and objective (Collins, 2010; Wilson, 2010). Researchers problematised planning issues from a positivist perspective and over time concerns were raised about the appropriateness of this approach from both a practice and philosophical stance (Silva, 2015).

A shift in perspective was illustrated through Geddes, and later Jane Jacobs, who recognised the importance of understanding the human values, perceptions, institutions and social dynamics of planning research (Greed, 2000). These recognised requirements, in understanding civic life, the spirit and sense of a place and explaining interactions and decisions, are contradictory towards objectivity and so a shift in planning research occurred (Pinel, 2015; Silva, 2015). Social science began to infuse the planning discourse and researchers were encouraged to devise models on social relations. At this time there was greater emphasis on approaching particular issues such as transport, urban and economic systems from a sociological perspective. As opposed to purely exploring 'the what' and 'the where', a major intellectual step occurred in further exploring 'the why' and 'the how (Silva, 2015). A whole new generation of planning research emerged.

In aligning with the new generation of planning researchers leaning towards the social sciences, this research addresses the complexities of the nature of knowledge (epistemology) and the nature of reality (ontology), particularly exploring the social relations (collection of shared values and customs) across built environment professionals. The research paradigm for this study complements Crotty's (1998) logic in considering the applicability of broader social science insights for interpreting different social perspectives.

The construction of an epistemological position is fundamental in ensuring the robustness, validity, reliability and direction of research; guiding the analysis of the data (Pinel, 2015). Epistemology is the nature and origin of knowledge (Greed, 2000) and is *'*...concerned with different ways of knowing' (Dear, 2000:43). It has been broadly divided into three main categories of objectivism, subjectivism and constructionism (Crotty, 1998) (Table 3.1). While Dear (2000) recognises other epistemological positions such as rationalism and reductionism, they are not appropriate for this topic.

Table 3.1: General Epistemological Positions

Source: Adapted from Crotty, 1998

Epistemology	Definitions
Objectivism	A belief that certain things exist independently of human knowledge or perception of them.
Subjectivism	A belief that knowledge is merely subjective with no external or objective truth.
Constructionism	A belief that knowledge is 'constructed' in that it is contingent on convention, human perception and social experience

This research adopts a constructionism stance which defines that meaning is not discovered, but rather it is constructed. In adopting this epistemological stance, the research paradigm acknowledges constructivism as focusing on an individual's cognitive understanding of the social world, and constructionism as viewing reality as being constructed through social

exchanges amongst various actors operating in particular social contexts (Quintana Vigola, 2015). The world, and the objects within, are indeterminate, emerging only when consciousness engages with them, constructed as people engage and interpret. Therefore, constructionism cannot simply describe meaning as objective or subjective. Rather, it puts them together believing unambiguously that there are multiple interpretations. Of course, certain interpretations are more useful, less oppressive, more fulfilling and rewarding than others, but they are not less valid.

Constructionism has significance and empathy to the purpose and process of planning, as well as all other stakeholders involved in shaping the built environment. It allows for multiple realities and conceptualisations of the community; emphasising culture and multiplicity of views (Greed, 2000). As an approach to social sciences, it draws influence from philosophy and sociology making it multidisciplinary in nature (Burr, 2003). Constructionism is open to multiple perspectives of how participants perceive something within a culture, hence, knowledge that has been socially constructed within cultures, with differing interests and priorities, emphasise how social origin and social character represents only partial truth (Naidoo and Wills, 2008). The reciprocity between different disciplines provides the research context in which to explore collaboration and culture and refers specifically to the professional values, norms and customs across actors in the built environment and public health sectors.

Hannigan (2014) expresses how social constructionism has garnered some critical “heat” but believes that the core discipline has been misinterpreted. Although his work here is centred around environmental debate, he clarifies that social construction plays an identifiable role in producing knowledge about certain risks, stating the need to look more closely at social, political and cultural processes which may contribute to unacceptable conditions. For the purpose of this research, in critically investigating the social dynamics and cultural interplay amongst professionals in collaborating towards achieving active living environments, Van den

Broeck (2015: 139) provides a strong rationale for adopting a social-constructionist perspective, arguing that:

> within a predominantly social-constructionist epistemology, planning research provides insight into how planning practices, tactics and strategies are part and parcel of social dynamics and the interplay of agency with socio-economics, knowledge systems, cultural expression, values and imagination and discourses.

Taking Van den Broeck's (2015) position, this research follows a social-constructionist epistemology. Social constructionism emphasises that all meaningful understandings of reality, specifically regarding professionals under investigation in this study, may be socially constructed. The epistemological stance of professionals and associated cultural perspectives are relational to the ontological way the world exists. Invariably, this interplay allows for critical examination of how professional understandings influence policy, product practice and processes. This is quite significant as description and narration cannot be represented as straightforward realities, but rather how they have been influenced by cultures and how the meanings are interpreted. This is not a matter of rhetoric but reflects deep into the research, shaping the way data is obtained and how it is viewed. The philosophical stance of constructionism challenges the essential notions of positivism and adopting this acknowledges that the research cannot be objective and value free. This research considers how the range of actors may 'construct' knowledge about active living within their professional cultures and can address whether different professionals have differing stances (Andrews, 2012).

3.3 Qualitative Research Paradigm

Building on the epistemological position above, this research adopts a qualitative research paradigm and methodology. This must correlate with the epistemology to avoid any contradictions within the research project, as the different ways in which the world is viewed shape the way of researching the world (Quintana-Vigiola, 2015). Therefore, it was important

to keep in mind the epistemology, *social constructionism*, as this will directly influence the basis of logic and its criteria in the context of the research process.

Social constructionism lends itself to interpreting how reality is socially constructed. As Cockerham *et al* (1997) outlines, the contrast between human sciences of 'understanding' and social sciences of 'explaining' provides a strong argument for using the qualitative research paradigm of interpretivism to critically examine culturally derived interpretations of society. It is assumed that by placing those studied in their social contexts, there is more opportunity to understand how they perceive their own activities. This theoretical perspective seeks knowledge through qualitative data (Husserl, 1965) and has been reflected in the choosing of the research methods, explored in section 3.4.

The significance of adopting interpretivism for this research allows the researcher to be more concerned with 'relevance' of the findings/observations to the perspectives of those being researched. As interpretivism is situated on a real life/real world ontology the observations and findings are theory-based and value-laden. This position is critical for focusing on meanings processed of a phenomenon in texts, importantly on content and discourse analyses of planning policies and other associated documents (du Toit, 2015). Regarding participant research, such as interviews, an additional step can be taken to further the qualitative research paradigm in symbolic interactionism.

Symbolic interactionism branches off interpretivism. It deals directly with communication, interrelationships and meanings deriving from social interactions. Here, the perceptions, attitudes and values of those studied can be explicitly addressed. Blumer (1998) sets out three premises for symbolic interactionism. The first premise is that human beings act towards 'things' (activities such as commands or requests; and situations that an individual encounters in their everyday life) on the basis of the meanings that the 'things' have for them. The second premise is that the meaning such activities and situations are derived from, or arises out of, the social interaction that one has with one's fellows. The third premise is that these meanings

are modified through an interpretative process used to deal with the activities and situations of such encounters.

This directs the researcher to take the standpoint of those studied, recording the meanings of the actors. Therefore, the analytical approach of this research is to make sense of the situations and relationships between professionals and organisations that are grappling with ways to create active living environments. Although acknowledging the researcher will bring their own interpretation to the empirical findings this does not negate the need for a robust analytical framework.

Applying both social constructionism and symbolic interactionism is not unusual as one stems from the other. This can be seen in the work of Crotty (1998), O'Donoghue (2007), and being used within planning, public health research and research concerning communication, as the two are closely related to interpretive theories and are well established with the literature on qualitative research. Ward (2004) states how planning practice inherently carries professional assumptions on regulating and ordering urban space, and how this is achieved. Planners also work within a development process which is highly political and requires working with other cultures with different assumptions (Ward, 2004). Additionally, an important aspect to planning work is how they interpret planning policy in order to inform decision-making, and this also knits into symbolic interactionism. Symbolic interactionism not only derives from an anthropological philosophical viewpoint but also of hermeneutics, which is a branch of philosophy that deals with the interpretation of literary texts (Kant, 2018). Given the research emphasis on policy context and participant interviews this stance weaves seamlessly into the research framework strengthening the validity of the empirical findings. Furthermore, the field observations are interpreted individually by the researcher, although it is argued that those interpretations were manifested through the knowledge obtained by educational underpinnings. With this, the tools used in the conduct of the research are set out within the

methodology, which should align with the previous philosophical viewpoints and is deliberated on in the following section.

3.3 Methodology

The previous sections have explained that the philosophical viewpoints of the research are firmly based within interpretivism and therefore problematic to be wholly objective. Hence, the tools used regarding the research methodology, which is the plan of action that links methods to outcomes, must reflect this position. There are many categories of which qualitative research study methods can be carried out, the most common being; participatory, narrative, phenomenology, grounded theory and case study (Creswell *et al*, 2007). As this study explores the cultures and processes of professions in relation to active living within a particular context, a case study approach is appropriate (Table 3.2).

Table 3.2: Research Design

Source: Adapted from du Toit and Mouton (2013:132)

Research aim	Research purpose	Methodological paradigm	Methodological approach	Data sources	Core logic	Research design and methods
Theoretical aims	Interpretative Exploratory Descriptive	Interpretative social science	Qualitative	Secondary (policy analysis)	Interpretation, contextualsation and; phenomenolgy	Discourse (textual) analysis
				Primary (Hybrid of interviews and observational research)		Case study Interviews Observations

The methodology is the strategy and approach that lies behind the choices and uses of methods to best achieve desired outcomes (Crotty, 1998). In simpler terms, it is the way the researcher wants to achieve their goals. Table 3.2 identifies the typology to the research design outlining broadly that the purpose of the research is interpretative, exploratory and descriptive. In short, interpretative research derives meanings people make from abstract phenomena, such as, texts (e.g. policy), as well as norms and human experiences (e.g. culture). Therefore, an interpretative methodological approach is well suited to cater for the vast professional fields operating across the built environment, and relevant to this study, not only on professional accounts and experiences, but also professional views on policy documents. In addition, the research design has an exploratory research purpose, focussing on an unknown, or little understood phenomena, which is the understanding and operationalisation of 'active living' policy/environments in this study, and a descriptive research purpose, significant for planning research as it helps to better uncover the reality of practice, and what the reality of planning looks like on neighbourhood, city and regional levels (du Toit, 2015).

Different ontologies and epistemologies have resulted in distinct methodological paradigms to social research, which are philosophies of thinking how to conduct research and translating that into methodological questions. For example, how should one observe and measure a socially constructed reality? Therefore, all the elements to the methodology serve as the link between the epistemological positions and the more tangible outcomes, the paradigm of interpretative social science being that first consideration (du Toit and Mouton, 2013). Interpretative social science aims to describe meaningful social action that allows for further understandings of social reality – therein reality is socially constructed and constantly changing. This is a logical stance as not only do policy domains consistently change but so to do professional and educational structures, with new graduates entering fields with different mindsets and approaches perhaps from the senior professionals. This is particularly pertinent in active living research, and health more generally, as it has only came to the forefront of

planning recently and is still trying to find its place within the wider spectrum of the built environment.

The research utilises both primary and secondary data sources. By first discussing secondary data it reflects the structure of the thesis itself. Secondary data sources refer to data that has already been presented which in this case almost exclusively relates to policy documents[11] and is the first part of the empirical research (Chapter Five). Primary data is new sources and is typically in raw format which is then analysed and presented to address the research questions, which refers to the field observations and interviews (Chapters Six and Seven).

The core logic of this methodology is rooted firmly in interpretation, contextualisation and phenomenology, following du Toits and Mouton (2013) logic which links this directly to text, field and case studies being the most rational choices. The logic behind interpretation for textual and narrative studies lies within hermeneutical interpretation, a wider discipline which focuses on written and verbal communication and recognises not only will professionals have their interpretations but so to does the researcher. This is distinguishable from field studies by the data source being secondary, previously addressed, and the core logic linked to phenomenological interpretation which is directed towards an individual's (the researcher's) subjective experiences and meaning attached to real life phenomena. Lastly, the core logic of contextualisation echoes the unique phenomenon to be researched. Du Toits and Mouton (2013) have produced a tested methodological design which this research has used and adapted to fit more specifically (Table 3.2), although the case study methodological approach requires further attention.

The case study methodological design is a qualitative approach in which the investigator examines a case / cases; developing an in-depth understanding on how different cases provide insight into an issue, relying on multiple forms of data collection; principally interviews,

[11] Census data also utilised

observations and documents. Case study research (CSR) is an empirical method which investigates a contemporary phenomenon, referred to as the 'case', in an in-depth, real-world context. CSR recognises the multiple variables of interest and therefore benefits from prior theoretical propositions which help guide design, data collection and analysis. Data is reliant on multiple sources which then converge in the form of triangulation. As Yin (2003: 13) stated,

> [a researcher] would use the case study method because [they are] deliberately [wanting] to cover contextual conditions—believing that they might be highly pertinent to [the] phenomenon of study.

A 'case' is not necessarily a single individual. Many case studies have identified the 'case' as an event or an entity such as; decisions, programs and social movements. In CSR, multiple perspectives can be inquired, using a logic of replication where procedures on data collection are replicated for each case.

The procedures to CSR are central to social science research and are commonly found in social science disciplines; urban planning included. Case studies allow the researcher to focus intently on a 'case', retaining a holistic, real-world perspective such as studying organisational processes, performances and relations. Contrary to what some social scientists believe, CSR is not only exploratory, a focus on a relatively unknown, or little understood phenomena (du Toit, 2015), rather some of the most renowned case studies have been explanatory, providing causal explanations for the occurrence of events or phenomena (*Ibid;* Yin, 2017). Using this approach for cultural research can be dated back to Ruth Benedict's Patterns of Culture (1935) who uses CSR to explore the culture of three different societies. Her aim was to demonstrate how each culture had an internal consistency based on underlying principles.

CSR has also been identified as one means of changing the course of planning practice (Duminy, 2015). The value in this methodology is its capacity to generate concrete contextual data necessary for enhancing practice by fostering a nuanced understanding of a phenomena

in a given setting and how it came to be that way. The process of doing CSR specifically encourages the researcher to engage with many actors providing the opportunity to engage with 'daily urban realities' and 'informal urban practices' (Duminy, 2015: 444). Therefore, the exploration of professional practice regarding their everyday attitudes and experiences towards active living principles and considerations can be referred to as *the case*. The case then also provides opportunity to cover other areas of research into professional practice; collaboration for example.

CSR is effective in analysing complex causality and power relations as well as practical ethics and judgments which inform real-world planning outcomes. Flyvburg (2004) uses CSR to reorientate planning research towards a pragmatic position, which he refers to as phronetic[12] planning research, values that drive practice and issues of power. Flyvburg (2006: 239) later argues that:

> the case study is a necessary and sufficient method for certain important research tasks in the social sciences, and it is a method that holds up well when compared to other methods in the gamut of social science research methodology.

Planning by nature is multi-disciplinary and complex therefore the CSR approach is reflective, addressing how professions act and interact in practice and how the preconditions of their 'culture' impacts on those interactions, how policy intertwines and is incorporated in practice, and direct built environment observations. The use of CSR and its ability to understand how active living is represented in a given profession is advantageous in furthering research in this area. The methods used for conducting the policy analysis, field observations and case study are presented in the following section.

[12] Phronetic is a contemporary interpretation of classical Greek social science of phronesis, translated as practical judgment, practical wisdom, common sense, or prudence (Flyvburg, 2016).

3.4 Research Methods

Research methods are the techniques and procedures used to gather data and how that data is then analysed (Crotty, 1998). Typically, empirical research is divided into two categories, qualitative and quantitative, which are selected in combination of epistemological position, research paradigms and methodology of which this chapter has developed (Van den Broeck, 2015). The previous section directed attention towards qualitative methods, a range of techniques which minimises flaws, strengthening research results and comprehensively achieves the understanding of the phenomena of active living and its application within professional practice (Hussein, 2009).

It is clear how each philosophical viewpoint interconnects and is tailored towards qualitative research in an effort to obtain better understandings of people's perspectives, feelings, attitudes and experiences, how these are socio-institutionally structured, and to uncover deeper meanings in processes and practices (Van den Broeck, 2015; Silverman, 2016). Consequently, this research used three types of empirical research methods to effectively tackle the overall aim of the research. These consisted of:

- A policy critique;
- Field observations and;
- Semi-structured interviews.

Policy sets out courses of action which are used to guide decisions; observations assess the end product in the actual built environment; and interviews gain insight into practices and processes and can supplement understandings into policy and products. These can, hereby, be identified as the 'Four P's of the research and are defined in Table 3.3.

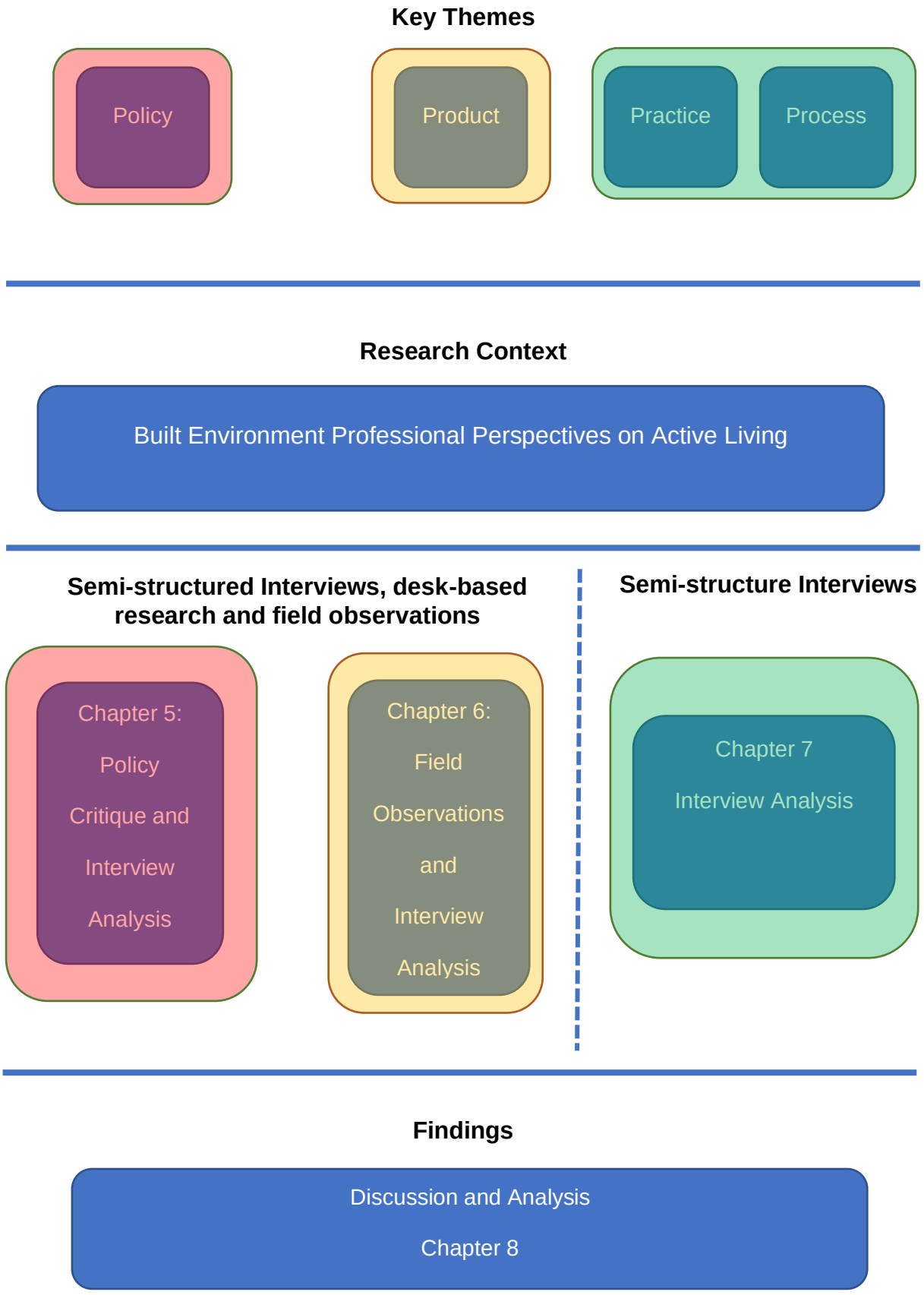
Table 3.3: Defining the Four P's

Source: Authors Own

	Policy	Product	Practice	Process
Overview	A course of action adopted or proposed by an organisation.	The result of human activity, action or process.	The conduct and work of someone from a particular profession.	A series of actions or steps taken in order to achieve an end.
Example	The SPPS	The Built Environment.	Professional cultures.	Collaborative governance.

The Four P's enables effective coverage of the empirical work undertaken and are used to form the structure of the following empirical chapters 5-8 (Figure 3.1).

Figure 3.1: The 4 P's Framing Empirical Research



3.4.1 Policy Critique

All decisions within the built environment are subject to planning approval which is ultimately based on adherence to planning policy. Thus, the need to critique policy on how it addresses active living is important to analyse how decisions could be made on this basis. Although active living is used throughout the literature on health and urban planning, such language may not be used within policy and as such the need for a robust critique was recognised to cover all areas associated to the concept of active living, such as health more generally, obesity and physical activity. The interviews assisted with informing the credibility and confirmability to deal with bias and distortion, the three methods being used together to help the triangulation of findings and analysis.

Policy has been gaining increased attention in political, professional and academic circles (Peel and Lloyd, 2007). The nature of governance and public policy is dynamically complex and densely interconnected and as a result is often open-ended and unpredictable. There is a requirement for a theoretical frame for the content analysis of planning policy to enrich the findings and to extract the information necessary for the research. Aligning with the philosophical positions of the research framework, interpretative forms of policy analysis emphasise the centrality of human interpretation, to both the actor and the researcher (Yanow, 2000). Consequently, this results in the meaning of the research setting being highly variable depending on the perspective and providing possible opportunities to obtain correlations between professionals. By analysing and critiquing planning policy, practical policy concerns around the application of active living within can be addressed whilst simultaneously obtaining the perspectives of the participants on the same issue (Durnova *et al)*.

The theoretical framing of the policy critique is based on discourse analysis. Discourse analysis is an effective approach for in-depth policy critiques and has been used throughout planning research (Rydin, 2003). The interest of discourse has been associated to the rise in social constructivism as it ‘reveals the hidden’ and unpacks areas of planning which are

perhaps taken for granted (Rydin, 2003: 15). Furthermore, the rhetoric within policy has been debated particularly in urban governance literature and how rhetoric influences and reflects relationships. Other strands of discourse method relate to a constructionist perspective in which language, knowledge and power are interconnected through discourse. This perspective views language actively constructing actors and the relations between actors. Both strands of discourse are often mixed which creates a useful framework for analysis. Rhetoric cannot be underestimated as it has such significance in how people are persuaded and convinced (Barry *et al*, 2008).

The policy critique consisted of the hierarchy of Northern Ireland's policy, beginning with the draft Programme for Government (PfG) and ending with Local Development Plans (LDPs). The LDPs considered were the Belfast LDP due to regional significance of the Belfast area and its significance within the thesis, and Armagh Banbridge and Craigavon Borough (ABC) who, at the time of the research, were the Councils had completed the production of their Preferred Options Paper (POP)[13]. Regional development, planning policy and design guides were also thoroughly investigated.

The following chapter explains the governmental reform which occurred throughout the UK in recent decades and unwarps the current policy and political context of NI in more detail. Given the interpretive theoretical stance and how both the researcher and actors have their own perspectives on the content of policy, English professionals who work with the NPPF on a daily basis also participated in the interview process. This provided a different context to reflect on throughout the empirical chapters and within the discussion and analysis and supplements the research conducted in Northern Ireland.

[13] The third was Derry and Strabane District Council who decided not to participate in this research.

3.4.2 Field Observations

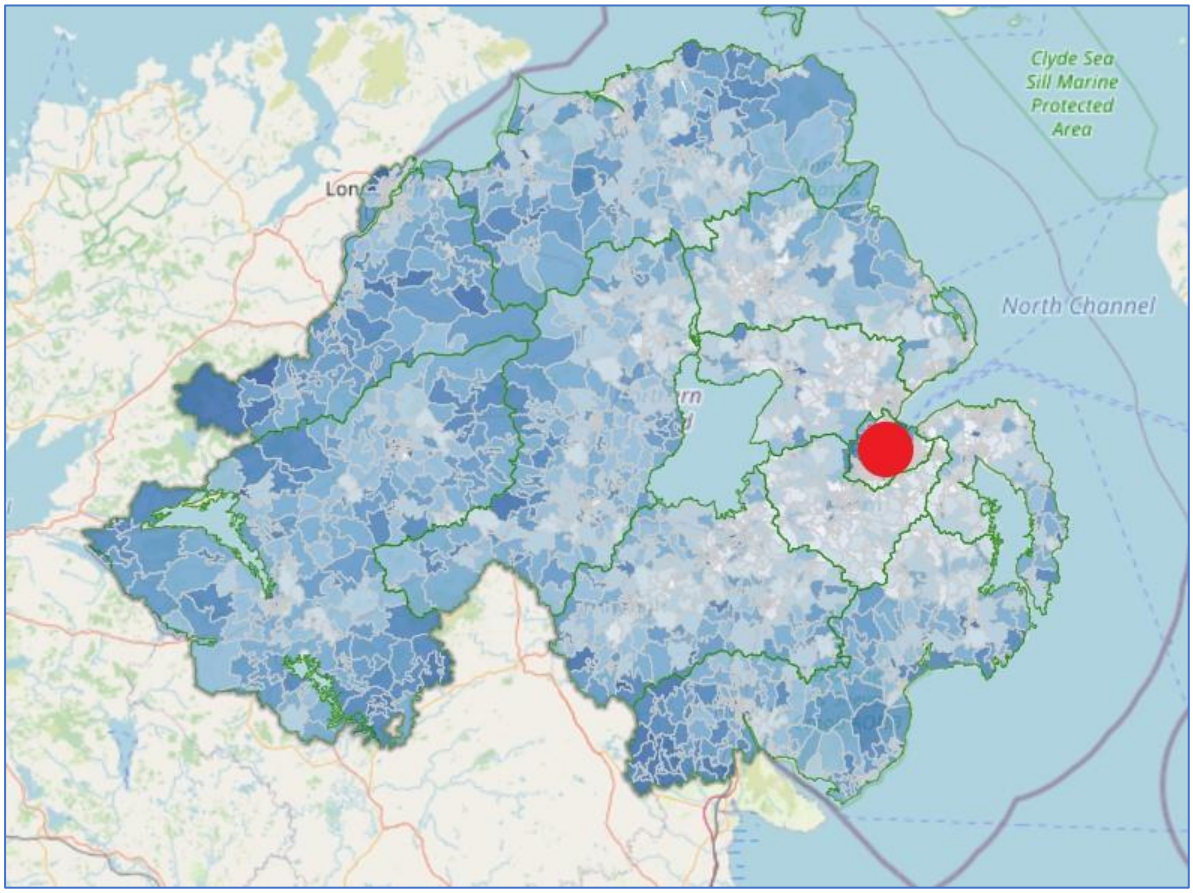
The literature review identified and discussed how physical variables within the built environment can result in whether an area is successfully 'active' or not. These variables can be assessed by carrying out field observations of a study area whilst also adding an extra layer to the empirical research. Increasingly, evidence emerging from practice suggest greater use of assessments of environmental influences on physical activity as an additional measure in the contribution to tackling the rise in obesity and inactivity. This is grounded in the core logic of field studies being phenomenological interpretation of the researcher's experiences in a natural setting and how they interpret and make sense of the built environment – drawing on the importance of Flyvbjerg's 'phronetic planning research' of practical judgement and pragmatism. The audits used in this area of research are predominantly systematic observational assessments of the physical and social environmental features which could either hinder or facilitate physical activity (Hoehner *et al,* 2007). There are a vast number of auditing tools for measuring the built environment for physical activity, ranging from a focus on children, age, genders and ethnics, to parks and trails (Brownson *et al,* 2009). For example the focus of the Senior Walking Environmental Audit Tool (SWEAT) is on seniors, with variables including functionality, safety, destination amongst others. The Pedestrian Environment Data Scan (PEDS) is carried out at pathway or street level. Consequently, the plethora of assessments within the field of physical activity allowed the researcher to identify which were more appropriate for the empirical research conducted, those that orientated towards active living. Initially five assessments were selected as having significant relevance to the research. These included:

- Active Neighbourhood Checklist; Hoehner (2011)
- The Systematic Pedestrian and Cycling Environmental Scan (SPACES); Pikora *et al* (2000)
- The Walkability Assessment Tool, University of Delaware and Institute for Public Administration; O'Hanlon *et al* (2016)

- Active Planning Toolkit 2, by Gloucestershire Conference; Ballantyne and Blackshaw (2014)
- Active Living Impact Checklist by Heart Foundation; Bellis *et al* (2012)

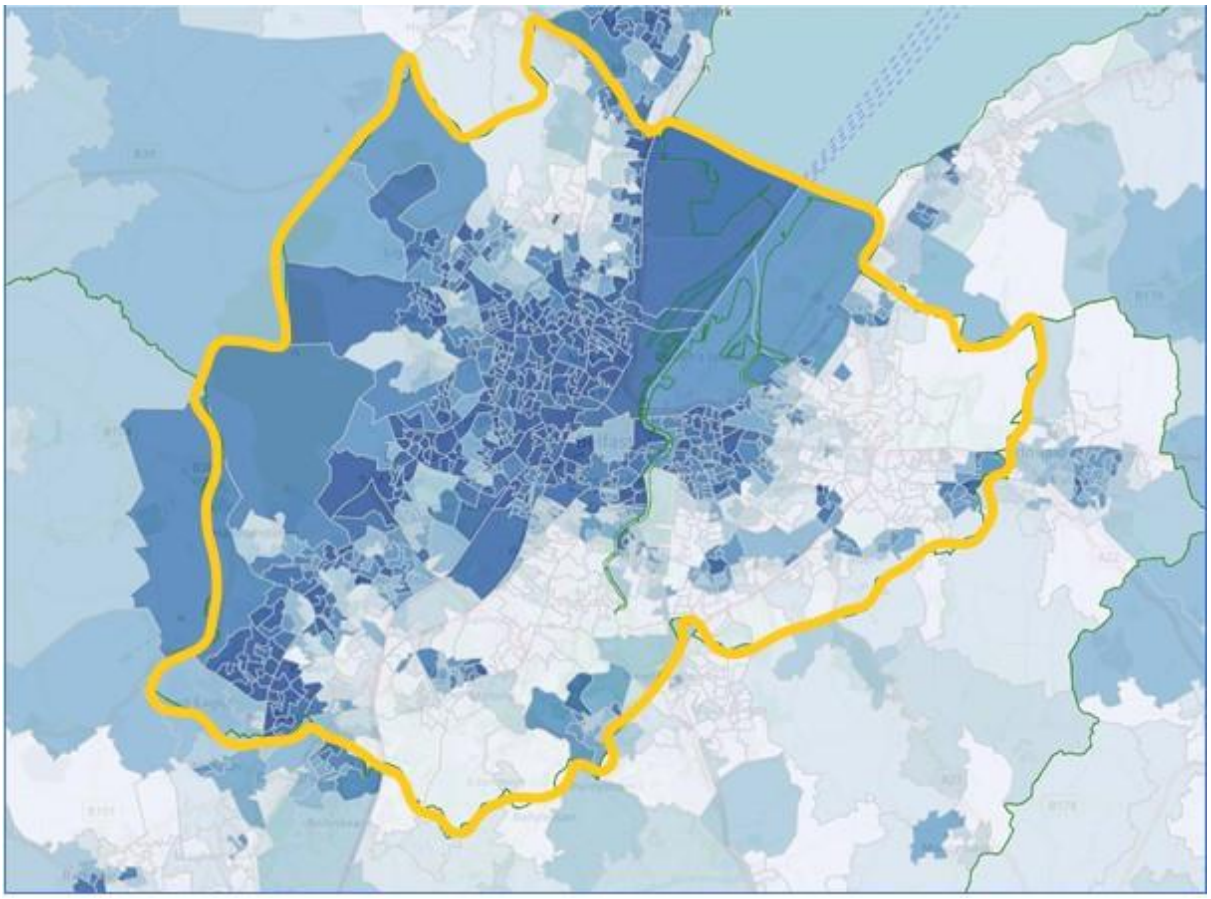
All observation, including a pilot study, were conducted in Belfast City (Figure 3.2)[14]. The figure below illustrates all the Super Output Areas (SOAs)[15] in NI and Belfast has been circled in red. Figure 3.3 illustrates the Belfast Local Government District (LGD) along with SOAs within. The LGDs refer to the Council areas in NI.

Figure 3.2: All NI Local Government Districts and Super Output Areas with Belfast Local Government District circled in red



[14] All of the maps in section 3.4.2 are sourced from NISRA and adapted by the Author.
[15] The SOAs in the maps below are in different colours to represent the Multiple Deprivation Measure

Figure 3.3: Belfast Local Government District (Outlined in yellow)



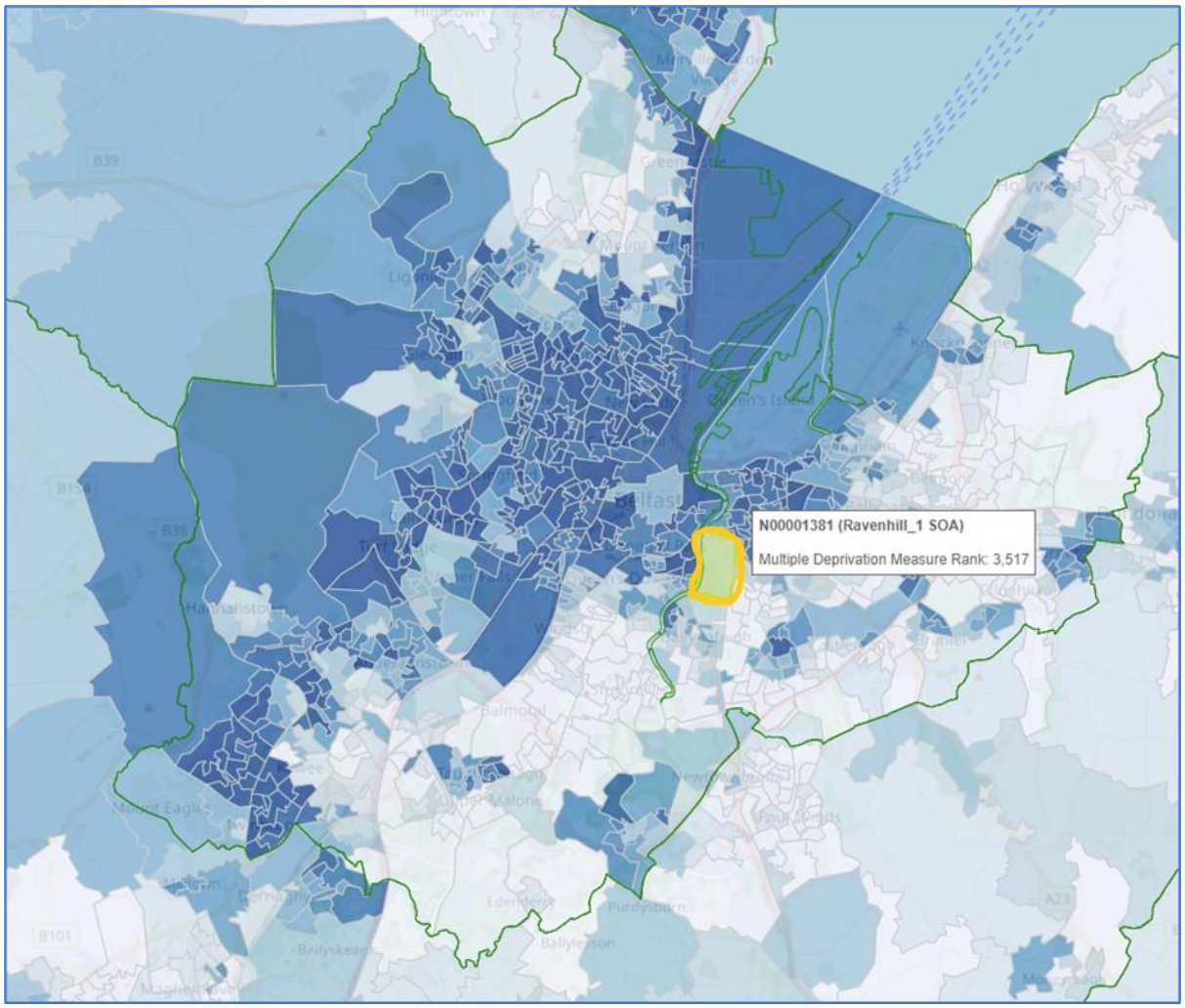
3.4.2.1 Pilot Study

The aforementioned checklists were first used in a pilot field observation in Belfast City, in a small residential development named Ballynafoy Close, which is a small residential estate located within the Ravenhill 1 SOA (Figure 3.4). This proved pivotal as the checklists function and results could be assessed with regards to relevancy. The researcher found certain themes were included in all five, while others contained unique criteria. Some criteria were considered irrelevant for the purpose of the research. For example, Bellis *et al* (2012) included Government guidance relevant only in Australia[16], Ballantyne and Blackshaw (2014) 'scorecards' are targeted specifically towards local councils. Consequently, all relevant criteria were extracted from each of the five assessments to create a bespoke assessment which

[16] Access and Mobility General Code, Liveable Housing Design Guidelines

explicitly related to the area of research exclusively, covering areas of active transport; aesthetics and; connectivity. The checklist can be viewed in Appendix One. These core criteria align with the fundamental principles of active living (Table 2.1).

Figure 3.4: Location of Ballynafoy Close (Outlined in yellow)



The field observations contained a walking element which provided immersion in a particular urban setting to observe first hand people's lived experience and to critique the urban form and fabric for features that positively or negatively influence active living. Acknowledgement is given to the influences being informed through the researcher's individual experiences through the underlying philosophical discourse throughout this chapter.

3.4.2.2 Case Selection

An investigation was carried out concerning on statistical data in Northern Ireland by using information provided by the Department of Health (DOH) in order to obtain relevant places to conduct the observations. These statistics consisted of obesity, physical activity, health deprivation and multiple deprivation. Regarding obesity in Northern Ireland, statistical data was poor due to low sample sizes of only 4000 people, which could not provide a good understanding of general obesity. Furthermore, statistics on physical activity levels in NI, from the NI Travel Survey, had sample sizes averaging 2,500, again poor representation of NI as a whole. A member of DOH explained how the most local statistic sample size was at the post code level, however, it would be too difficult to obtain data with regards to the nature of the data concerning obesity or physical activity. Therefore, the most effective data was obtained from the Health and Social Care in Northern Ireland (NIHSC) Inequalities Monitoring System, at a Local Government District level and deprivation quintiles. The data obtained at this level, focused on childhood statistics, specifically children in Primary 1 and Year 8. Whilst this study is not focused on children, NI provided more comprehensive data regarding this demographic which demonstrated a trend which could be further analysed. Data analysis revealed that the most deprived areas had a higher percentage of obesity than the NI average, and lower percentage in the least deprived. Table 3.4 also demonstrates that the most deprived areas in Belfast have much higher levels of obese children compared to the NI and the Belfast average. While the least deprived areas have much lower levels of obesity than the NI and Belfast average.

Table 3.4: Primary 1 and Year 8 Obesity levels within Belfast Deprivation Quintile LGD

Source: NI Health & Social Care Inequalities Monitoring System

	Percentage of Primary 1 children classified as obese	Percentage of Year 8 children classified as obese
Northern Ireland	5.2%	7.1%
Belfast LGD	5.2%	6.5%
Belfast Deprivation Quintile LGD 20% Most Deprived	6.6%	9.9%
Belfast Deprivation Quintile LGD 20% Least Deprived	4.4%	3.7%

The data concerning physical activity was also at Local Government District (LGD) level and deprivation quintiles. According to the Health Survey Northern Ireland 2016/17, the Health and Social Care Trust[17] found the percentage of respondents in Belfast that met physical activity guidelines was only 53%, the rural West only scoring lower. Furthermore, nine out of the top ten most deprived SOAs regarding the health and disability domain are located in Belfast; and five out of the top ten ranking of most deprived SOAs regarding multiple deprivation measure (MDM) domain are also in Belfast. This denotes that within the domains of health and multiple deprivation, Belfast is significantly more deprived than the rest of Northern Ireland

Belfast was justifiably selected. The data obtained from the DOH[18] helped narrow the scope to SOAs using the information on individual quintiles. SOA are a relatively well established

[17] Areas included Belfast, Northern, South Eastern, Southern and Western.
[18] The NI Health & Social Care Inequalities Monitoring System, HSCIMS Report 2018, HSNI trend tables, Travel Survey for Northern Ireland (TSNI) Technical and In-depths Reports, Northern Ireland Multiple Deprivation Index 2017 (NIMDM2017) and data correlated by a member of the DoH in spreadsheet format.

geography introduced in 2001, developed to improve small area statistics. Northern Ireland is divided into a total of 890 SOA which contain similar population sizes, averaging 2,100 people and 818 households. Therefore, the geographical size of the SOA varies in relation to how densely populated they are, meaning the more densely populated an SOA is the smaller the geographical footprint. SOA also resembles the size of a neighbourhood which resonates with the scale in which active living is most effective (Table 2.1). Therefore, further investigations were carried out with regards to SOA specifics to narrow down certain areas for observational work by using the domains alluded to above. The Health domain was chosen due to the association to the research (and included preventative deaths, physical health, cancer) and additionally the multiple deprivation domains which is the representation of overall levels of deprivations was incorporated to provide more general data in the hope of identifying patterns within the data. This domain identifies proportions of the population whose quality of life is impaired by poor health or disability. In addition to the health domain, the more general measure of Multiple Deprivation was chosen to provide a broad deprivation rank which combines the 7 deprivation domains together[19]. Consideration into the top 10 most deprived areas within these domains resulted in two SOAs recurring in both, which are illustrated in Table 3.5 and 3.6. These SOAs were the location of Field Observations.

Table 3.5: Health and MDM rankings – top 10 most deprives SOAs in Belfast

Source: NISRA

Health Deprivation and disability Rank Domain 10 most deprived SOAs in Belfast			**Multiple Deprivation Measure 10 most deprived SOAs in Belfast**	
Rank	SOA Name		Rank	SOA Name
1	Whiterock 2		1	Water Works 2
2	Collin Glen 2		2	Ardoyne 2

[19] Income Deprivation Domain, Employment Deprivation Domain, Health Deprivation & Disability Domain, Education, Skills & Training Deprivation Domain, Access to Services Domain, Living Environment Domain and the Crime & Disorder Domain.

3	New Lodge 2		3	New Lodge 2
4	Water Works 2		4	Woodvale 1
5	Whiterock 3		5	Ardoyne 3
6	Ardoyne 3		6	Woodvale 2
7	Falls 2		7	Water Works 1
8	Water Works 1		8	Ardoyne 1
9	New Lodge 1		9	Woodvale 3
10	Falls 3		10	Shankill 2

The same method was carried out for SOAs located in the top 10 least deprived areas of Belfast with similar results below.

Table 3.6: Health and MDM rankings – top 10 least deprived SOAs in Belfast

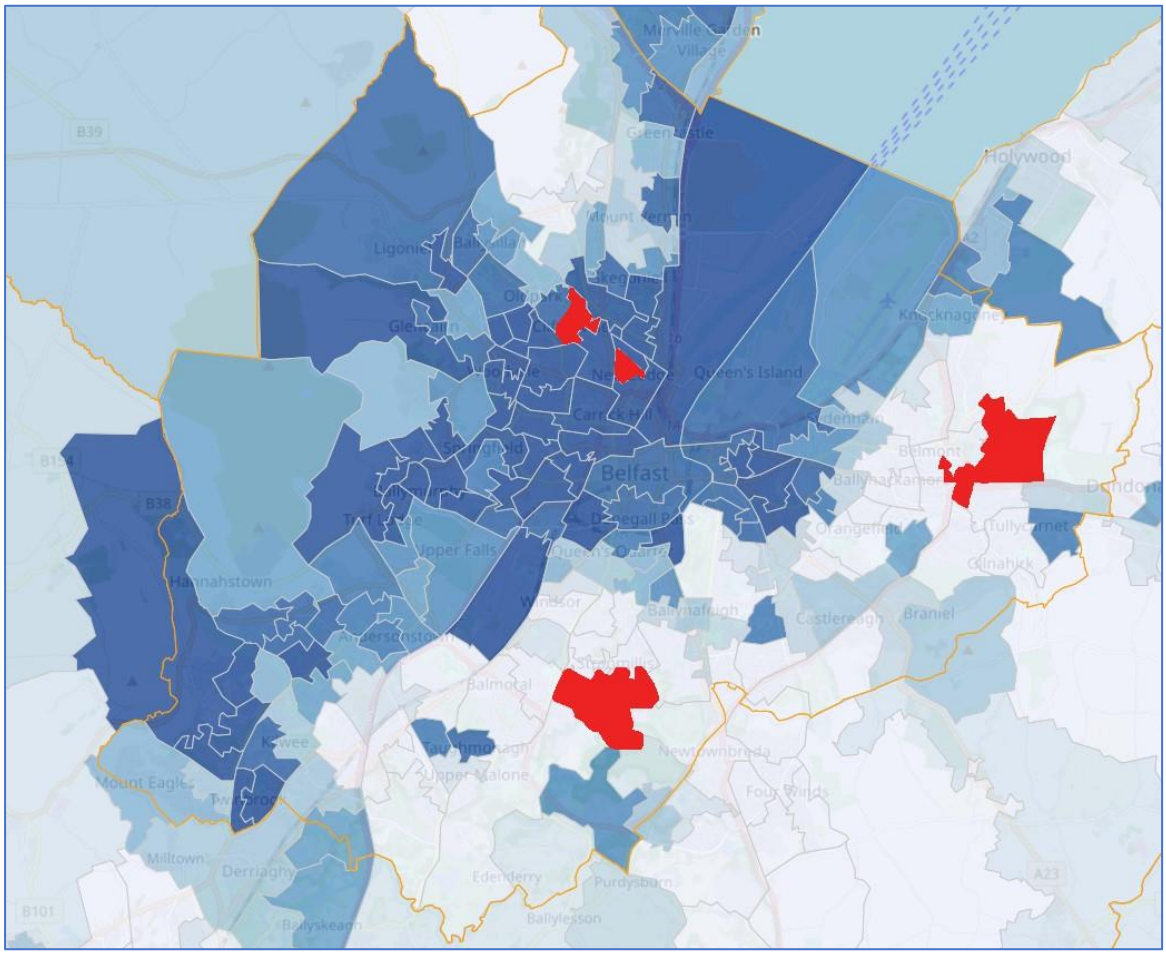
Health Deprivation and disability Rank Domain 10 least deprived SOAs in Belfast			**Multiple Deprivation Measure 10 least deprived SOAs in Belfast**	
Rank	SOA Name		Rank	SOA Name
1	Stranmillis 4		1	Belmont 1
2	Stranmillis 1		2	Stormont 2
3	Stranmillis 3		3	Stranmillis 2
4	Malone 1		4	Stranmillis 1
5	Stormont 2		5	Cherryvalley 2
6	Stranmillis 2		6	Hillfoot
7	Stormont 1		7	Knock 2
8	Malone 2		8	Rosetta 3
9	Upper Malone 1		9	Stranmillis 4
10	Malone 3		10	Gilnahirk

Other domains were considered, such as access to services (poor physical and online access), which is often associated to deprivation and obesity, however in Northern Ireland the top 10 most deprived areas regarding access to services score relatively high in terms of multiple deprivation and health, and therefore access to services is evidently more associated to rurality. The Living Environment domain was considered as it included quality of housing

and the outdoor physical environment however, the domain also included the proportion of unfit dwellings, requiring adaptations, or in need of repair; overcrowded households; road traffic collisions; and road defects; and the proportion of properties in flood risk areas. It was recognised that the domain is not appropriate for the research area and was excluded.

Therefore, the areas chosen were Water Works 2 and New Lodge 2 both appearing within the top 5 of the most deprived in the MDM and health domains, and Stranmillis 1 and Stormont 2, being in the top 5 of the least deprived domains. Figure 3.5 below illustrates where these areas are located in Belfast LGD, with Water Works (furthest north) clustered closely with New Lodge (south east of Water Works), Stormont located east, and Stranmillis south.

Figure 3.5: Field Observation SOAs highlighted in red.



This provided 4 distinct areas at SOA level to observe and to utilise the checklist created to examine aesthetics, active transport and connectivity of each area, scoring each category and drawing out how the score related to the characteristics of the built environments. The scoring approach was based on a traffic light scoring system which the researcher interpreted. Each assessment criteria had a check in a green, orange or red box. Green was interpreted to mean that it there were strong observational associations to active living principles, orange reflected a modest or average association and red being little to no observational association to active living. The individual SOA map areas are illustrated in the context of Belfast LGD and a more local context in figures 3.6-3.13.

Figure 3.6: Water Works 2 in reference to the Belfast LGD

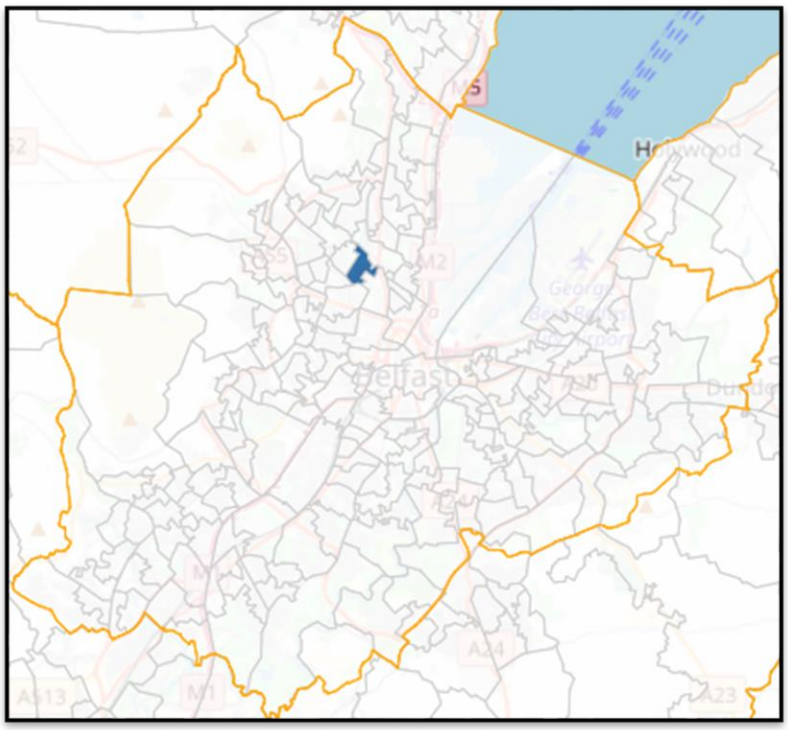


Figure 3.7: Water Works 2 Super Output Area

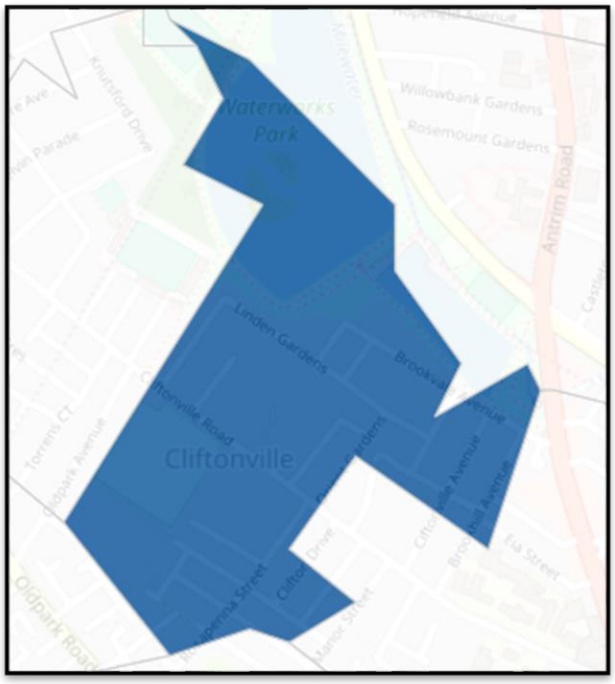


Figure 3.8: New Lodge 2 in reference to the Belfast LGD

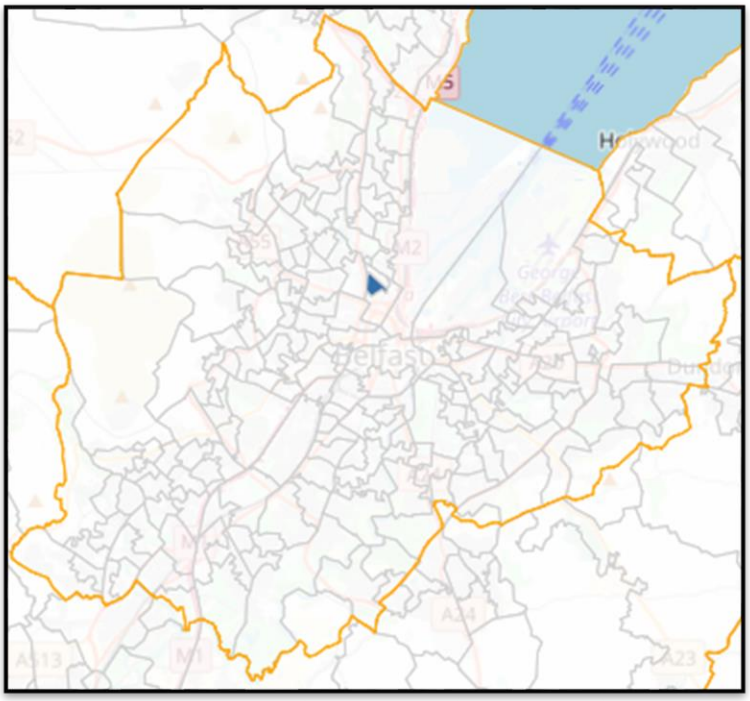


Figure 3.9: New Lodge 2 Super Output Area

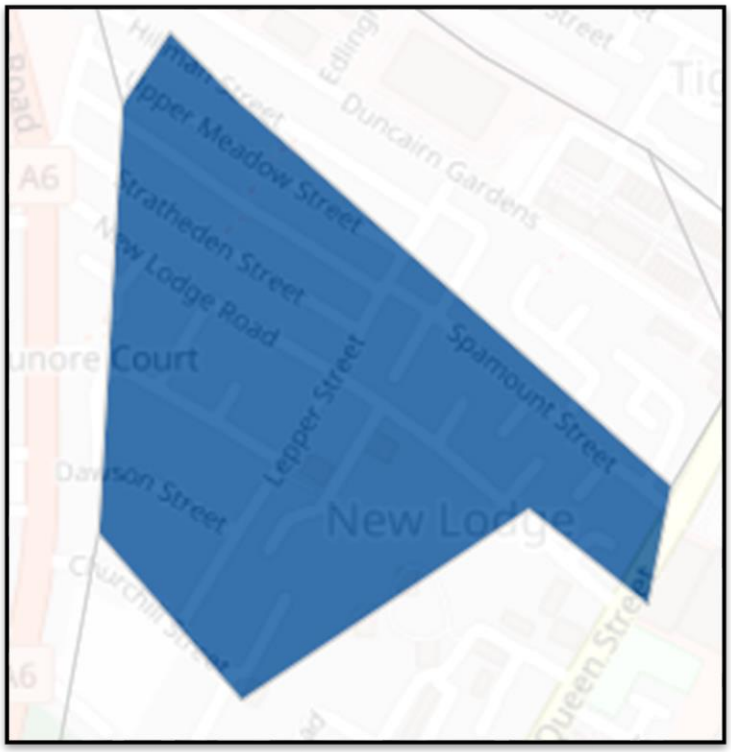


Figure 3.10: Stranmillis 1 in reference to the Belfast LGD

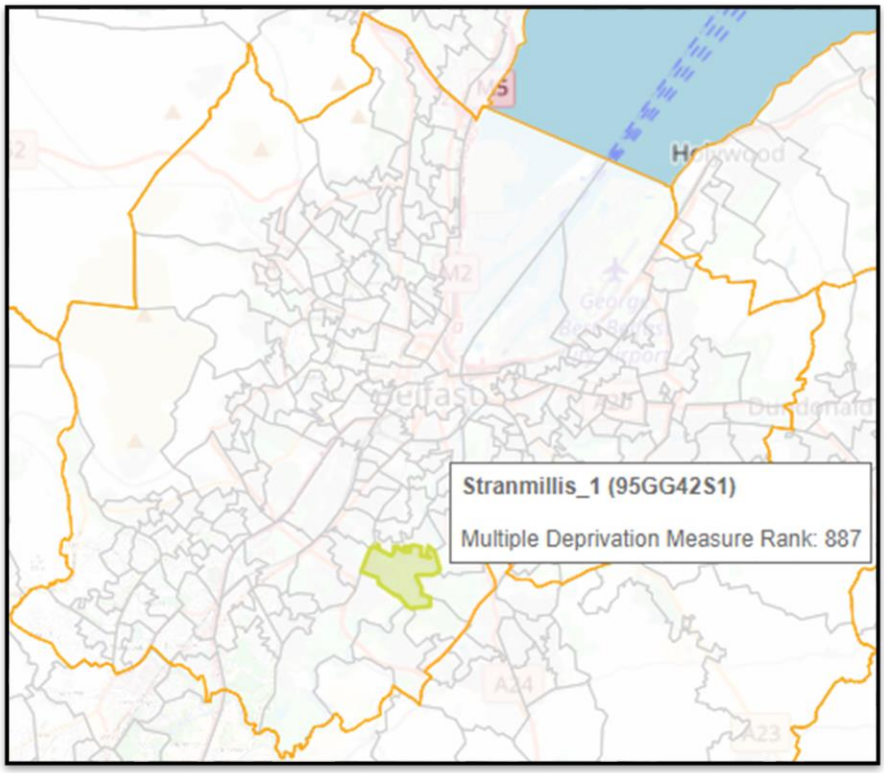


Figure 3.11: Stranmillis 1 Super Output Area

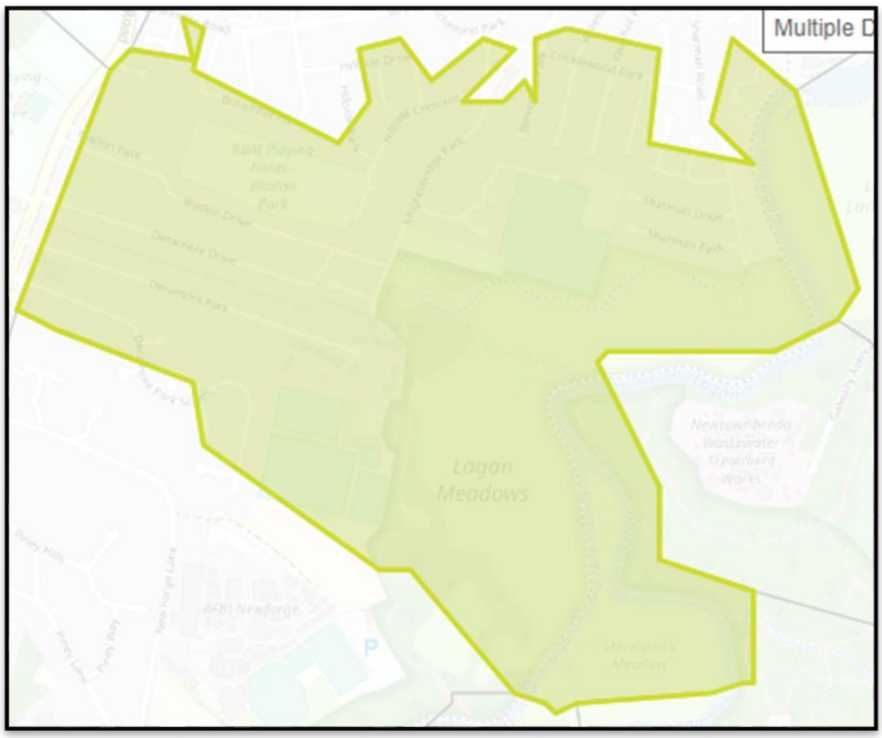


Figure 3.12: Stormont 2 in reference to the Belfast LGD

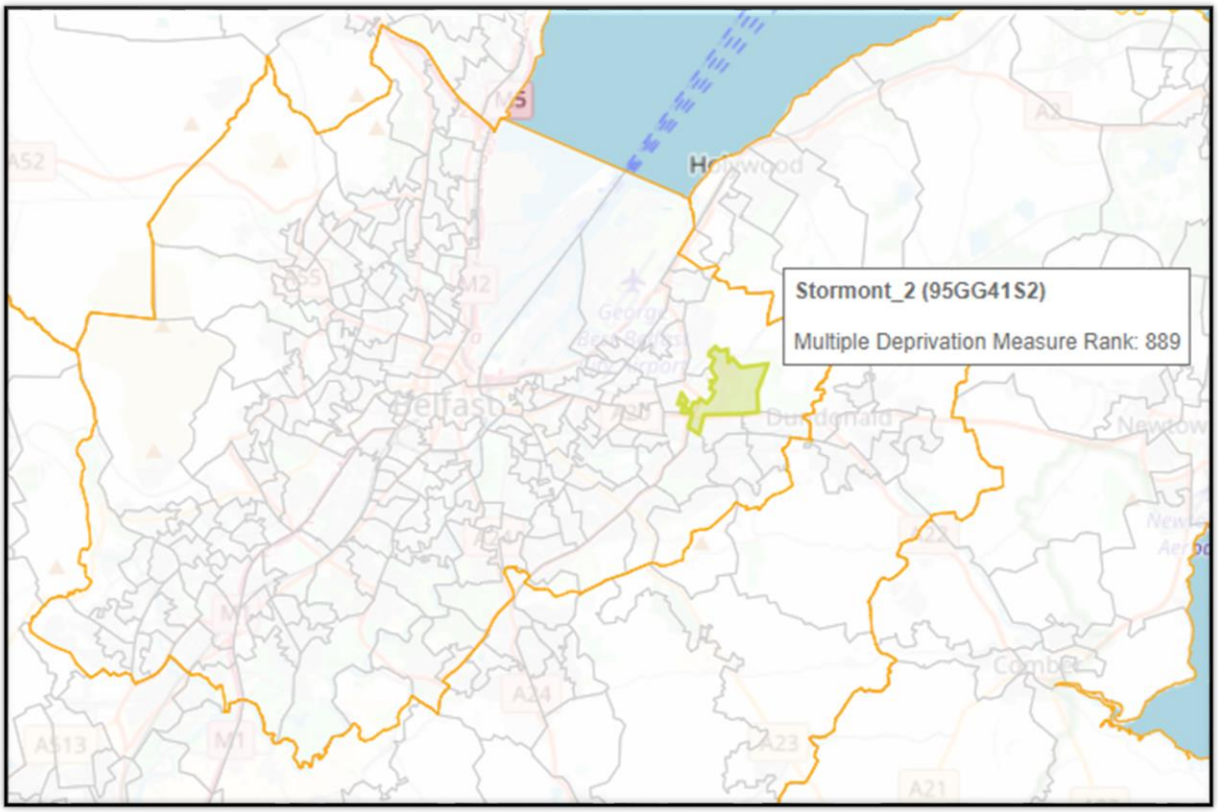
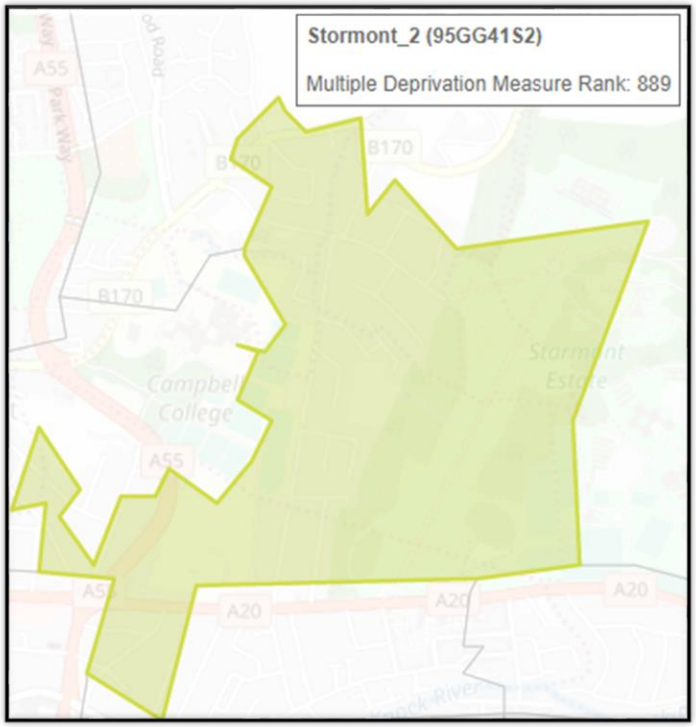


Figure 3.13: Stormont 2 Super Output Area



3.4.3 Interviews

Interviews are a central method to uncovering professional perspectives, experiences, feelings and attitudes and are effective in both obtaining general information and in-depth descriptions (Håkansson, 2015). They aim to understand, discover and interpret perceptions, feelings, experiences and attitudes comprehensively. Case study research was identified as the chosen methodology and interviewing key informants is a core technique used in divulging in-depth information through the perspectives of someone who knows and understands their own culture (Pinel, 2015). In this case, professional culture and it's norms, guiding principles, beliefs, motives, and constraints that frame how built environment and health professions understand 'active living' provide the appropriate contextualisation which adds value and gives real meaning to the communicative data.

Qualitative interviews attempt to understand the world from the participants' point of view and are used to unfold the meaning of their world (Kvale, 2006). Interviews provide the opportunity

for the participants to freely present their experiences and offers close and personal interaction between the researcher and the subjects. It also affords an equal voice to those who may be marginalised, or with less power, than others in their given professional setting, for example a member of a small charity and the head of a regional department are given the same time and platform as each other.

This research followed a semi-structured interviewing technique which opens opportunities for 'probing' for further details, allowing for new and unexpected themes to emerge (Pinel, 2015). This approach was chosen due to the varying nature of disciplines involved within the interview stage of the research, ranging from planning, architecture, development and engineering. This achieves some level of consistency, allowing the lines of questioning to be tailored, while keeping with the core themes (Colvin *et al*, 2016). The process of a semi-structured interview involves a set of thematic, predetermined questions which allows the participants freedom to present their responses. The atmosphere is generally conversational and relatively naturalistic and due to the open manner of the questions interviews often identify emergent themes which are 'probed' enriching and adding value to the data collected as themes may emerge that were not expected. There must also be a balance as unnecessary information can dilute and distract from the intention of the interview. A fitting skill which is required for such a technique is referred to as 'active listening', which is being aware of the core questions, whilst notably listening to the participant, taking notes, probing at the right time and proactively directing the interview back on track if it strays off topic (Håkansson, 2015).

Initial recruitment obtaining interview participants was purposive, in that conferences and networking events were attended, including a Ministerial Advisory Group symposium, several UPLAN seminars hosted by Ulster University and The Big Meet 6[20] in University College London amongst others. These initiated dialogue with professionals who expressed interest

[20] The Big Meet is an annual conference hosted by Place Alliance which provides an opportunity for a diverse range of organisations across the build environment sectors to come together to discuss and debate contemporary issues.

in the research, and four interviews were preliminarily arranged using these networks. Snowball sampling proved beneficial in recruiting further participants who in turn provided more snowball sampling (Colvin *et al,* 2016). Other professionals were approached via cold calls, with varying results, some which lead to interviews and others dissolving and communication halted.

An interview guide was used, providing structure to the interviews and also making the analysis of the interviews easier, as all interviews had a similar format. The questions asked were open ended and the responses provided gave insight to their interactions with their peers and other professionals, their thoughts and experiences of active living and their own professional roles and assumptions. Interviews, especially, can allow the practitioners to critically reflect on their profession by letting them see their own practice from 'the outside' and reflect more deeply. This is in line with the assumption that humans create meaning when interacting with others (Håkansson, 2015).

Three documents were sent to each professional contacted prior to the arrangement of an interview for them to consider whether they would like to participate in the research and consisted of:

1. Information Sheet: containing a summary of the research, the role the participant will provide to the research, what was expected and other necessary information which covers other areas of general ethics (Appendix Two).
2. Interviews Questions: including the seven core questions to the research, so they could prepare for the interview itself. The interviewer also had a list of these questions during the interview along with probing questions which the participant did not have, which provided the semi-structure to the interview, as not all probes were the same for each participant (Appendix Three).
3. Informed consent statement: a statement which is read by the interviewee and signed. This statement is to inform the interviewee of their confidentiality. It defines the

parameters, builds rapport, identifies the rules and highlights the research process. and was sent via email to all participants (Appendix Four)

Once these documents were sent, the interviews required arranging and completing, therefore four additional matters were addressed:

1. Deciding how to recruit potential interviewees to participate. This was done largely via telephone call, although some emails were used, then an interview was arranged.
2. Data collection. Two audio devices were used (a "Dictaphone" and a mobile phone) so that the interview could be recorded (two devices as an insurance) and a verbatim transcript later written. Notes were also taken throughout the interview to highlight key points that may have emerged.
3. Establishing a rapport is vital. This can be as simple as maintaining eye contact, facial expressions and being obviously involved by actively listening. A short informal conversation was often used as an ice breaker prior to the commencement of the recorded device being switched on.
4. Following the interview, the audio was verified, and transcriptions began. The researcher can then begin coding and analysing the data (Silverman, 2015)

The interview questions are intended to provide support or opposition to what is written within the discourse of the literature. It is essential to ask questions which will produce both interesting as well as informative findings. The interview questions were specifically crafted to avoid any underlying influences, providing an unbiased interpretation of the subject matter. It is imperative that the interpretations of the phenomena studied represent those of the interviewed and not those of the researcher (Holloway *et al,* 2010).

The interview process was continued until no new insights would be obtained from additional interviews, referred to as 'data saturation' (Ritchie *et al,* 2003). Failure to achieve saturation impacts on the quality of the research, hampering the validity of the study. The dilemma of

empirical research regarding saturation is how many interviews are enough to reach data saturation (Fusch and Ness, 2015). It is important to recognise the difference in *rich* as in quality and *thick* as in quantity and the ability to achieve balance between the two. Data saturation occurred when no new information emerged from the respondents. The empirical portion of this research reached saturation at forty interviews and consequently the analysis could begin.

3.4.4 Interview Coding

Professionals participated mostly from the Planning (P), Architecture (A), Civil Engineering (E), Public Health (H), Property Development (D) and Not-for-profit (N) fields. All have remained anonymous due to ethical considerations. All professionals align with the conceptual foundations of what 'professional' implies which was explored in Chapter Two. In order to represent the participants and distinguish between them, coding was associated to each participant (Table 3.7).

Table 3.7: Participants, profession and coding

Professional Perspective	**Coding**
Planners	P1, P2, P3, P4, P5, P6, P7, P8, P9, P10, P11, P12
Architects	A1, A2, A3, A4, A5, A6
Civil Engineers	E1, E2, E3,
Not-for-profit	N1, N2, N3, N4, N5, N6, N7, N8,
Property Developer	D1, D2, D3, D4, D5, D6
Health	H1, H2, H3, H4, H5
Total	40

Objectively, planners responded to the research more than other professions, which is understandable given the emphasis the thesis has on planning concepts and planning policy. Furthermore, the professional perspectives associated to participants within the same field

were broad and contain an eclectic mix, ranging from councils, government bodies, private sectors and academia. The interviews took place in Northern Ireland, with the majority being carried out in Belfast, mostly at the professional's place of work but also at local cafes. Other locations consisted of Derry, Armagh and telephone interviews to several professionals working in England to provide context to the research outside Northern Ireland. In truth, the professionals who provided additional context did not add anything new.

Planners, architects, NGO and health professionals were very willing to speak on the topic area, even though some thought they would not contribute much to the research. Engineers and property developers were incredibly difficult to speak with, and there were challenges regarding this throughout the empirical work. When engineers and developers were initially contacted, the majority either refused or did not respond to emails or calls resulting in an inability to arrange interviews. Ideally, more engineers would have been welcomed however this in itself is a finding, as almost just as many engineers were approached to participate but they were not as interested in the research. Past participants were contacted to help with the process of obtaining interviews with engineers, within the public sector, and while similar trends transpired some progress was made. Furthermore, the engineers who responded were those working on alternative transport projects, therefore, associated closely to the research area, potentially not providing a general perspective of the civil engineering field. Participant E1, an engineer who worked for the Institution of Civil Engineers (ICE), demonstrated that there was keen interest among engineers regarding the topic area, however, their representation was difficult to involve due to the scarcity of participation among the engineering profession.

3.4.5 Data Analysis Approaches

Data analysis refers to how the information, once obtained, is then analysed to extract the content required to answer research questions and achieve research aims and objectives. Four useful steps were used in the preparation and analysis of interview data (Bhatia, 2018).

The first step was becoming familiar with the data itself. This was largely achieved by transcribing the interviews as soon as possible subsequent to the interview taking place. This not only helped with the transcription process, as the interview was still fresh, embedded the recent discussion even further. General notes concerning recurring information were also taken at this stage once several interviews had been conducted. The second step was to revisit the objectives to ensure that the data being extracted could be used to respond to the predetermined research objectives. Third is to develop a personal framework, or indexing, which is a technique used to help understand the general themes which emerge within the interview data. Colour coding specific themes can help deconstruct textual data and aid in the discovery of common threads (Liberty, 2019). The last step is to identify patterns and connections with all core themes emerging which can then be further explored. Further exploration can then tie together and interconnect the literature and other empirical findings into one main thematic discussion and analysis.

3.5 Analytical Framework and Research Validity

Adopting this research paradigm allows for consideration and acknowledgement of the 'validity' as credibility (of the data/findings) and 'objectivity' as confirmability. All research has its limitations, so it is the researcher's responsibility to design the best possible study by weighing up the relevant considerations (Du Toit, 2015). Within a constructionist paradigm, the researchers position within the research influences assumptions and may influence research subjects (e.g. policies, interviewees and observations, etc). This does not invalidate research findings, rather it defines the researcher's positionality in the research, that, they too, will have interpretations which may be constructed through their academic background and knowledge. Nonetheless, the research must be robust and sound and should recognise certain criteria such as credibility, transferability, dependability and confirmability (Trochim, 2006), detailed in Table 3.8 below.

Table 3.8: Qualitative research validity standards

Source: Trochim, 2006. Table adapted by Author (2019)

Credibility	That the results are believable from the perspective of participants regarding the phenomena of interest, as they are understandably the only ones who can justifiably judge the results.
Transferability	The degree to which the results can be generalised to other contexts. Ensuring the context of the research is clear then leaves it to those wanting to transfer the results responsible for judging how the results are done so.
Dependability	This emphasises honesty to account for the ever-changing context in which research inevitably occurs. The research is responsible for describing such changes.
Confirmability	This can be achieved by actively searching and describing negative instances which can contradict prior findings and observations and ties in with honesty.

3.6 Scope and Limitations

It is important to acknowledge certain limitations and weaknesses to reflect honesty and mindfulness of the research proceedings and findings. The timeline frame ultimately has a huge part to play in such weaknesses, for example, four field observations were carried out. If time permitted many more field observations would have provided more data for analysis. The same applied to the overall research context, with more time this could have branched out into other countries. However, this would have diverted the trajectory of the research into a more comparative piece and is the justification for why only brief accounts where included providing an English context – to ensure that the study focused on NI. With regards to policy, the sheer number of documents considered required certain steps to refine analysis, such as looking at the context pages to focus on chapters and sections most fitting to research and word searching through the documents using the terms in listed in Table 5.1. Lastly, with the interviews, a balanced representation of all professionals was intended, however as section 3.4.4 uncovered, not all professions were as willing to participate, given the nature and

orientation of the research. As a result, many more planners responded to the research, which is admittedly out of the researcher's control, but it is recognised that they have a much greater representation than the other professions. In addition, some interviews were conducted with multiple participants of the same occupation, who each had an individual voice and perspective. Given the nature of an interview some individuals in group interviews may not have involved themselves within the discussion as much as others and therefore having less representation of their individual experiences. To clarify, out of thirty-two interviews a total of four were in groups of two-to-three participants. Each participant had their own individual interpretations and viewpoints, and therefore the decision was made to represent the interviews in terms of the participants.

3.7 Ethical Considerations

There are certain proceedings necessary to carry out if research on human subjects is undertaken. It is therefore important to that ethical considerations are employed. The university in which the research took place offered courses on ethical practice and the university also has a strict policy for governance of research which involves human subjects and was explicitly complied with. Hence, an application of ethical approval was submitted to the research ethics committee which outlined the methodology of the empirical research to be conducted. Once approval was granted (in October 2017) by the committee the interviews could be arranged. Before the interview took place in situ a consent form was completed and signed by the participant. Reassurances were made again to ensure that the participant was comfortable and knew precisely what they were consenting to. With regards to full transparency, each interviewee was made aware verbally, mainly that the information gathered from one participant was not to be shared with other participants and that the participant could ask at any time to turn the recording device off. Whilst this did not occur some participants waited towards the end of the interview, when the device was naturally turned off ending the interview, to mentions certain topics. These exchanges were still used,

if relevant, during the analysis as the recording devices were simply to aid the transcription process.

3.8 Conclusions

This chapter underpins the philosophical and theoretical positions which solidify and justify the choices of research methods and how it was conducted. It views professional practice as socially constructed and thus the paradigm of research shifts away from objectivity. Social constructionism introduced the research to an interpretative approach which this chapter has justified to be well suited for conducting the empirical research. Using this research approach, the methodological framework could be designed, utilising three elements of data collection; policy documentation, field observations and semi-structured interviews. With this, before the exploration and interpretation into the empirical portion of the thesis begins, there is a need to describe the context in which the research has been conducted. The geographical context, the political context and planning context sets up the empirical portion as it provides the platform of which the data should be viewed and perceived.

Chapter Four: Research Context

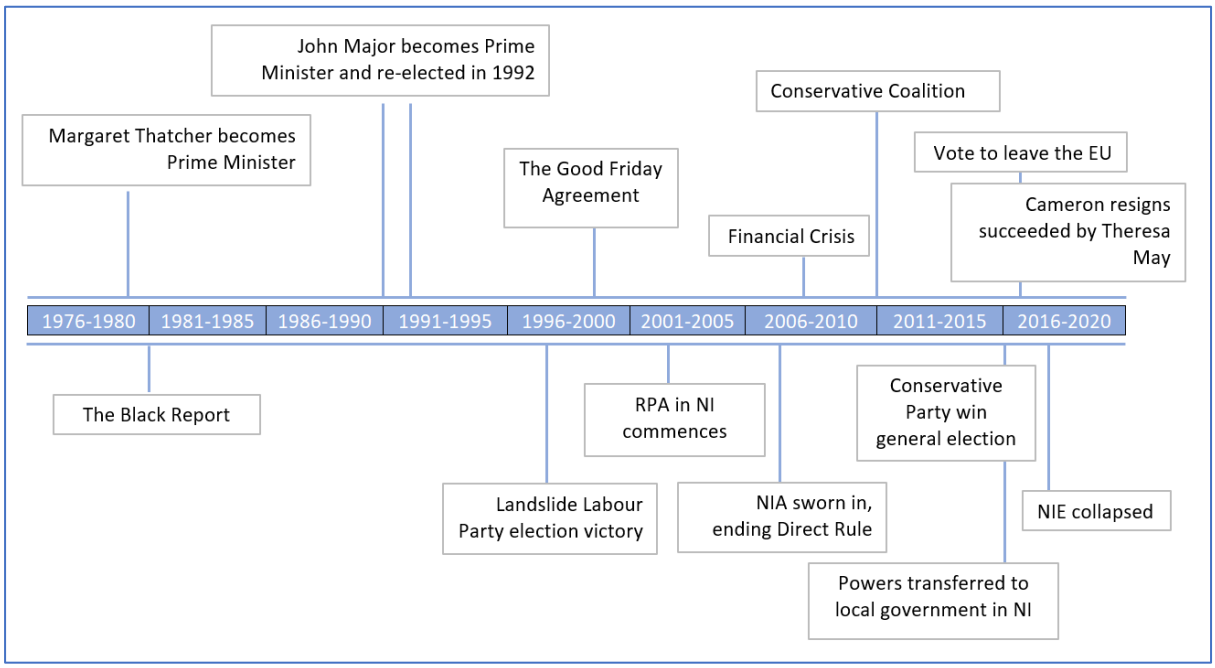
4.1 Introduction

Consideration into the political-policy landscape intends to provide the best possible context frame to address objective two, which specifies the examination of the policy discourse within a certain geographical context. This chapter builds upon the policy discussion in Chapter Two which recognised the influence policy can have on health, whilst acknowledging a requirement to bridge the gap between policy and practice (Barton, 2005; Kent and Thompson, 2012). The literature also outlined that governance processes differ widely across countries, localities and policy fields and therefore, there is a need to explore the specificities of the legislative context. In order to do this, this chapter begins by uncovering how the general political landscape of the UK has changed within recent decades and its consequent impact on health and planning. With this, the context will be directed towards government reform focusing on the Review of Public Administration in Northern Ireland and how planning functions and mechanisms have changed. In addition, this chapter highlights important documents and projects which are later critiqued and discussed in detail, thus providing crucial context for the remaining chapters.

4.2 Evolving governance landscape

The UK has undergone significant government reform in the last decades. This chapter uncovers this political landscape starting in 1979 with the Conservatives in power, then the rise of New Labour, the Coalition, in addition to the government reform and devolution in Northern Ireland which commenced in 2002. The timeline (Figure 4.1) below illustrates significant dates occurring during these years.

Figure 4.1: UK Political Landscape - Timeline from 1979-2020 (author's own)



The Thatcher-Major Conservative governments between 1979-1997 saw the emergence of the neoliberal policy agenda, favouring strong individual property rights, the rule of law and freely functioning markets and trade (Harvey, 2005). Present day awareness of the impact on health and wellbeing were largely postdate Thatcherism, consequently the main concerns were on unemployment, income inequality, social isolation and the potential privatisation of the NHS (Scott-Samual *et al*, 2014). The polarizing ideology has been expressed as leaning towards a freer, more competitive, open economy, to a more repressive, authoritarian state, each interpretation claiming to have been reflected in policy (Allmendinger and Tewdwr-Jones, 1997). Regardless of the ideology behind Thatcherism, many studies point towards the *implementation* failures rather than a lack of consistency of ideology or policy (ibid). As the conceptual paradigm of 'active living' had not yet been driven, it is difficult to direct discourse towards the impacts the Thatcher era had on physical activity within the urban environment. The Thatcher Administration did however commission a report, entitled 'The Black Report' (1980), which identified widespread, deep-rooted health inequalities. The report had significant impact and was even assessed by the WHO. 'True Thatcherites' followed an ethos

of ‘no such thing as society’ and depending on the interpretation this certainly links into health and wellbeing rhetoric. Thatcher (1987) continued:

> there are individual men and women and there are families. And no governments can do anything except through people, and people must look to themselves first. It is our duty to look after ourselves and then, also, to look after our neighbours.

This resonates with the determinants of health with people being at the core of that model (Figure 1.1). Individual choices, behaviours and responsibilities are also important to improving health with governments and governance proceedings contributing to improving health. Conservative leadership continued immediately after Thatcher’s resignation in 1990 with John Major. Again, differing opinions interpreted that, although Major had a vastly different leadership approach, very little changed with regards to policy and he was considered still to be pursuing his predecessor’s trajectory (Jones, 2018).

The Chancellor at the time, Kenneth Clarke, supported and endorsed Major commenting that he was ‘Thatcher with a human face’ (Allmendinger and Thomas, 1998). Others believed that Major’s leadership had resulted in only a small number of remaining Thatcherites. It is argued therefore, that it was the style of leadership that had support rather than a change in ideology. As a whip he learnt to conciliate rather than confront, assisting him in brokerage, which was required with his small majority, whereas Thatcher was able to force change having such a large majority. Although it is recognised that some policies based on Thatcherism were causing concerns within the party (in particular the community charge or ‘poll tax’[21]) in general the policy differences were not so obvious. He offered a managerial version of combating socialism, however market downturns, increased Euro-sceptics and various party scandals resulted in a heavily criticized tenure. Major’s leadership was summarized as having the impression of being in office but not in power (Jones, 2018). The following election would

[21] A system of taxation which provided for a single flat-rate per-capita tax on every adult, the rate of which was set at local government level.

mark a landslide victory for Labour and the reign of a ‘New Labour’ approach which would remain in power from 1997 to 2010 with Tony Blair first becoming Prime Minister and succeeded by Gordan Brown in 2007. This approach emphasised equality of opportunity and the use of markets to deliver economic efficiency which went beyond capitalism and socialism, attracting voters across political spectrums.

Majors former Prime Ministerial leadership provided the resurgence of planning policy, when the White Paper ‘The Future of Development Plans’ was scrapped. This paper had intended on significantly reducing local authorities’ role on strategic planning policy development. Instead, the ‘local choice’ concept re-orientated decision-making back to local level and away from central government, referred to as devolution, and back to a plan-led system. This coincided with the government’s commitment to the environmental agenda, aligning with the introduction of sustainable development during the late 80s. The government then implemented environmental legislation in 1990 and permitted sustainable issues in primary planning legislation to be at the core of planning concerns, reflecting the global agenda. The requirement and pressures from the Rio Earth Summit in 1992 radically changed policy. The UK tried to maintain and build on the ‘market-led’ system, which relied significantly on central advice and guidance, whilst trying to pander to the pressures for a plan-led system, centrally controlled but locally formulated. Healey (1992) also recognised that the eventual shift to a new plan led system was due to the government’s commitment at the Rio Earth Summit towards sustainable developments. Local politicians were becoming frustrated, finding it difficult to apply a local interpretation of national guidance in a local context, some even addressing the issues within their constituency contrary to central government policy priorities. Planners had to deal with politicians who refused to enact central policies as they believed them to bare no reflection on local people. Others have argued that the actual wording in legislation has had no impact on planning practice (Tewdwr-Jones, 1994; MacGregor and Ross, 1995; Gatenby and Williams, 1996).

In 1995, after intense conflict within the Party, Labour implemented new political priorities and a different political paradigm which Labour echoed within their 1997 campaign with phrases such as 'the many not the few' and words like 'community', 'partnership' and 'organisation' (Levitas, 2005). The New Labour identity attracted those who wanted an alternative to Thatcher/Major regimes whilst retaining their traditional voters. Consequently, it expanded on the idea of the need for a 'strong society' and 'active community', deliberately replacing the strong state emphasis of Thatcherism and intended to shift away from the outdated quasi-Marxist doctrines of collectivism. The Labour government established a Delivery Unit which had four key areas in public service reform: health, education, transport and crime reduction. Although, significant health reform was directed towards the NHS (as opposed to overall public health), the Blair administration commissioned a follow up report on the Black Report, referred to as 'The Acheson Report' (1998). The report shared similar rhetoric with the Black Report, particularly the emphasis on the need for cross-cutting government policies to tackle social health inequalities. It was favourably received, and was referred to within policy statements. Nevertheless, the political climate at the time[22] resulted in an under-representation of any attempts to effectively tackle the issues addressed (Bambra, 2016). Nevertheless, some efforts were directed towards health improvement measures, receiving financial resources to improve area health, within the most disadvantaged areas in England, ranging from Merseyside and Tyne, to rural areas in Cornwall and North Cumbria (Judge and Bauld, 2006). Examples of the initiatives include: Health Action Zones, Health Improvement Programmes, New Deal for Communities and Healthy Living Centres. A recurring focus of the initiatives was the promotion of healthy lifestyles. This period only saw modest results at best (Bambra, 2016). Enthusiasm waned as overly ambitious and aspirational targets where promulgated and the pressure of 'early wins' debilitated local agents. Disillusionment occurred with the ever-expanding list of new-initiatives.

[22] Gordan Brown agreed to continue the Conservative's public spending plan which resulted in a two-year commitment not to increase public spending between 1997-1999

It is argued that policy shifted to the 'lifestyle drift', a now well-established concept, whereby policy neglected the wider socio-economic context and focused almost exclusively on individual level and behaviour, reflecting the sentiments Thatcher had stated back in 1987. This conflicted with Blair's brand on socialism. He declared, in 1996, that individuals are interdependent, owing duties to one another as well as themselves; and that a good society backs up the effort of individuals (Tewdwr-Jones, 2002). Ten years on Tony Blair's philosophy may be perceived to have changed, speaking in 2006 with regards to obesity and smoking:

> Our public health problems are not, strictly speaking, public health questions at all. They are questions of individual lifestyle - obesity, smoking, alcohol abuse, diabetes, sexually transmitted disease. These are not epidemics in the epidemiological sense. They are the result of millions of individual decisions, at millions of points in time

The New Labour government gave an impetus towards the promotion of multi-scalar governance arrangements as part of their restructuring following the previous Conservative tenures (Fuller and Geddes, 2008). Responsibilities and rights of citizens were recurrent themes within New Labour and with regards to urban governance, recognised that complex problems in neighbourhoods impact local environments in deprived areas and a need for stronger delivery of local services – conflating poor areas to poor services. Tony Blair stated how it was a priority to provide support to create opportunities for the most excluded, and that success within communities depends on them having power and responsibility. The advocacy towards community helped contend that increased powers within localities was necessary to tackle social problems and led a path for Localism.

Localism [re]emerged (as it was historically a standard social and political model) through the Blair/Brown Labour government as a rethink to the 'national' and 'global' dominance placed on economic, social and political organisations. Localism is a greatly contested term which has been interpreted differently within the political domain but can largely be understood, in the context of the research, as local control of government. The Labour government's

approach to Localism was framed in the context of evidence-based policy-making and top-down direction (Evans *et al*, 2013). However, contradictions developed. Whilst emphasis on communities and local autonomy had been rhetorized by politicians the policy parameters were set by the wider national strategy of the Neighbourhood Renewal Unit within the Department of Communities and Local Government. This was a 20-year plan which was developed in 2001 to narrow the gap between the country's richest and poorest communities. This included strategic context, targets and decision-making powers which seemed to conflict with a focus on local communities. In 2007-2008 a financial crisis resulted in prolonged austerity. This crisis was considered to have been the most serious financial crisis since The Great Depression and would ultimately spark another shift in the political landscape.

In 2010 to 2015, the Conservative Party won in the general election but failed to gain an absolute majority resulting in a Conservative-led coalition with the third placed Liberal Democrats, led by David Cameron and Nick Clegg respectively. This tenure embraced further localism, however demonstrated contrasting interpretations of the localist mantra. This was emphasised in the Coalition agreement, stating how the days of big government are over, recognizing from their perspective, that Labour had made the state too powerful (Evans *et al*, 2013; Kisby, 2010). This redistribution of power underpinned the coalition. It provided the platform to the 'Big Society' during Conservative-led coalition launched by the then Prime Minister, David Cameron. The Big Society was initially campaign driven before fading away as a result of a lack of appeal to voter's doorstep feedback, as well as some senior party figures. An intriguing reaction by citizens whose government wished them to have more power and influence in terms of parks, community offices, local transport and housing development, yet seemingly not wanting to obtain it (Kisby, 2010). Similar to New Labour intending to shift away from their traditional doctrine, the Big Society was suggested to be a re-branding exercise in an attempt to distance themselves from Thatcherism and her (mis)interpreted rhetoric towards 'no such thing as society'.

David Cameron resigned from his position as Prime Minister in June 2016 after he had called for a referendum for the UK to leave the European Union (EU), which the majority voted for leave, referred to as Brexit. Theresa May then took over as Prime Minister to fulfil democracy, ensuring that the UK left the EU. Implementing this obligation was tarnished by stalemate negotiations and in May 2019, Theresa May stepped down from being Prime Minister. The last 40 years of governments in the UK has recurring themes regarding the linkages, translation and reflections of national level to local level, with power dynamics shifting considerably and impacting on practice and policy, implementation and rhetoric. One of the most significant shifts with regards to context of Northern Ireland was the Review of Public Administration.

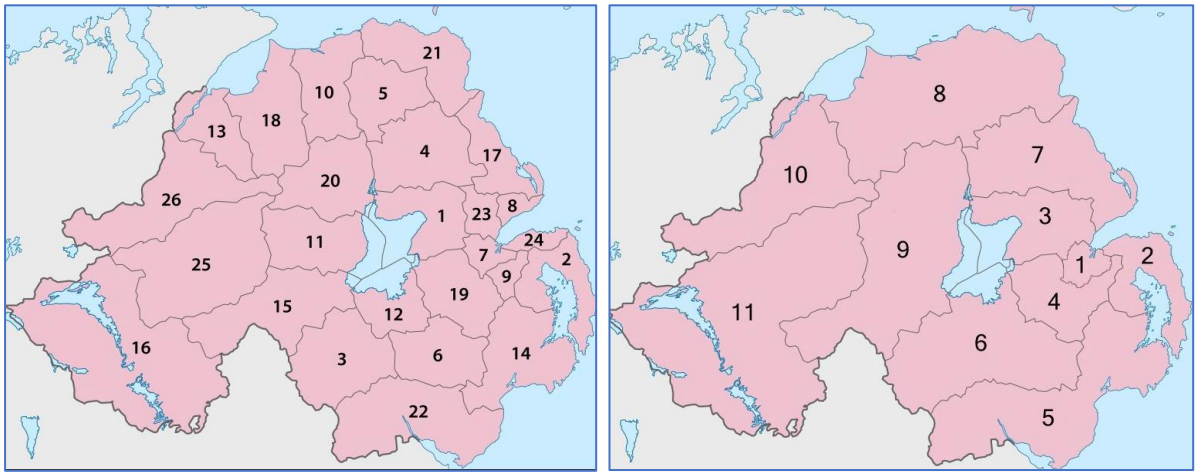
4.2.1 The Review of Public Administration (RPA)

Since 1976 Northern Ireland was under the administration of the UK government, referred to as Direct Rule and was in practice between 1972 and 1998. This meant that the UK government was directly responsible for government decisions in NI. In 1999, the UK government devolved powers to the Northern Ireland Assembly, meaning that certain governmental functions were redistributed, alongside the transition out of a prolonged period of conflict ('The Troubles'). The shift towards more peaceful times witnessed the signing of The Belfast (Good Friday) Agreement (1998) and establishment of the Northern Ireland Assembly and Executive. This is a significant and unique power-sharing arrangement between the two main unionist and nationalist parties. The objective being to modernise governance and 'normalise' NI society led to the RPA. Commencing in 2002, the RPA committed to building stronger governance, to tackle longstanding limitations in public administration and a recognition of community and geographical disparities. In terms of its scale and time period the consultation and research within this RPA was unprecedented in Northern Ireland (McKay and Murray, 2006). However, the RPA was described as a 'tortuous' process marred by sectarian politics (Knox, 2012: 119), evident in the debate surrounding the number of councils

to be created, specifically with regards to their proposed boundaries. Eventually, eleven super councils were agreed upon by the Northern Ireland Executive, reduced from the original twenty-six (Figure 4.2). The reform offered up opportunities for councils to have a significant role in the delivery of public services ('community planning') and more power to potentially improve the quality of life ('wellbeing outcomes') as councils were now required to engage with communities to create a vision for their local area.

Figure 4.2: 26 Councils prior to government reform (left) and the eleven super councils (right)

Source: Northern Ireland - Local Government District



Prior to the RPA, Dowdall (2004) described Northern Ireland's public administration as 'disastrously fragmented'. Public bodies' responsibilities throughout Great Britain were duplicated in NI, impeding clarity of functions and being inefficient, evident through the mosaic of government departments, agencies, local authorities, non-departmental public bodies (NDPBs), quangos, boards and trusts which encapsulates the public sector. Whilst the RPA attempted to improve this, initial thoughts on the justification of the restructuring were concerning the lack of administrative logic, rather than the outcome of political negotiation. In relation to planning, the former Department of the Environment and Department of Regional Development were restructured in one Department for Infrastructure, significantly placing planning and roads under one department.

Although the process commenced in 2002, it was not until 2014 when the Local Government Act (Northern Ireland) was published, which amended the law relating to local government and 2015 until the powers were transferred. The reorganisation of local government provided a new governance architecture that aimed to improve the partnership working between state and non-state actors and enhance public participation in decision-making that shapes both places and communities. By giving local government more responsibility there is a shift in power and accountability to local level in creating healthy places which brought further attention to the capacity and skills of local governments to carry out such outcomes. Furthermore, more participation encouraged from non-state actors also demonstrated a shift from government to governance, which significantly impacted on the general planning process and also the power, relations and responsibilities of planners.

4.3 Planning Reform throughout the UK

The reform of planning systems throughout the UK was the result of a concerted effort to modernize planning, functions which are now devolved in Wales, Scotland and Northern Ireland. This resulted in local councils now being responsible for most planning decisions and the creation of a new planning system for Northern Ireland. The new planning agenda was designed to take a wider role than traditional land-use planning by integrating policies and programmes and centred around a move from land-use planning to spatial planning (Clifford and Morphet, 2015). There remains scepticism whether government reform is independent and distinctive or whether the new scales of governance are simply replicating government form at different scales, posing the question if new powers have true responsibility and freedom or is it merely the same approach with a new guise (Tewdwr-Jones, 2012). Theoretically, governments could use the latter to transfer unsolved problems to local tiers who now must attempt to find a solution. Hence, actors in new governance structures can be unsure of what role they perform and how their outcomes are filtered through different governance scales and agendas.

Although local planners have more responsibilities in terms of plan making and decision making, politicians still have significant control over planning decisions, as they do not need to accept recommendations given by professional planners on major planning applications (Adams and Watkins, 2014). Local politicians are often more concerned about electoral advantage than longer term forecasts and this can impact on planning which by its very nature, through sustainable development, strives for long term visions (Bramley, 2013). Professional advice, such as to grant or refuse planning permission, can simply be ignored, and political ideology and electoral advantage can drive planning decisions with a disregard to professional planning opinion which undermines the planning profession. Alternatively, simply blaming politicians for opposing development or making decisions solely on their individual interests is erroneous. There are many other elements to consider such as, having clear priorities, making difficult choices and balancing other responsibilities they are entrusted with, which tend to be economically driven.

The Localism Act 2011 entitled neighbourhoods decision-making influence through Neighbourhood Planning, giving legal weight to Neighbourhood Development Plans. This process still remains popular in England (Fern and Tomaney, 2018). The Act is a complex piece of legislation which addresses a wide range of planning, housing and local government concerns. Ostensibly, the 2011 Localism Act prioritises local decision making over other scales of government. Arguably, not all of which are perhaps conventionally understood by localist agendas (Layard, 2012).

The following chapter will refer, briefly, to the National Planning Policy Framework (NPPF)[23] which is the key driver for influencing health in planning in England. The NPPF dedicated an entire section on the promotion of healthy communities, stating that the planning system plays a pivotal role in facilitating social interaction and creating healthy, inclusive communities. Included in this is the reduction of obesity and the encouragement of physical activity and

[23] Note, that the thesis does not take a comprehensive look at the NPPF, but simply draws on it to add a different context to the research.

active living (Chang and Ross, 2012). In a guide published by the Local Government Group, entitled 'Plugging health into planning' planners should engage with public health matters and practitioners on major planning applications, involve health in infrastructure planning, conduct health impact assessments and monitor and review planning influence on health outcomes (LGG, 2011).

4.3.1 Planning Reform in Northern Ireland

Public administration in Northern Ireland, prior to devolution, had largely been unchanged since 1973. To ensure public services remained apolitical, key functional responsibilities were assigned to a "patchwork of unaccountable" non-departmental public bodies. Lord Glentoran, 2004, argued at the House of Lords that:

> the Government is now guilty to a considerable extent of maladministration in terms of waste of public money in many different areas. Northern Ireland is grossly over-administered.

Devolution meant that Northern Ireland was no longer under direct rule, with local politicians now being able to make key decisions, and local councils eventually having much more autonomy. The RPA was viewed as a key mechanism for achieving better public services and simplifying an overly complex system.

The scope of the planning reform within NI was ambitious. Contextual ambitions of balancing political agendas, achieving economic development whilst implementing the RPA, and its associated devolution of land use planning proved a colossal task. The previous land use planning system revealed fragmented economic agendas and environmental priorities, reflected in the divisions between Ministerial portfolios, Departmental responsibilities, within and across departments, and the relationships of agencies who fell within the wider remit of land use planning (Lloyd, 2008). The Departments were not integrated which impacted on practical implementation, thus it was acknowledged that a culture change within land use planning was required and a need for robust strategic planning. The RPA addressed the

centralized characteristics of institutional and departmental fragmentation that were present within land use planning at that time.

Under this planning system, post 1972, planning operated through legislation set out in the Planning (NI) Order 1972, subsequent amendments being consolidated in the Planning (NI) Order 199. On October 1973, the DOE became the sole planning authority for the NI province (Berry *et al,* 2001). The Planning Agency operated under the DOE in six divisional offices and provided the administrative framework within which development took place. Local authorities were consulted only in an advisory capacity. However, the system was heavily criticized for the creation of unaccountable public administration.

The intention of the planning reform was to improve the efficiency and effectiveness of land use planning to meet the needs of communities and localities across Northern Ireland. One of the major objectives was to manage development in a sustainable way, again reflecting the commitment from the Rio Earth Summit, 1992. The transfer of planning powers, to councils from central government, not only included a redistribution of functions but also included the creation of a new planning system for Northern Ireland. The new planning system resembled the model already adopted in the UK but more connected to the political and economic ambitions of Northern Ireland. Importantly, it placed an emphasis on economic development priorities with social and environmental wellbeing.

The new planning system operates under a two-tier approach, with responsibilities split between central and local government. Central government set regional policy, create planning legislation, provide guidance to local councils, and remain responsible for roads and regeneration. On the other hand, local councils are responsible for their community plan and local development plan; development management; and planning enforcement. In 2009, the DOE produced a document entitled 'Reform of the Planning System in Northern Ireland: Your chance to influence change - Consultation Paper' which directly responded to the need to change professional *cultures* within planning systems:

> For the full impact of these changes to be realised, and a new planning system created, it is clear that a change in culture for all those involved in the system is required. The development of a shared understanding amongst stakeholders on the role and nature of the planning system is extremely important, both in terms of what planning it is expected to deliver and what it is not (2009: 11)

Ministers from all the main political parties in Northern Ireland have acknowledged the departmental silos and departmental failure to collaborate in significant policy areas, despite the existence of inter-departmental strategies which have been poorly implemented due to a lack of inter-departmental cooperation. These policy areas consisted of childcare and welfare but can be translated into the areas within the DOE, who was responsible for strategic objectives (such as planning) and the DRD, responsible for regional objectives (such as sustainable modes of transport). Additionally, the NIA (2016) suggested those opposed the previous planning system stated that it led ministers to operating in silos and having a lack of collective responsibility.

The reform of local and central government through the RPA had significant political overtones that diminished the effort to concentrate on whether the new structures were 'fit for purpose' instead seemingly more focused on political control and boundaries (Knox, 2012). Deep seated political issues remain. It has been suggested that the principle of collective responsibility has been absent, since devolution, with government ministers acting on an individual basis, protecting their budgets and developing policies in isolation from other departments, exacerbating silo mentalities (Horgan and Gray, 2012). Politicians and officials are acutely aware that there is little electoral accountability placed on parties and this is reflected on voting patterns, which are decisively sectarian. Consequently, it could be argued that through the new vices of community planning and local authorities' conviction in carrying out the vision of their communities it would seem obvious that councillors would want to deliver what is best. The main concern is that in Northern Ireland there are no major electoral threats to politicians through quality of public services, progress or delivering of promises. Still,

devolution brought attention to rationalisation and modernisation of the arrangements of the public sector to achieve greater overall efficiency and effectiveness and broader civic engagement.

The fundamental reform of planning resulted in the publication of a Planning Bill, in November 2010, and agreed by the NIA in March 2011. Under the Planning (Northern Ireland) Order 1991 one of the Department of the Environment's main functions were to prepare development plans. This evidently changed in the Planning Act (NI) 2011 which discussed the preparation of development plans by councils, replacing the DOE's (Lloyd and Peel, 2012). The development plans must conform to The Regional Development Strategy (RDS) and the Strategic Planning Policy Statement (SPPS), a document which consolidated the earlier Planning Policy Statements (PPSs). Local councils now responsible for producing Local Development Plans (LDPs), development management and planning enforcement, aimed to (as The Planning Act (Northern Ireland) 2011 explanatory notes paragraph 3 stated):

> …make planning more locally accountable, giving local politicians the opportunity to shape the areas within which they are elected. Decision making processes will be improved by bringing an enhanced understanding of the needs and aspirations of local communities

Eventually, the RPA came to fruition in April 2015, although the new planning system's entire policy domain still referred to documents produced by defunct departments which were outlined as being fragmented. Additionally, concerns continued regarding Ministers form different departments from opposing political backgrounds who had conflicting agendas and could potentially hinder the process further. The reform did however offer opportunities for councils to have a significant role in community planning and more power to potentially improve quality of life, by reflecting local needs and involving them within the planning process through the community plan and local development plan. New council-led community planning is a key element in the reform of local government consisting of partnerships between multiple cohorts and communities to develop and implement shared local visions. It advocates the

integration of community planning, spatial planning and regeneration at a new local governmental scale (Knox and Carmichael, 2015). Each council produces a community plan with high level, cross cutting themes, having an overall aim, measurable outputs and monitoring through the Community Planning Partnership[24].

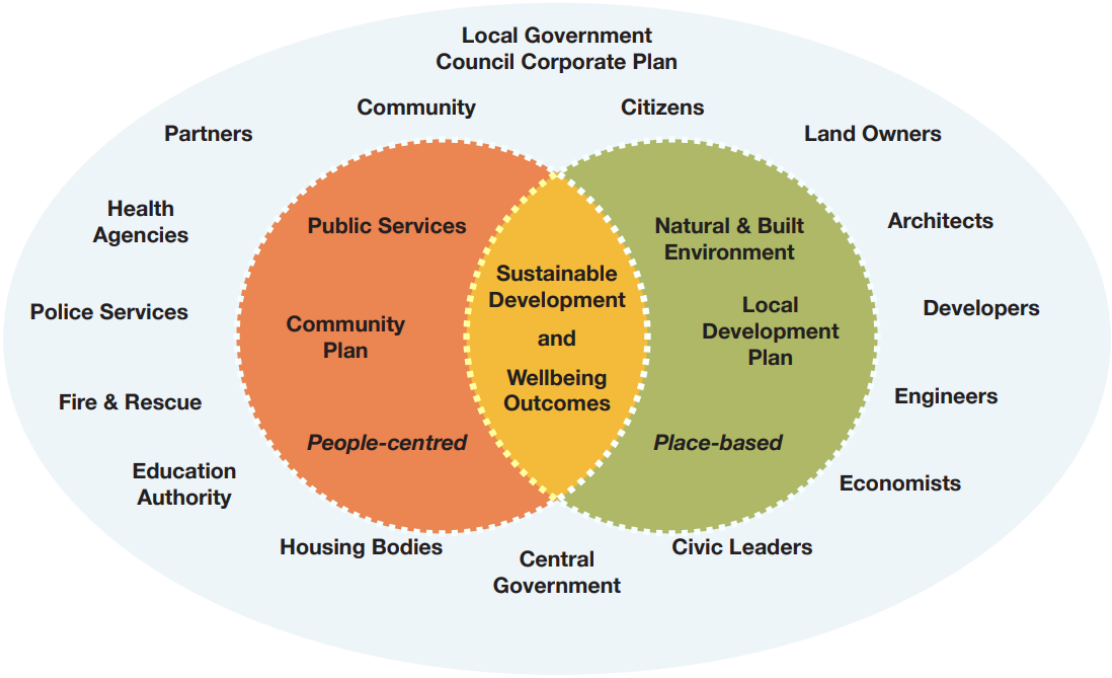
The new community planning function has a strong collaborative emphasis between public service providers. It is innovative in that it seeks to integrate the delivery of services within local government from a variety of delivery bodies (Rafferty and Lloyd, 2014). The Local Government Act (Northern Ireland) 2014, Part 10, explains how the council and the community planning partners identify objectives for:

a) Improving the social, economic and environmental well-being of the district and contributing to sustainable development;
b) Identifying actions to be performed and functions excised by the council and the community planning partners.

The crosscutting nature of community planning is best articulated through Rafferty (2018) who illustrates how planning functions overlap to create sustainable development and wellbeing outcomes. Here, community planning is people-centred in delivering public services, of which health is included; whilst the local development plan is place-based, more spatially reflective (Figure 4.1). Again, the sustainable development agenda is given significant emphasis, demonstrating a lasting theme since the late 1980s. Evidently, the planning profession has been framed within the presumption of favour for sustainable development, demonstrably having a core part of the new planning agenda.

[24] The Partnership consists of: The Education and Library Boards, The Health and Social Care Trusts, Public Health Agency, Health and Social Care Board, Police Service of Northern Ireland, Northern Ireland Housing Executive, Northern Ireland Fire and Rescue Service, Invest Northern Ireland, Northern Ireland Tourist Board, Sports Council for Northern Ireland (SportNI), Libraries NI, Council for Catholic Maintained Schools.

Figure 4.3: The connections for furthering sustainable development and wellbeing outcomes (Rafferty, 2018)



In 2005, the then Secretary of State, Jeff Rooker, revealed his vision for community planning:

> I want Councils to have the central role in delivering joined-up services. That will be achieved through a new system of community planning with a statutory duty on Councils to develop and coordinate the delivery of a plan to address the requirement of their communities. Complementary with community planning will go a power of well-being, giving Councils the statutory cover to work innovatively for the good of their communities and fill in the gaps between public sector organisations. (Rafferty and Lloyd, 2014)

The practical intention of community planning is to produce a community plan. Each council is responsible for creating their own unique plan, reflecting the needs of the locality, which is then translated spatially into a local development plan. However, the RPA proved to be a long-drawn out process spanning out for almost fifteen years. Within this timeframe, from 2002 to 2016, when planning powers were eventually reformed and restructured, the policy and legislation domain in Northern Ireland changed significantly.

Northern Ireland lacked the extensive debate on how devolution may help achieve a more democratic political style compared to Scotland (Bell and Stockdale, 2016). A more incremental devolution of powers resulted in constitutional limitations, contextual circumstances and protracted procedures (Pemberton *et al*, 2015). Blackman (2015) stated that in Northern Ireland the devolution of planning powers has created a challenge and will require capacity building and a 'culture change'. Although local politicians now had more power, questions arose of the ability and skills of local politicians to have obtained such planning responsibility.

Asides from planning reform, with regards to public health, the RPA resulted in the establishment of the Public Health Agency (PHA) under a major reform of health structures and would become responsible for public health. Prior to the RPA Greer (2016) stated

> few people go into Northern Irish politics because they want to make a mark on health care or public health. The sectarian party system and veto-ridden political structure of the Northern Ireland executive, combined with periodic brinkmanship over constitutional issues, all mean that health policy often goes ignored. The result was drift and conflict-avoiding managerialism in a remarkably overgrown administrative environment of 37 different HSC quangos

After the RPA, the 37 quangos referred to by Greer (2016) were decreased to six, which resulted in savings due to fewer executive positions and making it easier to hire, with fewer managerial positions. This also explains why public health remained centralised. Due to the population of Northern Ireland being (1.8 million) planning and management for such a population size tends to be centralised and should easily sustain many specialist services, and layers of management are diminished. The creation of the PHA was broadly welcomed, however there were reservations on the sensitivity to local implementation and local initiatives (PHA, 2010). This is one significant difference between structural shifts since the reform; planning now being locally responsible, but public health remains centralized and has been scrutinized in lacking responsiveness to local communities.

4.3.2 Current political landscape in NI

In January 2017, the Northern Ireland Executive (NIE) and Assembly collapsed, and functions ceased. This was largely due to the First Minister, Arlene Foster, and Deputy First Minister, Martin McGuinness, disputes over the 'Renewal Heat Incentive' which had allegations of corruption put on Arlene Foster, marriage equality and access to Irish language education. With the First Minister refusing to capitulate to the calls for her resignation the Deputy First Minister himself resigned. Thus, with no functioning executive, Stormont disbanded (Worsham, 2019). This is obviously not without implications. The political vacuum in Stormont left a void in almost all social policy matters and legislation. Without direct rule or even Executive Ministers in place, responsibility falls on senior civil servants, a grey area for Permanent Secretaries. Most erred on the side of caution and limited their interventions to minor concerns. Major policy changes requiring ministerial approval now had the potential to result in legal challenges. 'The matter of an application by Colin Buick for Judicial Review' (the Colin Buick Case) gained extensive publicity, which was a case in the High Court of Justice in Northern Ireland to quash a decision, regarding the Arc21 Waste Incinerator, made by the Department for Infrastructure under section 26 of the Planning (NI) Act 2011[25]. Significantly the High Court decided that the decision was unlawful which had a demonstrable impact on the planning culture, explained in more detailing in the upcoming chapters. After months of talks and negotiations to resolve the issue of Northern Ireland's government, Stormont (at the time of research) is still not functioning leaving the country in political limbo (Heenan and Birrell, 2018).

4.4 Legislation, Policy and Material Considerations

The previous chapters have addressed how the sustainable development agenda has permeated its way into policy. However, progress in health promotion has been slow, despite

[25] "Department's jurisdiction in relation to developments of regional significance"

strong evidence and renewed appreciation of the importance of health promotion in the way urban areas are planned, built and managed (Kent *et al*, 2018). Urban planners have generally begun to welcome health ever more into the remit of issues which require consideration in land-use planning and questions should be raised regarding, not only the health integration in planning policy, but on active living concepts (Kent and Thompson, 2012).

In general, the overall goal of policy making is to influence a desired change in an undesired condition (Quay, 2004). Policy has been defined as 'the expressed intent of government to allocate resources and capacities to resolve…expressly identified issue[s] within a certain timeframe' (Breton and De Leeuw, 2010: 83). Public policies are often to resolve a public problem that has been identified on a governmental agenda, for example, an increase in air pollution from industrial production may prompt the state to develop environmental protection policy (Knoepfel, 2011). Alternatively, certain issues may not be included because policymakers may not consider it to be a policy problem (Cairney, 2012). Therefore, in the right hands policy can be a powerful and influential tool for shaping environments and lifestyles and providing professionals with specific intentions and directions. With many societies now being car-dominated, with reduced opportunities for physical activity and lack of social connection, the built environment has already been implicated in hindering active living. Therefore, there is a need to further critique and gather information on how policy addresses this within a specific geographical context, which is presented in detail in the following chapter. First, the following section will explore the legislation, policy and material considerations in, associated to the context of the thesis, in Northern Ireland.

4.4.1 The Policy Hierarchy in Northern Ireland

Multi-level governance is a polity with a plurality of tiers involved within the making of policy and in the policy process (Birrell and Gormley-Heenan, 2015). Therefore, it is important to identify and distinguish between the power hierarchy within such governance structures and the policy which they are responsible for. Northern Ireland's policy process is complex and

policy making is not confined to one level. Each level, national, devolved and local, has an important role in addressing needs and problems, contributing to policy formulation and implementation (Table 4.1).

Table 4.1: Hierarchy of Devolved Government in Northern Ireland

Government Level	**Overview**	**Key Policy**
Northern Ireland Assembly	made up of 90 representatives, known as Members of the Legislative Assembly or MLAs	Planning Act (NIA, 2011) Local Government Act (NIA, 2014)
Northern Ireland Executive	12 Ministers who run devolved government on behalf of the Assembly, each in charge of a governmental department	Programme for Government (NIE, 2016)
The Institutions of government (Eg. Department for Infrastructure)	Each department has a senior civil servant referred to as the Permanent Secretary who serves the minister. There are 9 departments, each with civil servants who support the Assembly, executive and other departments.	Regional Development Strategy (DRD, 2010) Strategic Planning Policy Statement (DOE, 2015) PPSs (DOE) Living Places (DOE, 2014) Creating Places (DOE and DRD, 2000)
Non-departmental public bodies and	A national or regional public body not staffed by civil servants, working	Making life better (DHSSPS, 2014)

Quangos (Eg. Public Health Agency)	independently from, but still accountable to, the associated minister	A Fitter Future for All (DOH, 2015)
Local government	Made up of 11 councils and run by elected councillors. • Antrim and Newtownabbey Borough Council • Ards and North Down Borough Council • Armagh City, Banbridge and Craigavon Borough Council • Belfast City Council • Causeway Coast and Glens Borough Council • Derry City and Strabane District Council • Fermanagh and Omagh District Council - Enniskillen Office • Lisburn and Castlereagh City Council • Mid and East Antrim Borough Council • Mid Ulster District Council • Newry, Mourne and Down District Council	Community Plan Local Development Plan

The Northern Ireland Assembly (NIA) have full legislative power within a wide range of areas including planning and transport. The Planning Act (2011) was produced by the Assembly and is the principle piece of planning legislation which ensures that any policy the Department of Infrastructure (DfI) produces must be in line with the Regional Development Strategy (RDS). It mentions furthering sustainable development and promoting or improving wellbeing however does not seem to have any direct association to active living.

The Local Government Act (NI) 2014 was also produced by the NIA and lays out the roles of the newly formed councils. Whilst it does not provide in-depth detail of planning, or details regarding health and built environment, it does cover community planning. It states that a council must initiate, maintain, facilitate and participate in community planning for its district and they, along with the community planning partners, identify long term objectives for improving the social, economic and environmental wellbeing of the district. Here, social wellbeing is associated with promoting equality of opportunity and economic wellbeing refers to tackling poverty, social exclusion and deprivation. The Assembly also appoint the Northern Ireland Executive which consists of the First Minister and deputy First Minister, as well as various Ministers for specific remits, the Minister for Infrastructure having the overall accountability for the DfI, which is responsible for areas such as, roads, active travel, transport initiatives, public transport and regional planning and policy making.

The draft Programme for Government (PfG), 2016, sets out the ambition of the Executive and is intended to address the bigger issues facing society. Difficulties regarding its deliver occurred due to the collapse of Stormont which resulted in a new Outcomes Delivery Plan 2018-19 produced by The Executive Office, the department responsible for supporting the Executive and the central institutions. However, this had not been released during the empirical stages of research and for the sake of continuity and context is not referred to throughout the remaining chapters.

The PfG was released in 2016 by the Northern Ireland Executive, placing emphasis on an outcome focused approach, identifying fourteen outcomes, each containing indicators which show the intended changes and measurements which should monitor progress. Here, it mentions developing tools that can help integrate health into policy and practice and building capacity on how built environment policy can create healthy places. Therefore, it recognises a need that policy requires better health integration. This is however, one of the higher-level documents and therefore must filter through to regional and down into local level. The PfG's

outcome framework establishes clear goals in the areas in which the government wants to improve. Each outcome has identified primary supporting indicators which are described as measurable and transparent. With regards to active living, four outcomes and their associated indictors, issues and matters are of relevance (Table 4.3), critiqued in more detail in the following chapter.

Table 4.3: PfG Outcomes and Indicators associated to active living principles

Outcome No. and Title	**Association with active living principles**
Outcome 2: We live and work sustainably – protecting the environment.	% all journeys which are made by walking/cycling/public transport. Achieving a shift from the car to bus or rail services for longer journeys and to walking or cycling for shorter journeys will reduce demand on the road network allowing it to work more efficiently; assist in the better movement of freight; reduce. Emissions and improve health by increasing levels of physical activity.
Outcome 4: We enjoy long, healthy, active lives.	Reduce preventable deaths: Preventable Mortality. Reduce health inequality: Gap between highest and lowest deprivation quintile in healthy life expectancy at birth.
Outcome 12: We have created a place where people want to live and work, to visit and invest.	Increasing further our attractiveness as a destination. A ‘place based approach’ to service design, ensuring an effective role for communities in the development and delivery of services and providing for effective linkages to community planning.
Outcome 13: We connect people and opportunities through our infrastructure.	simply building more roads will not resolve the issues. Improve transport connections for people, goods and services: Average journey time on key economic corridors. Increase the use of public transport and active travel: % of all journeys which are made by walking/cycling/public transport.

The Regional Development Strategy's (RDS) purpose is to deliver the spatial strategy of the Northern Ireland Executive and the spatial aspects of the PfG. It was produced in 2010, prior to the reconfiguration of the government departments as a result of the RPA and prior to the current PfG at the time of the research. Therefore, it was produced by a defunct Department of Regional Development (DRD), which has since become amalgamated with the now defunct Department of Environment (DOE) to create the Department for Infrastructure. Table 4.4 below presents the former departments alongside their retrospective newly devolved government departments.

Table 4.4: Former and Devolved Government Departments in Northern Ireland

Former Government Departments in Northern Ireland	**Devolved Government Departments in Northern Ireland**
Department of Agriculture and Rural Development (DARD)	Department of Agriculture, Environment and Rural Affairs (DAERA)
Department for Employment and Learning (DEL)	Department of Education (DENI)
Department for Enterprise, Trade and Investment (DETI)	Department for the Economy (DfE)
Department of Finance and Personnel (DFP)	Department of Finance (DoF)
Department of Health, Social Services and Public Safety (DHSSPS)	Department of Health
Ministry of Justice	Department of Justice
Department for Social Development (DSD) Department of the Environment (DOE) Department of Culture, Arts and Leisure (DCAL) Department for Employment and Learning (DEL)	Department for Communities
Department for Regional Development (DRD)	Department for Infrastructure

Regional policies are developed by the departments which provide guidance that applies to Northern Ireland as a whole. They are mandatory and are required material considerations when preparing Local Development Plans (LDP) (such as the Regional Development Strategy); and guides which are recommended but are not a mandatory material considerations (such as the Living Places). Sustainable communities are at the heart of the strategy, addressing social, economic and environmental issues, the recurring trifecta of sustainable development. The Strategic Planning (Northern Ireland) Order 1999 requires Departments to regard the RDS in exercising functions in relation to development, planning applications, appeals and LDPs. The RDS is not binding nor a fixed blueprint, but a strategic framework providing the strategic context where development should happen. It does not contain operational policy which is instead issued through PSS and the SPPS. The vision for the RDS (p. 18) is:

> An outward-looking, dynamic and liveable Region with a strong sense of its place in the wider world; a Region of opportunity where people enjoy living and working in a healthy environment which enhances the quality of their lives and where diversity is a source of strength rather than division.

Here, a 'healthy environment' being stated within the aim of the RDS sets up a positive premise surrounding the health agenda. The 8 aims of the strategy contain health associations aiming to promote development in a way which improves health and well-being. The 8 aims are as follows:

1. Support strong, sustainable growth for the benefit of all parts of Northern Ireland
2. Strengthen Belfast as the regional economic driver and Londonderry as the principal city of the North West
3. Support our towns, villages and rural communities to maximise their potential
4. Promote development which improves the health and well-being of Communities

5. Improve connectivity to enhance the movement of people, goods, energy and information between places
6. Protect and enhance the environment for its own sake
7. Take actions to reduce our carbon footprint and facilitate adaptation to climate change
8. Strengthen links between north and south, east and west, with Europe and the rest of the world

Important factors recommended to improving health and wellbeing within the RDS are; easy access to appropriate services and facilities, creation of a strong economy set within a safe and attractive environment and the provision of social housing. 'Key issues' which influenced the Framework relate to integrating key land uses with transportation and it places an emphasis on reducing car dependence and changing travel behaviours. The RDS associates access to quality infrastructure, rural areas and recognises that the capacity of road space can be made more efficient by providing more attractive transport choices. Consequently, it actively discusses reducing car dependence, as opposed to solely promoting alternative means. Although, there is some conflict within the PfG stating to promote electric cars and the RDS emphasising to reduce car dependency.

There are many themes in the Regional Guidance (RG) within the RDS that are important to the research area such as RG2 discussed delivering a balanced approach to transport infrastructure. These elements of the RDS seem to be rather subjective and open to interpretation. For example, 'promote transport which balances the needs of [the] environment, society, and the economy' (pp. 33) and that the new regional transportation approach addresses this. Section 2.9 of the RDS, regarding the new approach to regional transportation, states 'the overarching aim is to deliver transport arrangements which promote equitable access and meet wider economic and social needs' (pp. 18). The phraseology of 'promote' is widely open to interpretation as it can be used synonymously with 'support' or 'encourage'. The caveat is that whilst the RDS may support and encourage certain transportation approaches or infrastructure, it does not ensure that it will be operationalised.

This can be viewed in multiple ways; that the language is deliberately loose so as to not be prescriptive, allowing for flexibility; that the RDS is being careful in not becoming implicated in poor transportation developments (as they can argue that they do encourage it) or; that it is unknowingly using language which is so open to varying interpretations.

A document entitled 'Ensuring a Sustainable Future: A New Approach to Regional Transportation' (DRD, 2011) sets out aims and objectives specially for transport. Although being the 'new approach', replacing the previous Regional Transportation Strategy (RTS) it was also produced by the old DRD. For being transport focused, 'active travel' takes up a small portion of the document, although is referred to contributing to improving health. This also presents two polarising views;

1. that multiple policy documents contain similar sentiments albeit presented slightly differently and could be replicated in a more succinct format or;
2. regional policies are aligned with one another and complement each other rather than being conflicting or contradictory.

If new policies are not changing the structure of practice or it is not presented strongly or differently, the reason for a plethora of similar material considerations should be questioned as it could become overly saturated and difficult for professionals to effectively consider them all.

The Strategic Planning Policy Statement (SPPS) sets out regional planning policies used for the development of land within Northern Ireland. Produced by the DOE, the SPPS must be considered when preparing LDPs and are material to all decisions on individual planning applications and appeals, although most of the PPS's are still retained. The SPPS sets out 5 core objectives with the first objective being to 'improve Health and Well-being', which would suggest that health is a vital theme running throughout the document. Health is mentioned a

total of 52 times[26] throughout the document and there is a clear focus on planning policy influencing health; section 3.3 stating 'progressing policies, plans and proposals that can improve the health and well-being of local communities'. An additional core objective in relation to active living is 'Supporting Good Design and Positive Place-making'. This objective refers to furthering sustainable developments and whilst acknowledging how design can encourage healthier living and accessibility, it primarily focuses on environmental impacts and contributions to biodiversity. As active living is embedded into Healthy Urban Planning and the European Healthy Cities Network it is evident why active living resonates much more with the first SPPS objective.

The SPPS recognises that the planning system has a role to play in improving the health and wellbeing of the communities within NI (section 4.3), through the choices made while moving around the built environment, whether it be by walking, cycling or by staying longer in a good place (section 4.4). Within the entire document there is only one diagram; 'The determinants of health and wellbeing in our neighbourhoods' (see Chapter One: Figure 1.2). It would seem promising that the only illustration provided in core strategic planning policy relates specifically to health. Several recommendations within the SPPS when making decisions are associated with physical activity, such as safe pedestrian environments. The SPPS encourages engagement with government bodies and agencies within the health remit, which would undoubtably be beneficial in addressing the public health issues which are influenced by planning. While initially encouragement may sound positive, the rhetoric expresses it as not essential (4.6), 'may engage', 'may include consideration of potential health…impacts', 'may bring forward policies that contribute to improving health'. This raises questions and concerns regarding how this is interpreted and implemented.

There has been an effort to include health into national, regional and local policy and associations and recognitions between planning and health are deemed important. It is

[26] Almost half being 'health' along with 'wellbeing'.

positive that policies have health mentioned consistently throughout, and it is involved within their overarching, strategic aims and objectives. Policy seems to be tackling issues with recurring rhetoric but within the areas of health and physical activity, there does not seem to be a specific focus and obesity is only mentioned once. The onus seems to be on roads, and alternative transport and not spaces around buildings, or alternative routes to improve pedestrian movement. Although the SPPS consolidated the original PPS, most are still used within the planning process.

Planning Policy Statements (PPS) set out the policies of land-use planning before the SPPS. They are twenty-five PPS, including revisions and addendums, introduced periodically over recent decades by the DOE. In addition to these, there are design guides and development control advice notes in the form of supplementary planning guidance (SPG) which are not mandatory but can be used for achieving certain standards within development. There are fifteen DCAN and 3 design guides, two of which are of significance to the research; Creating Places (2000) and Living Places (2014). Creating Places provides regional guidance on the design, character and layout of new housing, setting out the standards expected of developers. It places focus on sustainability and sustainable patterns of living. It encourages and emphasises placed-based approaches rather than rigid requirements for vehicle movement (paragraph 4), relating strongly to active living. Although focusing on residential development it also claims to be used for larger mixed-use developments.

Living Places is also a design guide which seeks to inform and inspire all those involved, in the process of managing and making. It was driven by the Strategic Design Group (SDG) who are a group of professionals across many professions, endorsed by the DfI, whose aim is to promote inclusive, well designed places which inspire civic stewardship – reflected within Living Places. It is written differently to Creating Places, for instance ‘layout of housing’ and ‘standards’ which is mentioned within Creating Places is more prescriptive compared to ‘seeks to inform and inspire’ which is the rhetoric within Living Places. On further inspection, Creating

Places includes specific measurements and styles regarding, pedestrian networks, road junctions, open space layouts, whereas Living Places, whilst covering similar themes, is written in the format of '10 Qualities of Urban Stewardship', including; collaborative, viable and accessible. Living Places emphasises the need for leadership and acknowledges the 'silo' structures within NI governance.

The Public Health Agency is a quango related to the Department of Health, who in 2014, produced a document (under the former DHSSPS) entitled; 'Making Life Better: a whole system strategic framework for public health', which provided direction for policies and actions for improving health and wellbeing. It hinges outcomes on what is done collaboratively in both policy and practice which influences lifestyles and choices. Making Life Better is divided into 6 themes and within the lens of the thesis Theme 4: 'creating the conditions' resonates as it discusses structural conditions and aligning key government strategies in order to improve health. It is also recognised that there is an entire theme devoted to developing collaboration and it shares the inclusion of the health determinants diagram like the SPPS. The second long-term outcome of Theme 4 in the framework is 'making the most of the physical environment', identifying that the quality of housing, the neighbourhood environment and land use and transport can be designed to promote health. Paragraph 8.4 specifically refers to 'active living' and recognises the importance of the physical environment in the promotion of health and active living. It also references the SPPS enforcing the positive role that planning can have through approaches which are supportive of health. It also mentions 'urban stewardship' a clear reference to Living Places, and even associates the built environment to obesity, a theme that is not prevalent in planning policy.

The LDP is the spatial reflection of the community plan, ensuring land availability for housing, employment and community facilitates, by identifying the best locations for such development, whilst protecting the landscape. It is a five-step process[27], which at the time of the research,

[27] 1) Timetable; 2) Preferred Options; 3) Plan Strategy; 4) Local Policies Plan and; 5) Annual Monitoring

only Derry, Belfast and Armagh councils had completed step two, the Preferred Options Paper (POP). The relationship between these corresponding, closely knitted, documents is crucial as they are the vehicles in which regional policy is to be implemented at a local level. Therefore, the PfG, RDS, SPPS and design guides are should be used in order to address health and wellbeing goals, which are prevalent through higher tiered policy. This means that the community plan and local development plan not only have a lot of responsibility, but a significant amount of opportunity in delivering health outcomes and active living, and with that contributing to public health issues. The challenge, and where questions arise, is how are local planners implementing this, what are their, and others, interpretations' of policy?

In general, the PfG and policies from devolved departments and local governments indirectly support active living. As the PfG is the most recent document produced it is fair to suggest that its influence cannot filter down into regional and strategic policy as those were produced prior. Therefore, the PfG will currently have most influence at local level, as no new policy at regional level can be produced without Ministerial handoff. This provides local policy with a greater opportunity to incorporate health and active living principles within their own policy. Furthermore, even though the recent PfG, did not influence current regional policy it is not to say that it does not influence practice and professional perspectives. The RDS and SPPS, do refer to and incorporate health, having improving health and wellbeing as a core objective. The potential opportunity for embedding healthier practices through policy certainly exists, however it also raises questions on how this is translated in the end-product within the actual built environment. Throughout the empirical chapters certain initiatives and projects within Northern Ireland which tailor towards healthier approaches are referred to and therefore it is necessary to provide context to these so that they are fully understood when referenced. The following section will also provide some context to initiatives and projects which may hinder healthier approaches and are also referred to later.

4.5 Initiatives and projects

This section explores the recent and upcoming initiatives and projects which have been carried out within Belfast, Northern Ireland. As NI is Belfast-centric many projects either initiate there or garner more traction within that geographical context. The projects addressed here specifically relate to active living and improving health and wellbeing. Even though Northern Ireland has a small population, it is not exempt from conditions which hinder health, for example containing characteristics of urban sprawl. Northern Ireland relies heavily on the private car which policy has recognised with regards to encouraging active living. Therefore, projects which focus on the health agenda provide great insight into the potential of implementation, offering best practice guidance. Conversely, there have been other examples which conflict with active living, which are also worth mentioning. The empirical chapter then captures the experiences and real-world perspectives on these contextual projects.

4.5.1 The Connswater Community Greenway

With funding from the PHA, Belfast has achieved pioneering concepts such as healthy urban planning and health impact assessments, delivering programmes across all sectors, one of which is the Connswater Community Greenway (Ellis, 2016). This was not the first greenway to be regenerated however, due to its location within Belfast, the project received a significant amount of attention, influencing many other localities in developing their own greenways. Connswater has 9km of linear parks, connecting open and green spaces and impacting on forty thousand residents, pupils and students around the area (connnswatergreenway, 2012). The cost of the project (£40m) was estimated to be potentially recovered if only 2% of inactive citizens within East Belfast achieved the recommended physical activity levels as a result of the scheme, demonstrating the possibility of positive economic impact and an exemplar in bottom-up collaborative working.

4.5.2 Belfast Healthy Cities Initiative (BHC)

Belfast was one of the initial cities to be selected into the WHO European Healthy Cities Network in 1988 and has since been active in all six phases (Table 2.1). As Belfast is the major economic driver and has the highest population by a significant margin, many interventions are implemented through the city. In Health Urban Planning (2000), Belfast was referenced to illustrate examples of the structure of the Belfast Healthy City Project, prior to the RPA. Belfast Healthy Cities (BHC) remain in effect within the city and work with both central and local governments, elected representatives and community leaders, stakeholders and organisations. They promote collaborative action and policies through the lens of health and wellbeing and help the city of Belfast to achieve the goals of a Healthy City.

BHC recognise and emphasise the need to develop evidence-based policy to increase physical activity and prevent obesity. They identify suggestions how planning policies can help with public health concerns such as ensuring planning applications prioritise physical activity in everyday lives, provide services, pedestrian footpaths, green spaces, and many other considerations (BHC, 2014). Connswater Community Greenway and Belfast Healthy Cities have proven to also substantiate economic, social and environmental benefits as well as tackling chronic problems like car dependency and social cohesion. However, healthy urban planning approaches are still not fully embraced with the local and regional planning systems in Northern Ireland (Ellis, 2016).

4.5.3 Better Bedford Street

The Better Bedford Street project was an innovative project driven by the SDG to demonstrate practically how the 10 qualities of urban stewardship within Living Places can be delivered. It was a temporary initiative which transformed how the traditional inner-city street functioned. Parking was removed, pavements were widened, new seating and planting was placed in the

form of parklets. The intention was to achieve more space for people, less for cars, making the street engaging, more accessible, 'bringing the place to life' (ICE, 2018)

4.5.4 The York Street Interchange

Although some projects have proven to support active living, others have had negative repercussion – not only in terms of active living but concerning decision making. The York Street interchange was a project which attempted to relieve the bottle necking of traffic on Northern Ireland's busiest roads, the Westlink, M2 and M3. This project intended to solve traffic problems through major road infrastructure investment costing around £150 million.

4.5.5 The Arc21 Waste Incinerator

Another project, relating more towards decision-making and power, is the Arc21 waste incinerator development scheme approved by the Permanent Secretary of the DfI, a scheme which was previously refused by the environment Minister. The major waste treatment facility was to be located in Hightown, Mallusk, for the purposes of burning waste. The project already had controversial undertones as there were suggestions around the refusal being made on political grounds. The decision was made by the Permanent Secretary during the Stormont collapse so that no further delays occurred, but their decision was condemned by politicians who claimed the decisions was only to be made by a Minister and not a civil servant, leading to Judicial Review and ultimately the decision was considered unlawful. The undermining nature the politicians took regarding a professional's decision impacted on professional practice and is discussed in the following chapter.

4.6 Conclusion

Devolution in Northern Ireland resulted in the RPA which provided local councils more responsibilities concerning planning. Local tiers of government are currently in the process of producing their own Local Development Plans which reflect the needs of the community, whilst

being in line with the Regional Development Strategy and the Strategic Planning Policy Statement. The process of devolution took excess of ten years, the policy paradigm shifting during this time with the production of a new PfG, the SPPS and Living Places. Unfortunately, a common thread lining this chapter is based on tenuous political positions and, whilst the government produced their new outcome focused approach, political turbulence reoccurred. The collapse of the Northern Irish government is thought to have impacted harmfully on policy development and to hinder progress at a time when progress was thought to be welcomed resulting in departments being left in political limbo. The following chapter begins the empirical study and critically examines policy documents in more detail and interconnects empirical data obtained from interviews to critique and investigate how a wide range of built environment actors perceive policy and their experiences surrounding the domain of planning policy.

Chapter Five: Planning Policy in Northern Ireland: critique and professional perspectives

5.1 Introduction

The previous chapter provided the context for the research, Northern Ireland, and referred to policy and projects discussed throughout the upcoming empirical chapters. Table 4.1 outlined the hierarchy of devolved government in Northern Ireland and the relevant policy associated to each government level. This chapter will first utilise Table 5.1, sequentially addressing the relevant policy and critically examining to what extent they incorporate active living. Additionally, it will draw upon the interviews which will help to triangulate findings between policy, the critique and professional perspectives and provide credibility and confirmability. The second portion of this chapter will address a potential policy-practice gap with regards to active living and identifies the divergence between the role of practitioners and the role of policy.

5.2 Northern Ireland Planning Policy Critique

The policy critique began with a broad overview of whether active living, and associated themes, where directly referenced and presented in Table 5.1, a checkmark (●) if referenced and a dash if not (-). The headings atop the table (health to collaboration) where put into the word function of the digital copy of each document. This intentionally provides general, and broad, feedback on the use of certain terminology within policy; however, it does not intend to infer that these components are not considered indirectly, simply that a direct reference is absent. Conversely, terms which seem associative are sometimes not, for example health in the Planning Act (NI) 2011 is in reference to health and safety. The broad picture that the table presents facilitated with the interview process as the information could be easily cross-referenced. To clarify, question six in the interview was:

Do you believe that current policy and legislation at the local, regional and national level sufficiently supports active living or do you consider more could be done?

The information from the table below, which largely presents policy as not being entirely representative in active living, could then be used to probe participants why they perceived policy a certain way and allowed to better understand individual interpretations of policy. For example, the term obesity was present in the SPPS and the PfG, although both documents only mentioning obesity once as a brief side note. Therefore, although some broad conclusions can be ascertained, that health is heavily represented throughout all relevant policy and active living is underrepresented, there is a need for a more in-depth examination and further interpretation which was drawn out through the interview process.

Table 5.1: Matrix of policy critiqued and associated active living themes

Document Level	Title	Health	Active Living	Active travel	Obesity	Walking / pedestrians	Physical activity	Cycling	Collaboration
National	Draft Programme for Government (PfG) 2016	●	-	●	●	●	●	●	●
	Local Gov Act 2014	-	-	-	-	-	-	-	-
	Planning Act (NI) 2011	●	-	-	-	-	-	-	-
	National Planning Policy Framework (NPPF)	●	-	-	-	●	-	●	●
Regional	Regional Development Strategy (RDS) 2035	●	-	-	-	●	-	●	●
	Ensuring a Sustainable Future: a new approach to regional transportation	●	●	-	-	●	●	●	-
	Strategic Planning Policy Statement for Northern Ireland (SPPS)	●	-	●	●	●	-	●	●
	Making Life Better: A whole system strategic framework for public health	●	●	●	●	●	●	●	●
	A Fitter Future for All	●	-	●	●	●	●	●	●
Planning Policy Statements (PPS)	PPS3: Access, movement and parking	●	-			●		●	-
	PPS4: Planning and Economic Development	●	-	-	-	●	-	●	-
	PPS7: Quality Residential Development	-	-	-	-	●	-	●	-
	PPS12: Housing in Settlements	●	-	-	-	●	-	●	-

	PPS13: Transportation and Land Use	●	-	-	-	●	-	●	-
Supplementary Planning Guidance (SPG)	Creating Places: Achieving quality in residential development	●	-	-	-	●	-	●	●
	Living Places: An urban stewardship design guide	●	-	-	-	●	-	●	●
Local	Belfast Community Plan: Your Future City	●	-	●	●	●	●	●	●
	Belfast LDP: Preferred Options Paper	●	-	●	-	●	●	●	●
	Armagh LDP: Preferred Options Paper	●	-	●	●	●	●	●	●
	Armagh Community Plan: Connected	●	-	-	●	●	●	●	●

5.2.1 Government Policy

The Local Government Act and the Planning Act had minimal representation throughout the interviews, with the latter only being mentioned four times by three participants. With regards to the Local Government Act, community planning was considered an important addition at this level of policy. According to H1, there have been promising signs in relation to changing behaviour and having an impact on what professionals are wanting to achieve, through community planning. In their experience community planning enables key people to collaborate and identifies how a strategy will look on a map and the role each organisation must have to achieve it. The Belfast Open Space Strategy (BOSS) was used as an example as to how this manifested, as active travel was one of the various components of the community plan for Belfast and from this BOSS was produced.

The Planning Act's (NI) 2011 inclusion of furthering sustainable development and promoting or improving wellbeing, was said to have potentially strengthened the legal case for health as it has a legislative basis (P4; P2). Although, wellbeing is only mentioned once and the few participants who did mention the Planning Act (NI) seemed to reflect that it was in reference to health and wellbeing. In further inspection, the Planning Act (NI) does not associate health and well-being together, rather health is associated to 'health and safety'. Hence, a gap in the knowledge surrounding the details of health and well-being within the Planning Act (NI) was identified.

Wellbeing was used throughout policy and during the interview process, yet, it was not well defined. Planner participants responded to it in a positive fashion, saying that improving wellbeing is almost the purpose of planning and now that it has statute basis it is being featured much more (P2). When asked directly, what is wellbeing, P2 laughed stating that they have never been asked that before, adding "*I suppose it's just how you feel*". This discloses that either the individual may not be well briefed in their professional capacity or provides insight

into a professional culture which believes that wellbeing is the purpose of planning yet struggles with defining it. P3 provided a definition of wellbeing, unknowingly reading the WHO definition of health.

When asked to elaborate on the work N1 carried out on wellbeing, they admitted that it was another colleague who worked on it, not being clear on the actual definition or evidence involved in that work. A2 exclaimed that there was a definition of wellbeing however, just like P3 read aloud the definition of health. This must be emphasised, as it is not just a matter of semantics. Wellbeing was consistently referred to throughout the interview process, however not one professional could clearly define or explain exactly what the term meant, instead many confusing it with the definition of health. However, even health as a term can result in some confusion, as where mentioned throughout the entirety of the Planning Act, it is largely only in reference to health and safety, predominantly concerning hazardous substances. This demonstrates the difficulty when using terms that are not well defined or understood fundamentally in practice and why their meaning can get lost in policy, resulting in professionals being unclear of such terms, even though they may use them daily.

The dPfG, consultation document, was mentioned throughout the interview process, being emphasised as an entirely new approach to Government as it is 'outcomes based', which sets out 'real-world' objectives on how policies can enhance services and improve lives. This implies that the dPfG is seeking to be more than aspirational as it intends on measuring and monitoring the progress of the Outcomes it sets out. The structure of the dPfG has each Outcome addressing five points:

1. Why this outcome matters?
2. What are the issues?
3. What does this look like? (graphical representations)
4. Link to Delivery Plans?
5. What will we do?

Participant H1 describes the Outcomes as mechanisms to discuss what is needed at a high level, then working down, stating that the Programme provides the reason to come together. N3 agreed with H1 that it requires Departments to work together, which is notable through the dPfG, with sentiments such as 'to end silo culture and to encourage collaborative working between departments as well as the private, community and voluntary sectors' (pp. 138). This has not gone unnoticed as E1 demonstrates that ICE have responded to the dPfG, setting up a mobility group to help support the Department and the indicators around active travel, in realisation that the government cannot achieve the outcomes alone. P10 explains how the idea of linking the departments to achieve healthier lifestyles has made those working in the DfI think more about how places link, the ability to not use the car and to use walking and cycling more.

Outcome Two 'We live and work sustainably – protecting the environment' immediately draws indirectly on active living regarding passive exercise via journeys made through physical activity, although this is largely in association to environmental protection as opposed to physical health. Furthermore, the rhetoric around public transport and active travel indicated the need to develop rural links, community transport services and free travel passes for the young and elderly. Within 'What are the issues' sustainable transport has been demonstrated as stable, having a modest 3% increase between 2014-2015. However, the sample size by the Travel Survey Northern Ireland[28] for active travel trends are small, with sample sizes averaging around 2019 participants. Additionally, cyclists in the Travel Survey are defined as 'Persons who stated that they cycled during the last 12 months' (DfI, 2019). Analysis on how people travel is vital for identifying patterns and trends, however the sample size clearly does not reflect the population of Northern Ireland and is then difficult to determine more realistic figures. This is acknowledged within NI Travel Reports which states that the statistical

[28] Entitled 'Proportion of all journeys taken where main mode of travel is walking, cycling or public transport 2003 to 2017'

significance has at least 95% probability there are genuine differences between results presented.

The dPfG's Outcome Two declares that they aim to increase sustainable transport usage to reduce demand on roads and allow for more effective road networks. H1 believed that increased transport demands were associated with increased prosperity and therefore the increase in private vehicles. H3 expressed that what tends to happen is that in Northern Ireland, they build roads, watch them fill up with cars then build more roads, as opposed to rethinking capacity and how to reduce demand on the private car. Many professionals believed a significant caveat to reducing transport demands that are not endorsed was the disincentives to discourage car use. It was suggested by many participants that encouraging sustainable modes is simply not enough, rather there should be a requirement to disincentivise private car use, through congestion charges, higher parking costs or subsidies on public transport. On the contrary, the PfG sets out to 'promote the use of electric cars' and not tackling the issue of the reliance on the private car. P4 elaborates:

> *"The cutting edge of mobility is electric cars and driverless cars, but they actually aren't related to active living, and why they are being pushed is they are within the tramlines of society, it's not what we need. A radical transition in mobility would get rid of cars completely 100 years ahead, we are not thinking that way, we are just adapting technology to using a different fuel, as if that would solve it."*

This infers that without a more radical change in transport, car dependence will continue to rise. As opposed to pragmatically addressing car dependence the government places certain emphasis on replacing one type of car with another, under the guise of an alternative fuel source and benefiting the environment. It is evident that there are certain decisions which may be presented as befitting the environment but do not address car culture or physical activity. This also identifies how a health environment could be contradictory between the

characteristics of an urban environment benefiting the environment and one that benefits human health.

Outcomes Two, under 'What will we do?' (pp. 39) states to 'ensure' that Local Development Plans as well as planning decisions 'take account' of policies to encourage the use of walking. This demonstrates that the dPfG does recognise the benefit of active living, although not directly, but lacks robustness in its phraseology, arguably being overly passive. Whilst the language may not be explicit, E2, an engineer within the DfI, rightfully suggests that having physical activity linked to planning at government level is hugely important and a driver for public servants to deliver healthier strategies.

Outcome Four 'We enjoy long, healthy, active lives' covers multiple risks on the health of the population, referencing 'preventable mortality' associated with a lack of physical activity and obesity, amongst others. The physical environment is implicated as one of the issues that impact on active lives and emphasises the need for collaborative efforts. The *Healthier Lives* programme by the Southern Health and Social Care Trust is established within this Outcome. This programme details how walking has significant impact on mental health and health improvements related to cycling, potentially providing a real incentive for planning, however no link to planning is made. This emphasises how obesity and physical activity are still largely connected to health fields but less so to planning. There are, however, already recurring themes emerging, with health and wellbeing's inclusion in policy being well received and an emphasis on the opportunities regarding community planning.

Outcome twelve initially seemed to link with active living in referencing the need to create good places, however it focused more on safety and investment. Indicators on crime and visitor expenditure can loosely be associated to the research as active living principles are based on creating places where people want to live and creating safe environments and places which offer opportunity to everyone. Community planning is referred to within this objective and

importantly, a ‘place-based approach’ to service design, which infers recognition to spatial planning.

Objective thirteen highlights the growth in private vehicles and congestion. The two main indicators are to improve transport connections on economic corridors and increasing the usage of public transport and active travel to address these issues. Whilst not directly addressing car dependency, it recognises the impact roads have on congestion and states that ‘simply building more roads will not resolve the issue’ (pp. 154), a view held by professionals. On further inspection, the first item addressed within ‘what will we do?’ (in relation to improving travel times and easing congestion) is on ‘Major road dualling schemes’ potentially conflicting with the previous statement. Here, the Belfast Rapid Transit system and the Belfast transportation hub are also mentioned, and it can be argued that improving the ease off car use through major road schemes could hinder public transport use.

Overall, the dPfG addresses active living throughout the entire document, although not being explicitly referred to. P10 states how the outcomes of the dPfG link people to opportunities through infrastructure, it is then how planning can really make a case on its role in improving health outcomes and why the inclusion of community planning and place-based approaches are significant as this should impact on practice. However, whilst professionals thought that dPfG allows for collaborative approaches, others argued that it only sets out aspirations and questions were raised regarding concrete actions. N4 questioned how these outcomes are being delivered. In addition, D2 clarified that the document is only in draft and, although there are signs that health is being addressed, also questioned how it will then transfer into the final product. This raises concerns on the acknowledgement, willingness, and ability for such professionals to work towards a greater sense of shared purpose. It also calls into question the governance model that facilitates partnership working/collaboration – and the norms, values and culture – and leadership aspects.

5.2.2 Regional Planning Policy

Regional policies are developed by the government departments which provide guidance that applies to Northern Ireland as a whole. Regional policies inform the production of local development plans and are a material consideration in planning processes.

Regional Development Strategy (RDS)

The regional guidance (RG) in the RDS are presented under the sustainable development theme of economy, society and environment and are most relevant to the research. RG2 points to managing freight, improving access which addresses congestion and taking a safe systems approach to road safety. With the movement of people being included within transport, there is no mention of the movement of people outside the remit of roads and public transport. Thus, it does not address how people physically move throughout a city, the majority of pedestrian movement being in association to arterial routes.

'RG6 Strengthen community cohesion', 'RG7: Support urban and rural renaissance' and 'RG8: Manage housing growth to achieve sustainable patterns of residential development' complement active living principles and fit well into the overall concepts - predominantly concerning housing. RG6 identifies how no barriers, perceived or physical, enable people to undertake activity, and encourages mixed housing with regards to sizes and tenures. RG7 discusses the importance of regeneration and mixed use, as it is necessary to create accessible and vibrant cities and RG8 encouraged compact urban forms, which links to the density characteristics of active living environments and appears to oppose urban sprawl.

The interviews did reveal that urban sprawl is a problem with P1 perceiving urban sprawl to be a cultural problem, from both society and professionals. P4 explains that the built environment in Northern Ireland is disastrous for health and that if a local planner is confronted on this they would admit that they cannot do anything to stop it, describing it as a complete contradiction in terms of addressing sprawl through these RG and what is being implemented.

Now, concerns around the power of local planners are brought to attention as they are theoretically supposed to have much more responsibility over planning since the RPA. P7, a local authority planner, stated that it was unfortunate planners do not have regeneration powers, stating that in Northern Ireland "*there is still a bit to go for councils*", adding that there is a general reluctance to do anything major. Whist not pinning down the root of the challenges at local level this certainly proves that local planners are perhaps struggling to produce significant changes. The powers of the local level are relatively new, and councillors and planners may require more time to become comfortable with their new roles, which could explain why regeneration remains centralised, so that the government departments can assist in regeneration schemes and that local planners are not left alone.

The environmental sections in the RG address the reduction of carbon footprints. The wording uses similar phrasing to the definition of active living (pp. 44):

> By designing neighbourhoods that have shops, workplaces and services, schools, churches, parks, and other amenities near homes, residents and visitors will have increased opportunities for walking, cycling, or taking public transport as they go about their daily lives

The inclusion of increased physical activity in daily lives is fundamental to the active living concept. Here, it not only reflects explicitly on neighbourhood design but also certifies, even guarantees that it will increase the opportunity of physical activity. Critically, the strong rhetoric ('will') is insured by stating cleverly that it will not increase physical activity but rather the opportunity for physical activity. This could be the type of wording that policy should use, essentially stating that planners will provide the opportunity, it is then up to individuals to use it. If all developments ensured provision of the opportunity of physical activity through active living principles, built environment professionals will have done all they can in their contribution to tackling obesity and physical inactivity.

The majority of wording within the RDS is more non-prescriptive than what has just been addressed, exemplified by phrases such as 'planning policy statements and development schemes are required to be in general conformity to the RDS' (pp. 90). To be *required* to be in *general* conformity appears to be two conflicting terms, and potentially being interpreted as having to be lightly based on the RDS and the document could be much stronger in its phrasing here.

A4 elaborates, that Belfast being the main economic driver will inevitably result in everyone driving into the city, which they think will only result in more car parking and focus on car dominated infrastructure. Overall, the RDS has addressed active living concepts throughout the document, although similar to the PfG not explicitly referring to it by name, and many associations dealt with separately and not being linked to health benefits. P8 proposes that reformatted it could be "*a real winner*" providing cross departmental support, but not in its current form.

Ensuring a Sustainable Future: a new approach to regional transportation

The new approach to regional transportation connects active travel to improving health and wellbeing, although it is evident that a core focus of the document is on sustainability and with that, growth of the economy, safety and inclusion, and environmental impacts. The previous chapter outlined that this document was to replace the RTS, yet it was not referred to throughout the entire interview process, and the RTS being referenced once by E2. This could mean that participants failed to make the association when policy was discussed, or that the document itself may not have the impetus the RDS and other key documents have.

Strategic Planning Policy Statement (SPPS) and Planning Policy Statements (PPS)

Although the interview question regarding policy was tailored specifically towards active living, participants also offered their thoughts on policy documents in general. P7 defined the SPPS as a "*text heavy document*". They believed that it "*speaks volumes*" for such a text heavy

document to include only one diagram which concerns health, adding, that it is "*pretty impressive*". Concurring, P11 explains how the inclusion of the determinants of health diagram demonstrates that health should be considered, and how important it is to have health included, explicitly as a material consideration. The diagram, within the SPPS, is linked to plan-making and decision-taking and how planning authorities can positively contribute to health (section 4.5) many being directly associated with active living principles including:

- safeguarding and facilitating quality open space, sport and outdoor recreation;
- better connected communities with safe pedestrian environments;
- better integration between land-use planning and transport;
- facilitating the protection and provision of green and blue infrastructure;
- supporting broader government policy aimed at addressing, for example, obesity.

The SPPS has a strong collaborative theme throughout the document, although it is not expressed to be mandatory; "Whilst not a statutory requirement" (section 5.49); planning authorities, developers and other partners will have early engagement and 'should work collaboratively' (section 6.284); as well as 'may engage', 'may include consideration of potential health…impacts', 'may bring forward policies that contribute to improving health'. This suggests that, although it is encouraged, it is voluntary that planning authorities collaborate with health professionals. Therefore, professionals could bypass this if they did not deem it important, which infers a level of interpretation and individual opinion.

When the SPPS refers to health there are several themes which reoccur, for example (section 4.8) 'the provision of' new, quality open space within or close to settlements, which has many promoted benefits within policy, with passive activity being mentioned, directly linking to the active living concept. 'The provision of' is repeated 58 times throughout the document, with references to outdoor recreation, public areas, green space, cyclist facilities, improved infrastructure and more; all linked to having cultural, social, economic, health and

environmental benefits. These are also themes which have been addressed within the interviews, demonstrating synergy between policy and professionals.

Section 4.14 addresses how the planning system has an important role in supporting the government 'through its influence on the type, location, siting and design of development'. Here, there are many examples provided which relate to active living including, mixed use developments; active street frontages; public paths and cycle ways; and passive spaces such as civic squares and public parks, showing promising signs which can be used to implement active living concepts in practice. This emphasises that active living principles, again although not explicitly addressed, are consistently mentioned throughout regional policy. Even though the language is not strong it demonstrates links across academic literature and policy.

Objective Four in the SPPS is entitled 'Supporting Good Design and Positive Place-Making'. The topic of design discussed in this objective immediately draws on furthering sustainable development, but it also acknowledges that design can encourage healthier living and promote accessibility and inclusivity. The focus tailors more towards environmental impacts such as minimising energy, water usage and carbon emissions. This objective does not address how design can encourage physical activity as it only refers to promoting accessibility without defining what mode of transport accessibility should be promoting. Section 4.29 states that 'Planning authorities should not attempt to impose a particular architectural taste or style arbitrarily'. This implies, that planners can impose a design standard if it is well-established and applies within the context of an application. This is where policy could be used to contribute to the promotion of active living design. In addition, place-making was a term that was used by several participants albeit briefly. In the SPPS it refers to place-making as a people-centred planning approach which involves collaboration. Place-making in the interviews was heavily associated to the SPG Living Places.

For the purpose of this research not all PPS were relevant and therefore discounted. Furthermore, considering the amount of information among them they will be presented in

brief. Five PPS were examined within this portion of the research. The terminology of the PPS can be dissected to establish the context to which health and active living principles are addressed.

Table 5.2: Phraseology used in PPS

No.	**Title**	**Phraseology**
PPS3	Access, Movement and Parking.	Developers *should take account of*; pedestrian priority to facilitate pedestrian movement within and between land uses.
PPS4	Planning and Economic Development	Regenerating areas through *economic development alone,* or as part of a mixed-use approach.
PPS7	Quality Residential Environments.	Encouraging compact urban forms. major development schemes on greenfield sites will *normally* require the provision of an appropriate level of facilities to meet the needs of the new community.
PPS12	Housing in Settlements.	The layout *should protect and respect* natural habitat and heritage, encourage walking and cycling and *should* provide convenient access to public transport.
PPS13	Transportation and Land Use.	In ways which enable people *to carry out their everyday activities* with less need to travel and with the maximum modal choice.

Whilst some wording correlates directly with active living principles, it is evident that a lot of the phraseology is loose, implying that the content is based on recommendations and not enforcing or stating that something 'must' be done, especially when it refers to health; or active living principles, like the SPPS. A common thread throughout almost all the PPS was the

'effective integration between land use planning and transport', this is also echoed in the RDS, and is in relation to urban renaissance of developing compact urban forms. From the perspective of active living, a clear and concise connection can be made between the two, which could provide the concept with more robustness, however in the RDS, on the same matter, states that studies should be carried out to assess this further and the theme overall lacks detail.

A2 candidly critiques that the SPPS and PPSs have a large level of ambiguity, and "*a good lawyer could work their way through that*". In addition, there is a disparity between the impact a health focus within policy has had on professionals, and this perspective has not necessarily been professionally cultured. For example, there were different opinions from planner's regarding if planning policy supports active living:

> *"Well, it's not strong. Put it like this, could you take a legal case against a development which doesn't purposefully promote [active living], no you couldn't. Could you take a legal case against something that actually clearly generates more cars, no. Therefore, that would be the touchstone for me, then no it doesn't. It's not strong enough."* – P4

> *"I think it's more to do with implementation. You can always refine and make policy better; I just think that the policy isn't too far away. It's saying all the right things. Even when you have very black and white policy around flooding or safety, you can still set aside policy because you are balancing it with all other material considerations, and its possible even then that something can go ahead that's maybe not in line with policy but for other reasons is excepted" – P10*

These quotes reveal two different perspectives from participants working within the planning field. The first emphasises that policy is not robust enough in its support for healthier outcomes due to the lack of legal enforcement on active living considerations. This can be qualified in a lot of policy documents which discuss health and active living principles but lack strength, again relating to the use of language. However, P10, outlines that no matter how black and

white policy may be there are always some other material considerations which can be considered in favour of a certain decision, implying that it is possible that something can be approved even though it isn't directly in line with policy. Therefore, P10 believes even stringent policy can be interpreted and overlooked by other policies, resulting in the idea of active living considerations being embedded somewhat futile, them too, potentially being overlooked.

Similarities to regional policy in England can be drawn, for example the NPPF has had a similar evolution with the integration of health, to the SPPS. P11, a planner working within the TCPA, explained how there are many references in the NPPF to sustainable transport and active living principles generally, strengthening this theme within policy as recently as July 2018. They explain that, in terms of wording, policy is supportive, however when it comes to specific sites, a need to take into consideration what policy can do to a specific area is required. P12 concurs, with the NPPF trying to be more holistic in its approach, however, admitting that the property industry is glacial in terms of its progress to change which suggests that shifts in practice are incredibly slow to occur.

Supplementary Planning Guidance (SPG)

The two SPG discussed within this section are Creating Places (2000) and Living Places (2012). At the time of research Living Places was especially pivotal and being driven by the DfI, specifically in relation to urban stewardship, a term used to describe the care of the urban environment. Living Places has a collaborative and multi-disciplinary focus and also recognises the impact politicians have in passing laws and underpinning urban functions. Whilst not explicitly linking to active living, it is evident that this document resonates deeply with the collaborative governance components to the research and is why professionals (P10; P2; P3) are encouraging its usage; actively engaging with professionals to use it; sending it out to councils and; taking it to meetings - handing it out at every opportunity. The Living Places document is regarded as setting the stage for how development should happen, and many professionals recognise what supplementary guidance's intend to achieve, described

as helpful in the health agenda because it talks about healthy places (A1). However, there remains a disparity between professional perspectives, similar to the PfG and SPPS. For example, A5 described Living Places as "*bedtime reading*", because it is not prescriptive, adding that they might look at it at the end of a project:

> *"I think, Creating Places was prescriptive, you could go to the appendices and see this is how many car parking spaces, this is how this should be designed. Living Places, it's not prescriptive. It's obvious they've done that on purpose, but at the same time, it's the kind of thing you could read at the end of a project and see "did we match up to that".*

It was noted that the first reference made here to Creating Places was in reference to car parking again highlighting the professional culture towards cars. A5 further argued that due to the style in which Living Places is written, it is hard to extract what is needed quickly which makes it challenging to implement in practice due to the nature of their work being high pressured and under significant time restraints. With the exception from the planners interviewed, most participants admitted that the wording, being non-prescriptive, is partly responsible for its ineffectiveness. Creating Places, on the other hand, was portrayed as being easier to utilise as it tells professionals what they need to do and can be accessed quicker which makes it easier to refer to in practice.

A5 was correct in their deduction that the non-prescriptive style of Living Places was intentional. P3, a planner who helped produce Living Places, expands that Living Places is deliberately not a tick box exercise, rather more about "*putting ideas*" within it and building from that. Planners within the DfI are trying to drive Living Places as a guidance tool that planners, architects and developers can all use, deliberately moving away from the prescriptive nature of Creating Places, to something that can push conversation to implementation. A4 stated that professionals are worried about policy and guides being too prescriptive as it could hinder development coming in which H5 agreed with, stating that policy

must be careful not to be too rigid, as rigidity does not allow for flexibility within local authorities and would be too constraining.

A more flexible approach could be the reason that health considerations are rarely enforced. In fourteen years of professional experience, A6 admitted they have never come across imposed decisions regarding cycling or restrictions on parking. A6 continues:

> *"Yet if you are 2 metres below the separation distances of houses, [planners] come down hard. [planners] zone in on bits and ignore others...and to me that sums it up. No matter what I do or don't do it comes down to the planners. Unless they are enforcing something, that gives me a stick to hit the developer with, they will roll their eyes and say well whatever needs to be done. I think it starts at the top with planners"*

D4 agrees with A6, stating that if something within the development process is not mandatory they will not do it, as it is perceived as time wasted. Yet, Creating Places is also non-mandatory, yet it seemed much more embedded professionally:

> *"Creating Places, you have engrained in your head, because it's been about for so long, and Living Places is but, I feel a little more could be pushed on it. But it definitely is coming through a lot more, but the Creating Places is still there so which one?" – P1*

There is confusion over the utility of both documents with some professionals claiming the non-mandatory nature of Living Places resulted in it being underutilised, yet Creating Places was inferred to be utilised significantly even though also being a guidance document. It has already been expressed that P10 believes that implementation is more important than policy in delivering active living and A1 stated that they do not think policy drives the overall health agenda. This reveals how policy is interpreted completely differently and demonstrates that, regardless if policy is prescriptive or non-prescriptive, there is conflict between professionals' perceptions on the power of policy, whether it is policy that drives or acts as a catalyst for

significant change or not. On this matter, perspectives are not divided neatly into specific professional cultures but opinions which seem to stem from individuals.

The use of Living Places was also questioned with those involved in the production of Living Places claiming that it is not necessarily for development management specifically. P2 and P3 (local planners) clarified that when local policies come forward it can be of use and that councils were using it in the production of their planning strategies. Yet, when asked if P5 and P6 (part of an LDP team) utilised Living Places for their LDP they stated:

> *"living places would be dealt more on the development management side, no not necessarily. We look at them all really, but that wouldn't be one that stands out that we go back to… I know that it is looked at in development management a lot, but in terms of separation distances and things like that. But I would admit maybe not necessarily as much in [the LDP], but maybe in the urban housing its discussed in there." P6*

> *"it's more of a guidance on planning applications rather than what we're doing. I know I haven't looked at it."* – P5

The irony here is that Living Places is referenced several times throughout the Preferred Options Paper discussed here which draws out contradictions between planners and the planning policy they themselves are producing. This is also revealing how P6 refers to housing separations here which A6 claimed planners, for an unknown reason, were particularly strict on. Regarding Living Places being used within the production of LDPs P8 proclaimed that they wouldn't be surprised if LDP teams were not looking at Living Places because they didn't believe it was being "*sold that way*". When probed on how Living Places was being sold the response was candidly, "*I'm not sure to be honest*".

P2 mentions another participant's contribution, E1, as being excellent regarding the production of Living Places, explaining that they see the importance of it, the mindset behind it and its contribution to creating better places. However, E1 themselves, when discussing Living Places and its utilisation for engineers states:

"Well, in NI we haven't done a lot around that but probably could do a bit more. I'm just not, it does feel more like it's the fabric of the space rather than the… [long pause] *…so if you think about the human body the civil engineers are the bones, circulatory system, nervous system. I know that stuff does impact on people but…* [long pause] *…" – E1*

In context, the above quote demonstrates the participant finding it difficult to articulate how Living Places resonates with engineers, implying that it doesn't by inferring the document does not cover the infrastructural elements to engineering and finding it difficult to analogise, or find a place for, Living Places. This is unsurprising when considering how planners are "*selling*" it with sentiments like Living Places is "*almost a way of getting you there*", which is not defining the intention or the purpose of the design guide purposefully. With engineers being very prescriptive in their approaches to practice it is understandable why Living Places would not resonate with them. H4 explains that ultimately it is down to the government's choice on how policy can accommodate towards the health agenda, describing the choice as either "*a carrot or a stick*", a debate which polarised professionals. Nevertheless, with the inclusion of health in policy, whether it is deemed adequate, or conversely insufficient, it may not have any reflection on the outcome due to other factors (P4).

Living Places itself is viewed positively and recognised as a useful document within the development process. The document seems to have a lot of expectations around it, particularly from the perspectives of professional planners working within the DfI, however this was almost exclusively sided with the reality that it probably does not meet their expectations regarding how it is referenced in practice. Some planners reported that they would expect to see the qualities referred to in Living Places flow down through to the LDPs and that that would help it carry more weight and power. It has been demonstrated that there is a lack of awareness of how to use Living Places and there is confusion regarding its utilisation.

Non-departmental public bodies

Neither ‘Making Life Better’ or ‘A Fitter Future for All’ were mentioned throughout the interview process, even though both recognise the significance of the built environment regarding health and obesity and the former directly refers to active living (section 8.7). The connection to the research goes further as they also contain core elements surrounding governance, leadership and collaboration, even linking the approach to public health through community planning at local level. Making Life Better promotes a key project in Active Belfast, which encourages physical activity through community gardens, walking, cycling and outdoor gyms. In addition to these resonating themes, Healthy Urban Planning is referenced which fundamentally links together the usage of buildings and surroundings rather than just on the urban fabric (p. 114). A Fitter Future for All directly correlates obesity with the built environment, framed under the ‘obesogenic environment’. It recognises that certain influences can contribute towards obesity, including environment, planning, design, transport, physical activity, food, policy and culture. The document discusses walkable neighbourhoods and accepts multiple levels of responsibilities in tackling obesity, the individual, but also all those involved within governance structures. Both documents not only heavily associate health with urban planning but significantly, obesity and physical inactivity. This clarifies that obesity is embedded into the public health remit and is almost absent in planning policy. Challenges could arise in tackling the epidemics, which requires collaboration, as it could easily be argued planners may not associate themselves with obesity, as it is vastly underrepresented in policy.

Local Development Plans

At the time of research, only a few LDPs from the new councils were published at the first formal stage in the preparation referred to as the Preferred Options Paper (POP). P7 confirmed this by stating they were the third council to have a POP produced. P5 and P6 (part of the Armagh, Craigavon and Banbridge LDP team) expressed the difficulty and concerns regarding the production of the community plan and critically, the challenge in reflecting it

spatially. The vision in the Armagh, Craigavon and Banbridge (ABC) Community Plan states to have a "*happy*" community. P5 and P6 both concurred the term 'happy' cannot be reflected spatially and that happiness cannot be expressed on a map, and consequently had to be left out. Here, the differences between the two plans emerged, with P5 informing that unlike the LDP, the community plan is not legislatively bound to be in conformity with the RDS and SPPS. Furthermore, P5 explained that the community plan sits at a very high level within the council in terms of policy and plans, as high as the corporate plan, adding that the LDP sits below it. They admitted that this was not how it was "*sold*" to them, rather it was expressed as a three-pronged approach and how they were disheartened when it did not transpire in that manner. P6 expressed that the CP "*cantered on*" because the councils wanted to have their plans produced first, which resulted in a vision that the LDP team found difficulty spatially reflecting and consequently lagged behind. This demonstrated a lack of communication between two teams working together within the one council. P1 had hoped that this would not be the case because health themes were emerging:

> *"the community plans need to align with LDPs, because in the community plans [active living] is coming through…but making sure that that then carries through to your development plan and how...just making sure that its translated and embedded"*

Consequently, it is through the LDP that changes in planning can be driven particularly through the outcomes focused approach exemplified within the PfG. Therefore, it is surprising that the perception from local planners on LDP teams have experienced the community plan obtaining a higher level than the LDP and how they seemed ill-at-ease that this was the case as it was not initially portrayed to them in such a way. This exposes how discussions around the production of the CP and LDPs have not been implemented accordingly. It also questions why the CP has been driven much more than the LDP. Additionally, as the LDP process will not be completed until 2022, P6 explains that currently the ABC council are working from four extant plans which is resulting in an inconsistent approach. This reflects on how professionals

find it difficult having to refer to different documentation and how this can lead to unreliable results. However, it has been found that even the new approach of the LDPs spatially reflecting the community plans has also demonstrated inconsistencies and underlying issues with policy at local level.

When considering active living some inconstancies were highlighted during the interviews, with P6 expressing that health and connectivity links right through the LDP, as does accessibility, and having mix use developments, even linking permeability as a key issue. Whilst this cannot be questioned, potential contradictions can be drawn out in reference to P5's thoughts, stating that there will still be zoned land for housing, but that the location will be linked to where economic development land is going to be located. D5, regarding the health shift and the draft development plan, retorts that it is ambiguous and not a priority, and how policy terminology is "*loose*" resulting in developers being able to find loopholes. N3 states, that policy is reluctant to go beyond general guidelines and go for specific sets of guidelines which a developer cannot ignore. The example they provided surrounds the reduction in parking standards or increasing cycling facilities, adding that although LDPs may include this type of policy, their suspicion is that they will not.

The next phase of the LDP process consists of the draft plan strategy which P7 explained as an "*unusual thing*" as it portrays that it is a strategic document but that it also must include operational policies, like those within the PPSs as once the draft plan strategy is adopted the PPSs will no longer apply. In Northern Ireland this was described as unusual to have a strategic vision, whilst still bringing in day-to-day policy all under the one document. P7 adds:

> *"The rest of the UK would be different, you do have everything in the one plan, and you would have your maps and zonings at the same time, we don't even look at zonings and designations until the next part of the plan which is 2-3 years away. So, you are going to have policies which are relating to designations and zonings which actually don't exist until we go through the next stages of planning" – P7*

Therefore, the approach is evidently similar to the rest of the UK but there is certain apprehension amongst professionals regarding the transition period, with the process being so long and other policies still being utilised.

The draft plan strategies were not yet released when the empirical work was being carried out, however P7 expressed candid complexities in Belfast, particularly regarding the extensive public consultation process which was estimated to be fully adopted and endorsed by 2022. Until then, Belfast has adopted the Belfast Urban Area Plan, which was produced in 2001, due to the draft Belfast Metropolitan Area Map being quashed because its adoption was done illegally (P7). This was settled following a High Court's judge ruling who found that the plan failed to achieve agreement at Executive level. Therefore, the plans that Belfast are currently working from are old, similar to what P5 and P6 alluded to, but they carry the weight as they still retain material consideration. The process is incredibly slow, needing to go through committees, due process and getting political consensus, which in Northern Ireland, "*can be difficult*" (P7).

After the draft plan strategy stage, a local policies plan is produced which then has zonings and designations, DfI check on the progress of the LDP and ensure it is sound and can progress through to public examination. Once it progresses, P5 states they can start "*to draw lines on maps*", adding that a certain amount of hectares will be for economic development, and another area will be zoned for housing. Here, contradictions to discussions regarding permeability and mixed use can be debated as there is direct reference to single land use zoning and concerns regarding connectivity and the hindrance it could have on active living.

5.2.3 Summation of the Policy Critique

Policy at all levels does refer to active living principles without referring to the concept directly. What is noticeable is the extent to which it was mentioned, largely being peppered throughout and having no association to obesity, with the exception being public health strategies. Policy

relies too much on interpretation and due to its subjective nature (D3), decision making is inconsistent and can be malleable (A2). Furthermore, vital documents such as Living Places are largely underutilised even though they set out good practice for better environments such as urban stewardship. If a goal from politicians is to improve health, or indeed, to tackle physical inactivity, the gesture towards achieving such a goal should not be tokenistic. There is a real threat that unless health is embedded and becomes a requirement it will not be done (P1). Practitioners are well versed in the current standards of practice, yet associations to health are ambiguous, no participant acknowledging who should take charge, or drive it, and seemingly being unenforced. Planning consultants believe that is where it needs to have an impact, getting health and active living principles embedded in planning standards, yet there are contrasting opinions placed on whether this should be embedded within policy or not. It is corroborated by D5 who stated that when it comes to the planning process, they will only do what is required, and if it is something which is not enforced and will make the process longer, or harder, they simply will not do it. This infers a clear gap in policy and in practice and raises questions concerning the role of policy and practitioners.

5.3 The Policy-Practice Gap

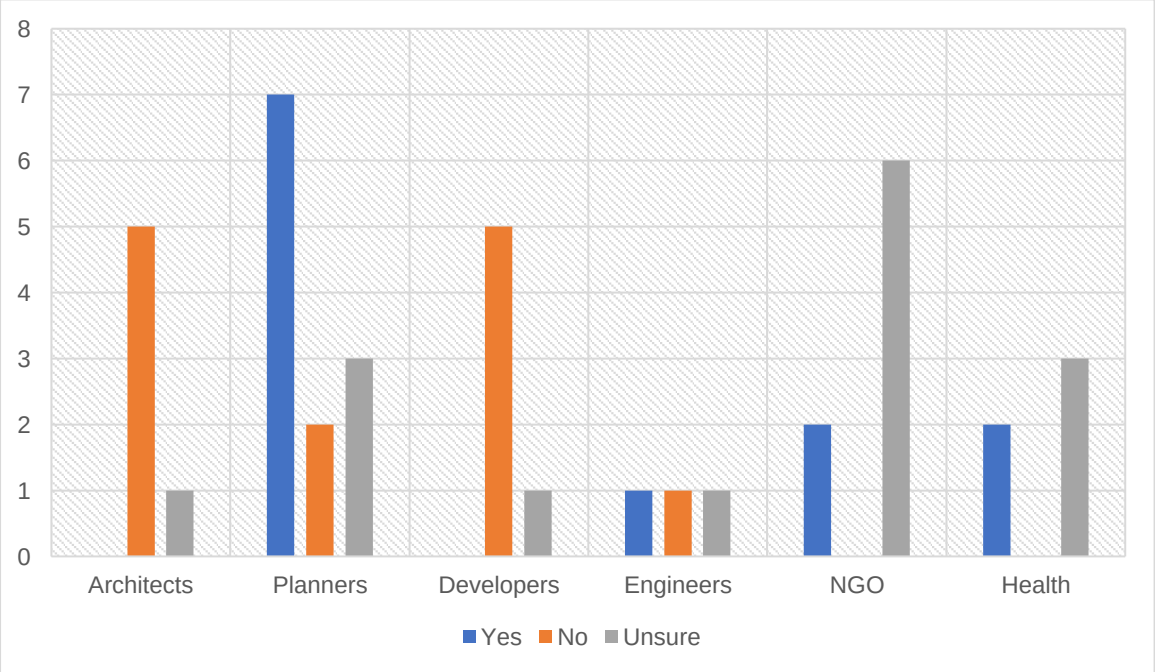
This section explores the concern around a policy-practice gap, meaning the divergence between what is written in policy and what is carried out in practice, regarding active living. Two key themes emerged from this discussion; the role of practitioners and the role of policy. First, the policy-practice gap will be addressed.

5.3.1 The Gap

With health being at the forefront of the PfG, RDS and SPPS, with regards to outcomes, visions and objectives, questions were raised concerning whether this resulted in a shift to more health orientated practices. Out of the forty participants interviewed, twelve participants (30%) stated to have experienced a noticeable health shift, thirteen (32.5%) stated to have

not, and fifteen (37.5%) were unsure. However, when considering different professions, the responses are evidently more imbalanced (Figure 5.1):

Figure 5.1: Professional Perspective on Noticeable Health Consideration in Planning Practice since the RPA



All architects and developers interviewed had not experienced an increase in health considerations in practice since the 2012 reform, when 'improving health and wellbeing' became a core objective in the SPPS. This finding is corroborated by D3 who indicates, when asked if they have experienced more focus placed on health, that:

> *"I would have to say I haven't, which is a bad thing obviously, if it's supposed to be getting implemented. Planning policy has to lead by example, we have to enforce planning policy, so that's what should be happening, but I don't see any evidence to drive things that way. From every angle, all the stakeholders have a responsibility to do that, but I don't believe it's actually happening…that's not to say it's not happening but I haven't seen it" – D3*

This sentiment is strikingly similar to that of an architect's opinion, A3, who, admitted it was their first time they heard of health being a core objective in planning policy. They continued

that there tends to be a significant contrast in what professionals must do against what is aspirational. They referred to the PfG and other high-level documents as setting out aspirations, explaining that it is actually what falls underneath which is what professionals must do, resonating with P10's perspectives on the emphasis on implementation rather than policy. They acknowledge the core objective of the SPPS as aspirational and not a requirement and therefore not implemented.

When asked directly regarding a policy-practice gap, almost half of the participants believed that there was not a gap between policy and practice, with eleven participants adamant that a gap existed. Architects and developers all believed that there was a gap between policy and practice which has correlation to the participants who believed that policy is supportive of health and active living and those who did not believe there to be a policy-practice gap. To reiterate, everyone who claimed there was a health shift also claimed that there was not a gap, and those who had not experienced a shift in practice, noted a gap. It can then be ascertained that there are professional cultures regarding the perceptions for a health shift and a policy-practice gap, with the architects and developers interviewed sharing similar views. Furthermore, the professionals who work closer with policy and within policy production are more likely to be uncertain, or more cautious, when discussing a potential gap. This could be a concern within the planning field however, if those producing policy are unsure if it is being pragmatically reflected and instead referring to other planners to answer such questions. Regarding a policy-practice gap A3 states:

> *"[of] course. That's always the case. Especially when things are difficult to achieve. And it's all about what you have to do, as against what's aspirational."*

However, conversely P3 stating that:

> *"active living is a broad term, but when you think about it, it's everywhere and it does have a big influence on policy."*

What is certain is that there was no consensus on whether, or not, there was a definitive policy-practice gap, as opinions were vastly contrasting. The professions that did not believe in a gap came largely from an NGO or a planning perspective, however, there were professionals from a planning perspective who also thought a gap existed, and how that was nothing new about health as policy is never strongly written (P4). Furthermore, those who disagreed that there was a gap were not explicit in their opinion, rather, it was more towards how the policy-practice gap is improving and the hope of the PfG and LDPs being a great mechanism to close that gap, demonstrating awareness of the PfG intentions. Responses from a public planning perspective, those who worked in councils or within departments seemed more uncertain about a gap with statements defending that they had not carried out a monitoring exercise (P2). Also, P3 added how planning departments within councils could help in answering questions on 'the gap' due to the proposals they receive, showing an unwillingness or uncertainty to respond. Furthermore, interviews with local planners informed that they could not speak about that, but development management would be better placed on how they process applications (P5), adding to the unwillingness to respond to the question.

A3 picks up on the point that a gap is evident as health associations are not being directly linked to obesity and physical activity, stating:

> *"So this theme of health is starting to creep in more, in terms of clients acknowledging how important it is, you're creating a really healthy atmosphere, but that doesn't extend to dealing with specifically obesity and activity, it may be more to do with the quality of the air, lighting conditions and that sense of wellbeing."*

When health is mentioned more generally it is evident that active living is a nuance of health that may simply not come to attention, even though N3 and H5, explain that active living is all-encompassing. This is most likely due to health being such a vast area and the health focus being too general in policy for active living to be succinctly framed in policy and carried out in practice. P1 provides the evidence on the misperceptions of health within planning expressing how:

"there's health and well-being, which, you understand that term…but that's maybe the environment and the health of people but it's not connecting it to actually how people live. So, there's health and well-being but also green and active places but they're not joined. So, there is that disconnect." – P1

This echoes an earlier discussion on divergence between environmental themes and health themes in policy which impacts on practice. It follows that, whilst including health and wellbeing within policy is evident and identifies issues with a certain rhetoric such as walking, cycling, connectivity, there doesn't seem to be a specific focus or a specific place for it. Active living does not seem to fit in neatly to an area and the result is it being discussed briefly throughout, but lacking detail, summarised by H2 who admitted that they do not tend to get certain messages across regarding active living, even though one of their strategies was based on the concept. According to H2 it takes a lot of effort to get the message across, exacerbated by the fact that it does not fall neatly into anyone's remit, and consequently the concept becomes "*more cloudy*".

5.3.2 The Role of Professionals

The previous chapter identified the 'Reform of the Planning System in Northern Ireland: Your chance to influence change - Consultation Paper' which highlighted the need for a change of professional cultures. N4 suggested such a change by focusing on a transport system that is designed for people first, vehicles second. They acknowledged that the draft PfG is addressing such a change in culture in terms of a focus on moving people rather than traffic but adds that in reality, the DfI's main focus remains keeping traffic moving but it remains up for debate how this will transpire professionally. Recurring challenges are still deeply embedded within the planning process which must be addressed before instigating radical professional cultural change. P5 explained that the lengthy planning process is constantly criticised, and developers were putting pressure on planning decisions. They admitted how decisions can be guided by "*would you lose it at an appeal*" meaning that decisions are being made over the pressures of appeal rather than in the public's interest. Consequently, there

was much more emphasis placed to "*get the economy going…get the economy going!*" (P5). As a result, planning applications have been approved which were not good in terms of quality but complied with policy – again, largely in terms of economic reasons.

P5 continued that they need to take account of so much policy and material consideration which can lead to difficulties. One consideration may outweigh the other and result in a project being accepted. However, it was unclear if the professional was referring to policy being outweighed by statutory power or simply by interpretation. Nevertheless, they confessed that it may not have what they wanted but "*on balance, was accepted*". In some cases, polices are cherry picked to ensure the process is smoother at the expense of what they want from a development (A6), at the expense of quality and arguably at the expense of the public's interests (P6). This resonates with what P10 stated earlier regarding how certain policies can be overlooked by others, emphasising that there may be too many material considerations which contradict one another, complicating planners' role in making decisions, and encouraging the unscrupulous to find loopholes. Hence, when it comes to embedding active living into practice the concept is marginalised. P8 believed that:

> *"things like active travel, walking routes, connectivity, and place, space and density are often looked at very separately and often bottom of the list for many developers because of viability and we need to change that kind of thinking."*

E3 admitted that the engineer professional hierarchy is "*old school*", set in their ways, stating that one of the biggest challenges in their area is changing those mindsets. This resonates with what A3 had to say about the challenge in changing the mindset of professionals who are unwilling to change, and the necessity to work with those who are closed and not open to the idea of active living. There is a reluctance in the field of engineering, that engineers have a role to play in health, suggesting that they need their Permanent Secretaries to dictate the PfG, stating that practice has been carried out a certain way but that that needs to change (E3). Whilst a high-level engineer did not participate to defend this stance, it was briefly drawn

out of E1 earlier, regarding the Living Places document, when there was the feeling that it didn't really relate to the engineering field.

During the interview with E1, road designs were discussed regarding corner gradients and how larger gradients result in long swooping corners, encourage cars to drive faster, impacting negatively on pedestrian movement, and how smaller gradients (for example, in grid systems were corners are largely at 90 degrees) slow traffic, as a tighter corner results in reductions in speed, which impacts positively on the movement of people. They admitted that they had only thought of the former as being convenient, recognising that their mindset was that it was convenient for a car, submitting that there probably does need to be a change there. This highlights a professional culture with engineers as they admit that their mindset does sway towards the movement of vehicles and they did not make the connection that other professionals (planners and NGOs interviewed), would make on pedestrian movement. E1 continues:

> *"But its whether or not the engineers, the professional side, they provide regulations or design codes, but ultimately it needs to be in support of what the government has decided to do, that's the way we are geared up here. So, it needs to be that leadership. Then we provide." – E1*

E1's perspective conflicts with A3, who stated that professionals should stop commenting on leadership and take a leadership role themselves, collectively. Many participants explained that the lack of leadership was due to a lack of awareness, however it is more complex than that. P4 insists that a few planning policies are not going to make a difference as the political system remains "*impotent*". There is a need for other levers to ensure society begins to change, a conceptual model of change. Ultimately, P4, believes that NI spends money "*all wrong*" with poor quality politicians dedicated to their own constituency crisis rather than benefitting everyone through active living. Therefore, if participants do not believe policy will solve professional problems, what is the role of policy?

5.3.3 The Role of Policy

The PfG refers indirectly to a potential gap when it discusses ways to address healthy living, one of which is to encourage active travel and the other; the healthier places programme, headed by BHC, which sets out to:

- Build capacity on how built environment policy can create healthy places
- Developing tools and models that can help integrate health into policy and practice

Here, it mentions developing tools that can help integrate health into policy and practice; and building capacity on how built environment policy can create healthy places. Therefore, it recognises a need that policy requires better health integration, but that it is often what is encouraged, rather than having strict guidelines. A3 commented on the wording from the Programme for Government, which outlined Northern Ireland strengthening competitiveness within the economy, stating that in writing it is good, but what is more important, is having concrete actions, questioning how then does the PfG programme translate that into reality. Generally, the topic seemed to raise more questions than answers, however, this is an important finding which demonstrates the uncertainty professionals seem to have on the delivery of policy into practice, and the difficulties in spatially reflecting the rhetoric in policy.

It is particularly evident in the SPPS when encouraging engagement with government bodies and agencies within the health remit, which would undoubtably have more focus on obesity. While initially encouragement may sound positive, the semantics in which it is discussed expresses it as not essential (4.6), ‘may engage’, ‘may include consideration of potential health…impacts’, ‘may bring forward policies that contribute to improving health’. This demonstrates that the role of policy is not to enforce but rather to encourage, guide and recommend professionals on practice and can either be viewed as flexible or passive.

Generally, active living principles are consistently peppered throughout policy, at all levels, and within supplementary planning guidance and frameworks. There has been an effort to

include health into national, regional and local policy, whilst not being as detailed as it could, associations and recognitions that planning has with health are deemed important. Furthermore, there are several cases where it fails to make simple associations, and this has led to many professionals arguably being confused over the correct implementation of active living in policy. What could be considered to exacerbate the issues, concerns the loose wording within policy, which drew out conflicting opinions, and the lack of awareness towards the role of the newer SPG, Living Places. Policy should have a clear and well-defined role which all professionals have a common understanding of, yet in Northern Ireland significant challenges have emerged regarding this.

From an English planning perspective related to this, P12 mentioned how policy has real issues concerning interpretation, and that it could go a lot further than its current remit. They add that there are too many "*coulds and shoulds but not many musts*", continuing, that when there are musts, they do no not necessarily focus on the right areas. P12 explains that even though the NPPF has been redrafted including more on good design, there remains the underlying rhetoric of a policy position more focused on delivering housing units rather than creating good places, with the example provided regarding how offices can be demolished and replaced with residential. Their belief is that if health is deeply embedded in national policy, it will help delivery, especially when developers may be reticent to take it on. This conflicts with what H4 perceives, (note: both work closely together on Active Design[29] projects), stating that developers should be encouraged rather than forced. A point agreed by P2 who stated how the best things in practice are done through collective will rather than imposed. Compare that thought with the earlier expressions from D5, who stated its much simpler having things set in stone and enforced and evidences contrasting beliefs and approaches.

[29] 'Active Design is supported by Public Health England and is part of our collaborative action to promote the principles set out in Public Health England's 'Everybody Active, Every Day', to create active environments that make physical activity the easiest and most practical option in everyday life.' (SportEngland, 2015)

There are positives in that the policies critiqued have health mentioned consistently throughout, and health is included in overarching, strategic, aims and objectives. The SPPS including the health diagram was noted to be of significance, demonstrating a clear recognition of health within the planning systems. Policy seems to be tackling issues with recurring rhetoric but within the areas of health and physical activity, there does not seem to be a specific focus, with emphasis sometimes being placed on health, to environments, to congestion. The onus seems to be on roads, and alternative transport and not spaces around buildings, or alternative routes to improve pedestrian movement. It is visible that these concepts and ideas are on the minds of those within the built environment professionals, demonstrating the importance of the interview work, getting actual perceptions and experiences of professionals on the topic.

5.4 Conclusions

Policies are incorporating active living concepts at all levels, from the PfG wanting to achieve increased walking, cycling and public transport, the SPPS aiming to improve health and filtering down to the LDPs which are aligned with regional policy and referring to Living Places. 'Active living' is not referred to directly in any planning policy and as a result themes such as connectivity, accessibility, density and physical activity are not connected and lack emphasis. This could be an underlying reason why health is not well represented in planning as it does not fit neatly into a particular area resulting in it being broadly brushed across almost all policy areas. The contrasting perceptions professionals have in relation to policy add to the problems. The phraseology, utility and power. Many of those interviewed placed a lot of impetus on the LDP and how it is through these that changes in planning can be driven. Others expressed how policy alone cannot instigate major changes in professional cultural paradigms. Nevertheless, it is clear that what is being built may not necessarily reflect what is stated in policy. The following chapter identifies what built environments provide the best opportunity for active living, assessing the built environment itself.

Chapter Six: Product - Active Living Checklist and Northern Ireland Initiatives

6.1 Introduction

Throughout the thesis, built environments have been associated with both, hindering or encouraging physical activity and therefore impact on public health issues, such as obesity. Chapter three divided the research into four key themes, policy, product, practice and processes and sequenced them into chapters. The sequencing is well intended as the product is juxtaposed to policy, the legislative intent behind development followed by the tangible outcomes. 'Product' refers to the standard definition, which is the result of action, in this case, human activity with regards to the urban form (Lamprecht, 2016), outlined in chapter one. This first portion of the chapter will present the observational case studies that were outlined in detail in chapter three, along with the checklist which scored each case study in terms of active living. It will also incorporate photographic evidence to represent the case areas and provide context.

The second portion to this chapter contains the 'products' discussed during the interviews, most of which had linkages to health. Many of the products discussed were located in Belfast and provide insight into the implementation of products as well as varying professional perspectives regrading each case. Therefore, this chapter entails two separate elements, as follows:

1. Four case study observations; scored in relation to active living principles, as outlined in Chapter three's research framework. Each case will outline the context of the area, the walking route, and individually address the key themes of the active living checklist; active transport, aesthetics and connectivity.
2. A review of Northern Ireland initiatives and infrastructure projects uncovered throughout the interview process.

6.2 Health Inequalities and Deprivation in Northern Ireland

Poor quality built environments have been associated to areas with higher levels of deprivation, with several interview participants referring to specific areas of Belfast. An architect (A4) alluded to the Antrim Road area, North Belfast, having a "*poor sense of place*" stating that the roads into the city centre are "*awful*" to traverse. Physical activity and obesity were also associated with poorer areas and corroborated statistically in Chapter Three. A3 clarified, that simply being poor does not make one physically active or obese individually, but when considered statistically there are clear correlations, stating how a need to focus on areas where physical inactivity is highest was required but difficult as the data on such issues has small sample sizes. Conversely, the least deprived areas have been associated with good quality environments. Participants theorised that more money is being spent on the south of the city with references being made to Stranmillis as being the most walkable parts of the city (H2) with residential space surrounded by amenities.

In addition to the low sample sizes of statistical data, the data was presented in a way which could be considered misleading. The phraseology on 'reducing health inequalities' is well-established throughout policy (particularly within the PfG), within the interviews (N1, N2, H1, P7 etc.) and the literature (Loring and Robertson, 2014; Corbin, 2005). Although, reducing health inequalities was often conflated with improving health and therefore if the health inequality gap is narrowing, health is improving. However, it was found through statistical analysis that reducing health inequality statistics actually conflicted with improving health. During data collection for the case studies, inequality gaps related to the proportion of Primary 1 children, classified as obese, narrowed over the period analysed (2011-2016). This narrowing was due to a relative worsening in the least deprived areas along with health improving in the most deprived areas. The healthier becoming unhealthier, the unhealthy becoming healthier and as a result the gap reduced (Table 6.1). Conversely, a widening of the health inequality gap related to obesity levels of Year 8 children was due to improvements

in obesity rates in the least deprived areas along with no change in the most deprived areas (Table 6.2[30]). No decline in health yet widening of health inequalities. The professional assumptions were still correct as obesity rates were higher in more deprived areas, yet this demonstrates how quantitative data can be misleading and manipulated. This reinforces the importance of more localised assessment and this research and analysis. Hence, four built environments within Belfast will now be assessed alongside the checklist discussed within the Research Framework, allowing for critical examination into how active living characteristics may be associated to different built environments.

Table 6.1: BMI – Obesity statistics on Primary 1 Children, 2011-2016

				Proportion of Pupils (%)		
Primary 1 BMI - Obese	2011/12	2012/13	2013/14	2014/15	2015/16	RAG Status
Northern Ireland	5.1%	5.0%	5.0%	5.2%	5.5%	Declined
Deprivation Quintiles						
1 (Most Deprived)	6.5%	6.2%	5.6%	7.1%	5.8%	Improved
5 (Least Deprived)	3.3%	3.7%	3.7%	4.1%	5.0%	Declined
Inequality Gaps						
Most-Least Deprived	97%	65%	57%	71%	16%	Narrowed
Most Deprived-NI	26%	23%	13%	37%	7%	Fluctuated

Table 6.2: BMI – Obese statistics on Year 8 Children, 2011-2016

				Proportion of Pupils (%)		
Year 8 BMI – Obese	2011/12	2012/13	2013/14	2014/15	2015/16	RAG Status
Northern Ireland	7.1%	7.3%	7.6%	7.1%	6.6%	No Change
Deprivation Quintiles						
1 (Most Deprived)	8.5%	9.5%	8.9%	8.9%	8.8%	No Change
5 (Least Deprived)	5.8%	5.3%	5.4%	4.8%	4.5%	Improved
Inequality Gaps						
Most-Least Deprived	47%	79%	64%	85%	98%	Widened
Most Deprived-NI	21%	30%	17%	26%	35%	Widened

[30] RAG status refers to Red (not on track), Amber (delayed) and Green (on track)

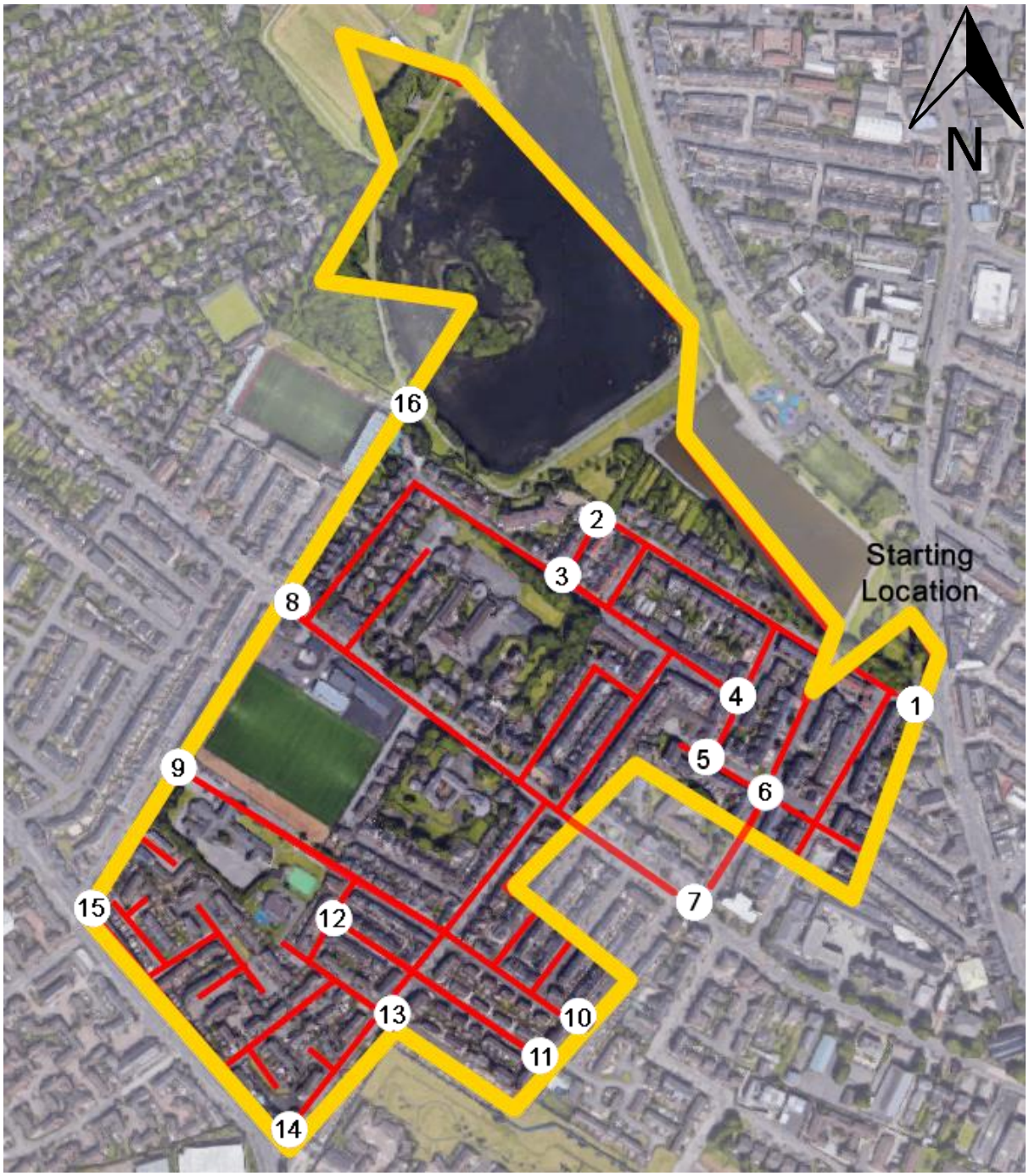
6.3 Water Works 2

Water Works is located on the Antrim Road, North Belfast. The Water Works was established circa 1840 and originally supplied water to the surrounding factories until it could no longer feed demand. Hereafter, the future of the area was suggested to focus on water-based activities and in 1889 the area was used for leisure (belfastcity.gov). The road modernisation in 1970s, the Westlink, was part of a restructuring plan of the Belfast region, however the meander of the motorway cut through the North-West of the city. The Westlink has been subsequently associated to the relation between socio-economic disconnect to physical disconnect (Sterrett *et al,* 2012). The infrastructural shift resulted in an environment dominated by the car which could now permeate through the city, also resulting in major land uses taken over by car parking.

6.3.1 The Walking Route

The walking route of Water Works 2 SOA took place on the 18th August 2018 and is illustrated below. The yellow outline illustrates the boundary of the SOA and the internal red lines illustrate the main walkable routes within the location. The numbers indicate the sequence in which the SOA was assessed, beginning at 'Point 1' and traversing through the area by planning an efficient route prior to the assessment. These points were considered the most logical way of traversing the area, seeing the majority of the site without having to backtrack. This was also an effective way to objectively measure the walkability and permeability of the area. These 'points' will be referred to throughout the following sections to supplement the commentary. Although the assessment was conducted within the boundary of the SOA, the surrounding context has not been forgotten and will be referred to when necessary. The subsequent sections will address each part of the assessment individually, active transport, aesthetics and connectivity, and this format will be employed for each SOA.

Figure 6.1: Water Works 2 SOA with Walking Route Annotations



6.3.2 Active Travel: Facilitating walking, cycling and public transport in Water Works 2

The Water Works 2 SOA had a road infrastructure network supported with footpaths at each roadside throughout. However, there was no provision for cyclists regarding road or paving markings and there was no separate infrastructure specifically for cyclists. The housing style

results in most parking being located on-street and due to many of the roads within the area being narrow, most cars were parked on the foot path (Figure 6.2).

Figure 6.2: Vehicles parked on kerbs and limited greenery (Point 3 to 4).

Whilst this provides an effective buffer between pedestrians and moving vehicles, the nature in which the cars are parked adds to difficulty in pedestrian freedom, particularly if a pedestrian used a wheelchair or had a pram. Therefore, although a parking buffer may increase pedestrian safety there must be enough room for pedestrians to use it efficiently or it can otherwise hinder the inclusivity of the environment. Traffic calming measures were in place throughout the SOA, predominately through speed bumps (Figure 6.3).

Figure 6.3: Water Works 2 SOA with boarded up terrace housing, also showing on street parking and traffic calming measures (Point 1 to 2)

Other measures for traffic calming were apparent by design, with many corners being designed at right-angles which slows traffic down considerably and benefits the pedestrian environment. No public transport was provided directly within the SOA although the road going South-East from ‘point 1’ (the Antrim Road), the road situated along ‘point 7 and 8’ (the Cliftonville Road), and ‘point 14 and 15’ (the Oldpark Road), were major roads connected to the area and had bus stops present. There is also a train station within relative proximity, fifteen-minute walk East, relevant in considering the surrounding context. Based on these observations the active living checklist was scored accordingly (Table 6.2).

Table 6.3: Active Living Checklist: Active Travel in Work Works 2

Active Travel Components	Green	Amber	Red
Foot path present, on both sides	✓		
Traffic calming measures in place		✓	
Bicycle lane			✓
Bicycle lane on kerb			✓
Bicycle lane on road			✓
Separate bicycle infrastructure			✓
Bicycle Parking			✓
No obstructions			✓
Buffer between pedestrians and vehicles	✓		
Public transport provision		✓	
Train		✓	
Bus		✓	

6.3.3 Aesthetic Built Environment features which encourage active living in Water Works 2

The Water Works 2 SOA is almost exclusively residential, although there are amenities on the major roads. There is a park located towards the North, and a school near 'point 8'. Firstly, the style of the housing was largely terrace style town houses built in rows. On approaching 'point 13' the housing layout noticeably changed as cul-de-sacs were now more prominent. The quality of the overall infrastructure was acceptable; however, the accessible routes and public realm were not attractive and demonstrated signs of neglect. There was no public art or seating. Streets lights were abundant throughout the area and is presumably well lit when it is dark. Besides from the park located North, there was very little green infrastructure which emphasised the perception of an urban dense environment.

The quality of the housing was mixed, ranging from abandoned, boarded-up houses (Figure 6.2) to newly renovated, modern apartment buildings. Other housing types were present, including detached, semi-detached and bungalows. The back of several terrace rows were designed to face out to an area used for parking vehicles and these resulted in the more unhospitable areas of the SOA, which were often fenced with spiked metal railings (Figure 6.4 and 6.5).

Figure 6.4: Water Works 2 showing unhospitable environment for pedestrians (Point 13 to 14)

Figure 6.5: Water Works 2 showing unhospitable environment for pedestrians (Point 13 to 14)

Table 6.4: Active Living Checklist: Aesthetics in Work Works 2

Aesthetic Components	**Green**	**Amber**	**Red**
Suitable quality of physical active travel infrastructure		✓	
Stimulating / attractive routes in the public realm			✓
Public art			✓
Seating			✓
Street Design	✓		
Lighting	✓		
Green infrastructure		✓	
Active Frontage			✓
Quality of superficial environment			✓
No blind spots or lack of surveillance			✓

6.3.4 Connectivity: Convenience of internal and external movement in Water Works 2

The terrace style housing provides a grid-like built environment which results in high walkability, with multiple ways to traverse throughout the area. However, as certain parts of the SOA are mixed tenure and different design approaches have been implemented the same permeability does not apply throughout, notably at 'points 13-15'. Although, even this area provided pedestrian paths which linked to the main road from the cul-de-sacs, which provided and facilitated increased walkability even in cul-de-sac areas. Generally, the area was convenient to traverse through and there was adequate provision for pedestrians however access to the park was only viable through a metal gate as the periphery of the park was fenced (Figure 6.6).

Figure 6.6: Water Works 2 SOA green space with a metal barred fencing (Point 1 to 2)

It is evident from the walking route that permeating through the SOA was straight forward, with the terrace style housing providing a permeable terrain. 'Points 6,7 and 8' also demonstrate that the SOA is not a physical boundary and that there are also convenient external travel links. Although previously mentioned the corner gradients assisted in a traffic calming measure, not all where appeasing, some areas offering much wider roads and larger corner gradients (Figure 6.7).

Figure 6.7: Water Works 2 showing large amounts of land designated to roads and footpaths (Point 1)

With a medium density residential built environment, with characteristics associated with active living, and mixed use and tenure within and surrounding the SOA, it is appropriate that SOA scored highly in terms of connectivity (Table 6.5).

Table 6.5: Active Living Checklist: Connectivity in Work Works 2

Connectivity Components	**Green**	**Amber**	**Red**
Safe and convenient internal travel links	✓		
Adequate pedestrian crossings / shared service		✓	
Density		✓	
Permeable street patterns		✓	
Difficulty to walk or cycle		✓	
Local amenities within walking distance to residential areas	✓		
Safe and convenient external active travel links	✓		
Open space present and accessible	✓		

6.3.5 Summary

In general, there were characteristics within this SOA which could be associated with a lack of physical inactivity, with busy roads, almost predominately residential and not being active travel friendly. However, there were other elements which could be associated with the promotion of physical activity, such as, local parks nearby, schools and other amenities within close proximity as well as being permeable and relatively well connected, due to the terrace style housing. The Water Works 2 SOA scored averagely in terms of active living consideration, however the aesthetics of the SOA resulted in a high 'Red' score.

Table 6.6: Summary of Active Living Checklist Scores for Water Works 2

	Green	**Amber**	**Red**
Score	8	10	12

6.4 New Lodge 2

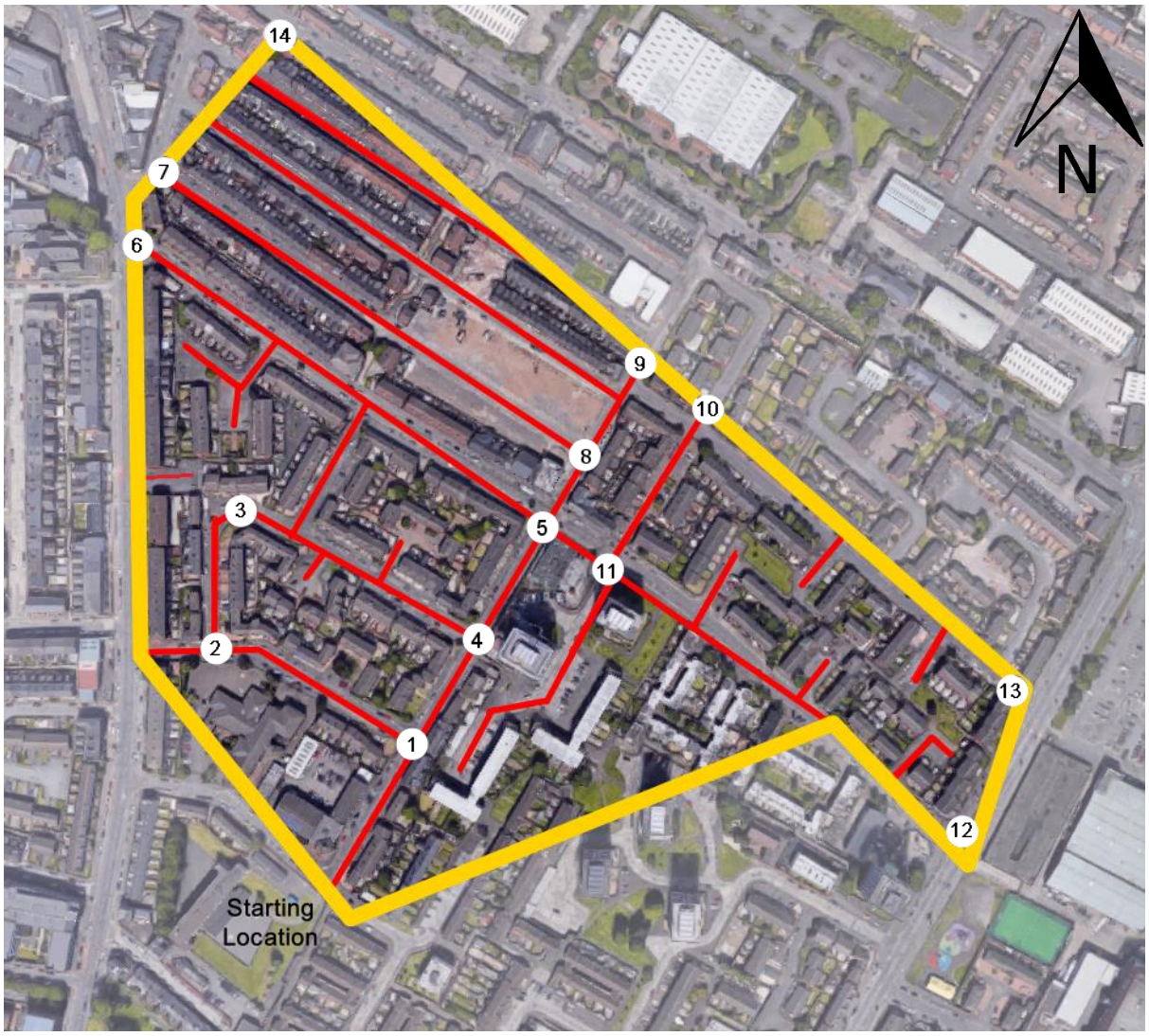
The New Lodge 2 SOA is located approximately 200 metres South of the Water Works 2 SOA and the design characteristics are relatively similar. The New Lodge area is well known throughout Northern Ireland due to its association to 'The Troubles', a long period of sectarian conflict with a lot of military presence and high political, social and cultural tensions. This is evident within the built environment itself, in terms of walls erected across streets and politically themed murals. During the 1980s housing was improved, however the area suffered from depopulation, many moving to suburbs. Neglect and small signs of urban decay[31] were visible during the observation with many houses in poor condition, boarded up and covered in graffiti, juxtaposed to a new housing development at 'point 8' where the land is illustrated as bare on Figure 6.8.

6.4.1 The Walking Route

The walking route of New Lodge 2 SOA took place on the 18th August 2018 and is illustrated below. The yellow outline illustrates the boundary of the SOA and the internal red lines illustrate the main walkable routes within the location.

[31] Urban decay is defined as the sociological process where areas of a city, which were once functioning, fall into disrepair (Thompson and Hickey, 2008).

Figure 6.8: New Lodge 2 SOA with Walking Route Annotations



6.4.2 Active Travel: Facilitating walking, cycling and public transport in New Lodge 2

Many of the built environment characteristics of New Lodge had a strong resemblance with Water Works 2 due to their close proximity. They share a major road, the Antrim Road, which is located at 'point 6', going North to South. Here, public transport is available, with bus stops and individual bus lanes. There was no cycling infrastructure provided throughout, however, on the Antrim Road there were bicycle racks so that bicycles could be secured, and the pavement was wide and accessible for pedestrian activity (Figure 6.9).

Figure 6.9: New Lodge 2 Main Road with wide pavement, bicycle parking and local amenities (Point 6)

Similar to Water Works 2, a vehicular buffer, in the form of on-street parking, was present between moving traffic and pedestrians, and this area seemed to have more room for pedestrians to freely traverse through (Figure 6.10).

Figure 6.10: New Lodge 2 traditional terrace street, with access to parallel street on the left (Point 7 to 8)

The lack of cycling infrastructure impacted on the overall score in active travel in New Lodge 2 but in general the area appeared to provide enough benefits to active travel to produce an average score.

Table 6.7: Active Living Checklist: Active Travel in New Lodge 2

Active Travel Components	**Green**	**Amber**	**Red**
Footpath present, on both sides	✓		
Traffic calming measures in place		✓	
Bicycle lane			✓
Bicycle lane on kerb			✓
Bicycle lane on road			✓
Separate bicycle infrastructure			✓
Bicycle Parking		✓	
No obstructions		✓	
Buffer between pedestrians and vehicles	✓		
Public transport provision		✓	
Train		✓	
Bus		✓	

6.4.3 Aesthetic Built Environment features which encourage active living in New Lodge 2

The SOA is dominated by residential development of mixed tenure housing but consists mostly of terrace housing. A new housing development was being developed and this was evidently constructed in a different style and design than the older dwellings, with curvier roads and a narrow space between the semi-detached properties. The quality of the overall active living infrastructure was adequate; however many buildings and fences were ill-maintained. There was little to no greenery throughout, urban decay, graffiti, vacant properties and hard barriers, remnants of the troubles, although these could be passed through via a gate (Figure 6.11).

Figure 6.11: New Lodge 2 with a wall built across a road, accessible through a metal door (Point 14).

Figure 6.10 demonstrates that some areas were of a pleasant residential environment, although there were some similar design characteristics to Water Works 2, with the back of houses facing out to parking facilities which were uninviting to traverse (Figure 6.12).

Figure 6.12: New Lodge 2 SOA with parking and an inhospitable urban form (Point 6 to 5).

New Lodge 2 scored low with regards to aesthetics due to the built environment showing signs of neglect amongst other factors (Table 6.8).

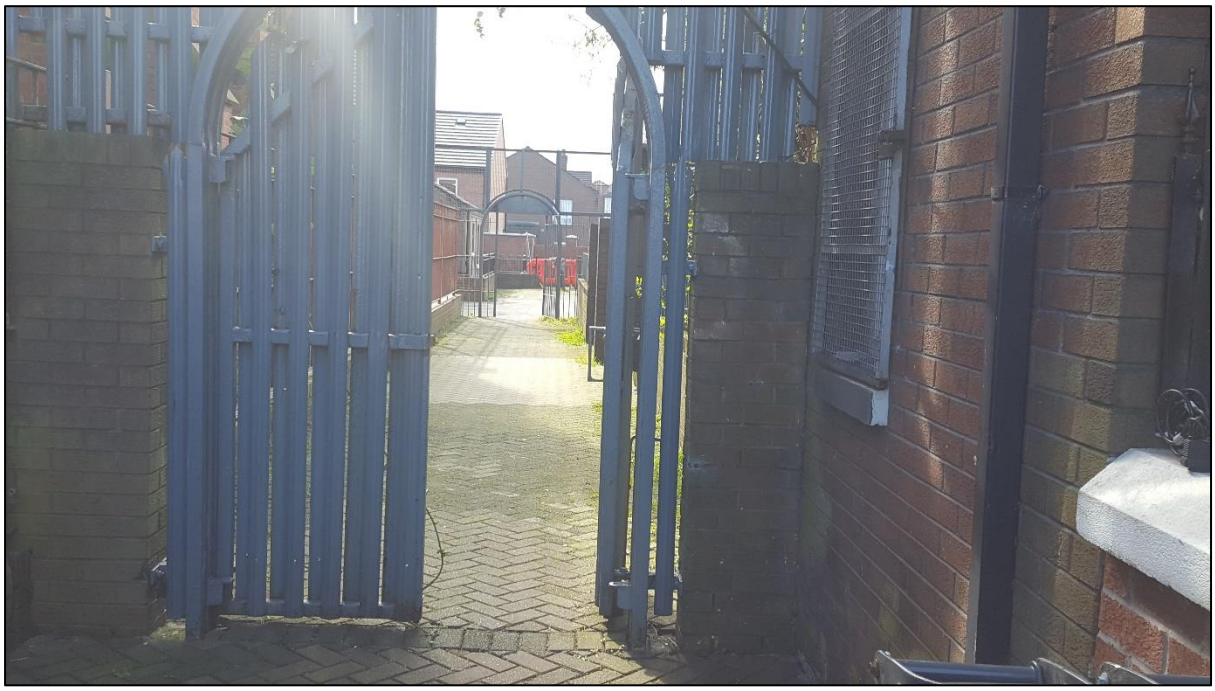
Table 6.8: Active Living Checklist: Aesthetics in New Lodge 2

Aesthetic Components	**Green**	**Amber**	**Red**
Suitable quality of physical active travel infrastructure		✓	
Stimulating / attractive routes in the public realm			✓
Public art			✓
Seating			✓
Lighting	✓		
Street Design	✓		
Green infrastructure			✓
Active Frontage			✓
Quality of superficial environment			✓
No blind spots or lack of surveillance			✓

6.4.4 Connectivity: Convenience of internal and external movement in New Lodge 2

The terrace housing provided a well-connected, permeable street layout which was emphasised by pathways which cut across terrace rows. These pathways were convenient, but did not feel entirely safe as they were closed in and did not have maximum pedestrian surveillance (Figure 6.13).

Figure 6.13: connected pathways through terrace rows adding to permeability but not particularly inviting (Point 14 to 9)



The SOA was within close proximity to many amenities as it was located along a major road and therefore had access to many different services. No significant traffic calming measures were in place, although the on-street parking seemed to provide adequate traffic calming. Consequently, New Lodge 2 scored well in terms of connectivity due to the high levels of accessibility and permeability throughout (Table 6.9).

Table 6.9: Active Living Checklist: Connectivity in Stormont 2

Connectivity Components	Green	Amber	Red
Safe and convenient internal travel links		✓	
Adequate pedestrian crossings / shared service	✓		
Density		✓	
Permeable street patterns	✓		
Difficulty to walk or cycle	✓		
Local amenities within walking distance to residential areas	✓		
Safe and convenient external active travel links		✓	
Open space present and accessible			✓

6.4.5 Summary

The overall active living checklist score of Stormont 2 unsurprisingly resembles the scoring of Water Works 2 as they are both located in the same area and have similar design characteristics (Table 6.10).

Table 6.10: Summary of Active Living Checklist Scores for Stormont 2

	Green	Amber	Red
Score	8	10	12

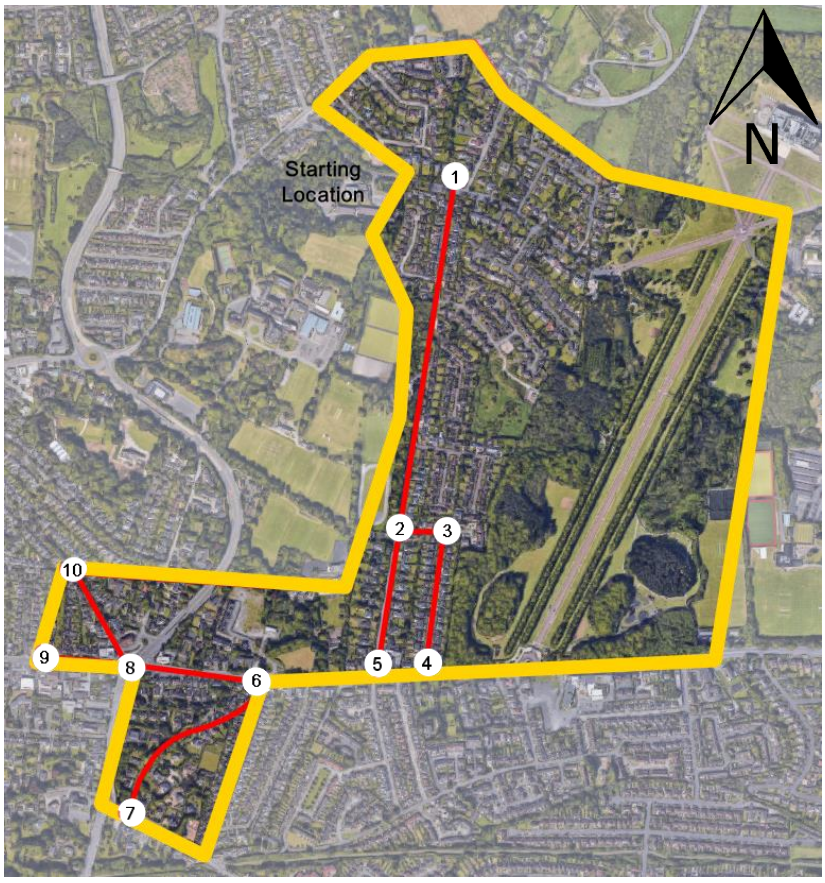
6.5 Stormont 2

The Stormont 2 SOA is located on both sides of the Upper Newtownards Road, East Belfast, and directly beside the Stormont Estate, where main government buildings are located. The Upper Newtownards Road is the arterial route leading into Belfast from the East, and it contains the majority of amenities for the SOA, and is located on the picture below, from point 8-4 along the SOA boundary and beyond.

6.5.1 The Walking Route

The walking route of New Lodge 2 SOA took place on the 18th August 2018 and is illustrated below. The yellow outline illustrates the boundary of the SOA and the internal red lines illustrate the main walkable routes within the location.

Figure 6.14: Stormont 2 SOA with Walking Route Annotations



6.5.2 Active Travel: Facilitating walking, cycling and public transport in Stormont 2

Stormont 2 SOA was evidently a different style to the former two SOAs although all SOAs are predominantly residential heavy. Footpaths are present at both sides of the road throughout and there is no provision for cycling throughout the entire area. There were no obstacles present which would impair active travel, however, the other SOAs had a vehicle buffer in the form of on-street parking, and this was not present within this area. Housing had private driveways and parking, therefore, more road space and more space for pedestrian movement is at the expense of a traffic calming measure. There were several trees planted on the footpaths throughout the area and this is considered a traffic calming measure, however they are not as effective as on-street parking since they are spaced far apart (Figure 6.15).

Figure 6.15: Stormont 2 wide roads, large semi-detached housing with private parking (Point 3 to 4)

There was public transport provision along the Upper Newtownards Road for buses, and the bus shelters were state-of-the-art, having ticket kiosks in which tickets could be purchased and renewed, the only SOA within the observations to have this feature and a clear incentive for using public transport. The Belfast Rapid Transit was observed to be in effect during the

field observation (discussed further in section 6.8.4). There were no train stations nearby. An emerging themes recurs in that the lack of cycling infrastructure impacts on the score heavily in terms of overall active travel (Table 6.11).

Table 6.11: Active Living Checklist: Active Travel in Stormont 2

Active Travel Components	**Green**	**Amber**	**Red**
Footpath present, on both sides	✓		
Traffic calming measures in place		✓	
Bicycle lane			✓
Bicycle lane on kerb			✓
Bicycle lane on road			✓
Separate bicycle infrastructure			✓
Bicycle Parking			✓
No obstructions	✓		
Buffer between pedestrians and vehicles		✓	
Public transport provision		✓	
Train			✓
Bus	✓		

6.5.3 Aesthetic Built Environment features which encourage active living in Stormont 2

The built environment was of good quality and well maintained, adding to a stimulating and attractive environment (Figure 6.16). Although there was no seating or public art present there was a significant amount of green infrastructure with tree lined avenues, houses having large gardens and Stormont Park nearby. The area is an affluent part of East Belfast evident by the housing type, predominately detached houses and semi-detached dwellings, with front and rear gardens and private parking. The housing style resembled that of a suburban built environment and even had characteristics pertaining to suburban sprawl, due to low density and single use which lacked permeability and with little access to other services without the

use of a car. However, the green infrastructure resulted in this SOA scoring highly on aesthetics (Table 6.12).

Figure 6.16: Stormont 2 well maintained built environment (Point 3 to 4)

Table 6.12: Active Living Checklist: Aesthetics in Stormont 2

Aesthetic Components	**Green**	**Amber**	**Red**
Suitable quality of physical active travel infrastructure	✓		
Stimulating / attractive routes in the public realm	✓		
Public art			✓
Seating			✓
Lighting	✓		
Street Design			✓
Green infrastructure	✓		
Active Frontage			✓
Quality of superficial environment	✓		
No blind spots or lack of surveillance	✓		

6.5.4 Connectivity: Convenience of internal and external movement in Stormont 2

There was difficulty with arranging an observational route due to poor levels of permeability and connectivity throughout the SOA, having cul-de-sacs, gated apartments, and dead-end streets (Figure 6.17 and 6.18). However, the surrounding area is located beside Stormont estate, which offers a lot of opportunity for physical recreation with sports and leisure facilities nearby, tennis clubs, football pitches, golf club, hockey club, as well as walkways through the park which relates to recreational activity as opposed to utilitarian, where physical activity is incidental. There were not a lot of local amenities available. Furthermore, like the Water Works 2 SOA, there seemed to be a lot of space offered to roads and not a lot of space for pedestrians. Generally, the SOA did not score favourably in terms of connectivity due to the poor levels of permeability (Table 6.13).

Figure 6.17: Stormont 2 cul-de-sacs dominating certain areas resulting in poor permeability (Point 1 to 2)

Figure 6.18: A ‘no-through-road’ sign illustrating another residential street lacking permeability (Point 1 to 2)

Table 6.13: Active Living Checklist: Connectivity in New Lodge 2

Connectivity Components	Green	Amber	Red
Safe and convenient internal travel links			✓
Adequate pedestrian crossings / shared service	✓		
Density			✓
Permeable street patterns			✓
Difficulty to walk or cycle			✓
Local amenities within walking distance to residential areas		✓	
Safe and convenient external active travel links		✓	
Open space present and accessible	✓		

6.5.5 Summary

The SOA is evidently more affluent than the first two SOAs. Aesthetically it scores highly, yet with regards to active travel the Stormont 2 scored lower. Although the aesthetics may be

pleasing, it appears to be at the expense of connectivity which is poor throughout resulting in a mixed scorecard, similar to the first two but regarding a separate component (Table 6.14).

Table 6.14: Summary of Active Living Checklist Scores for Stormont 2

	Green	**Amber**	**Red**
Score	11	5	14

6.6 Stranmillis 1

Stranmillis is located in South Belfast and has a similar built environment to that of Stormont 2. There are universities, museums, theatres, golf courses and botanical gardens which surround the SOA.

6.6.1 The Walking Route

The walking route of Stranmillis 1 SOA took place on the 18th August 2018 and is illustrated below. The yellow outline illustrates the boundary of the SOA and the internal red lines illustrate the main walkable routes within the location.

Figure 6.19: Stranmilis 1 SOA with Walking Route Annotations

6.6.2 Active Travel: Facilitating walking, cycling and public transport in Stranmillis 1

Stranmillis 1 had footpaths present, both sides, throughout the SOA although there were no visible traffic calming measures and private parking facilities removed a vehicle buffer between roads and pedestrians as vehicles are no longer parked on the street. No bicycle provisions were within the SOA and the road infrastructure seemed vast for a residential development. This resulted in certain parts of the SOA with appeared sparse (Figure 6.20)

Figure 6.20: Stranmillis 1 Noticeably less parking on the street and again, a lot of space afforded to vehicles (Point 3)

There was no public transport provision within the SOA but there were bus stops within the surrounding context. There was no train station nearby. The lack of cycling provision has again impacted on the active travel scorecard (Table 6.15)

Table 6.15: Active Living Checklist: Active Travel in Stranmillis 1

Active Travel Components	Green	Amber	Red
Footpath present, on both sides		✓	
Traffic calming measures in place			✓
Bicycle lane			✓
Bicycle lane on kerb			✓
Bicycle lane on road			✓
Separate bicycle infrastructure			✓
Bicycle Parking			✓
No obstructions	✓		
Buffer between pedestrians and vehicles			✓
Public transport provision		✓	
Train			✓
Bus		✓	

6.6.3 Aesthetic Built Environment features which encourage active living in Stranmillis 1

The last part of the observation was walking through Lagan Meadows, which ran along the Southern end of the SOA. Here, the park contained a pedestrian foot way which lead through a forest area, with options to go off track (Figure 6.19 and 6.20). Seating was provided along the footway and the area was being well utilised by walkers, dog walkers and runners. It was noted that the path did not seem to link certain areas together for any functional reason[32], and the path seemed to be used more for recreational purposes as opposed to utilitarian. The area contained high quality, residential housing consisting of detached and semi-detached houses with front and rear gardens along with private parking facilities. Similar to Stromont 2,

[32] Whilst it may be a shorter route, slightly, to traverse to the YMCA, the meaning here is that it does not provide a functional aspect as the pathway led to more houses.

the built environment shared certain characteristics associated with urban sprawl in terms of low density, single use, cul-de-sacs, curvilinear streets with low permeability.

Figure 6.21 and Figure 6.22: Park connected to the South of Stranmillis 1 (Point 3 to 8)

Due to the park being intrinsic with the SOA, Stranmillis 1 scored well with regards to aesthetics. The built environment was pleasant and well maintained (Table 6.16).

Table 6.16: Active Living Checklist: Aesthetics in Stranmillis 1

Aesthetic Components	**Green**	**Amber**	**Red**
Suitable quality of physical active travel infrastructure	✓		
Stimulating / attractive routes in the public realm	✓		
Public art			✓
Seating	✓		
Lighting	✓		
Street Design			✓
Green infrastructure	✓		
Active Frontage			✓
Quality of superficial environment	✓		
No blind spots or lack of surveillance		✓	

6.6.4 Connectivity: Convenience of internal and external movement in Stranmillis 1

There are many facilities, particularly physical activity-oriented facilities, nearby the SOA, such as a sports complex, cricket club, activity centre, indoor bowls, rugby club, YMCA, boats club, playing fields in close proximity. The major roads near the SOA did have bus stops although, in general there did not seem to be much provided in terms of public transport within the boundary. There was little provision in terms of local amenities, all of which would either require a long walk or more understandably accessed by car. The negative aspects to this SOA was that the entire area had cul-de-sacs and dead-end streets throughout which caused difficulty mapping out an efficient observation pattern without overlapping (Figure 6.23).

Figure 6.23: showing the cul-de-sacs, resulting in a lack of permeability throughout the SOA (Point 1 to 2)

One portion of the SOA had an entire housing development within the residential area, with only one entrance which would seriously inhibit the level of active living within the SOA (Figure 6.24).

Figure 6.24: Stranmillis 1 An estate within an estate (Point 2 to 3)

Stranmillis 1 scored lower with regards to connectivity due to the lack of permeability through the entire SOA. Although there was a park nearby, this did not seem to serve any functional purpose, therefore as active living is associated to passive exercise, as opposed to recreational, it did not have significant bearing on the result.

Table 6.17: Active Living Checklist: Connectivity in Stranmillis 1

Connectivity components	**Green**	**Amber**	**Red**
Safe and convenient internal travel links			✓
Adequate pedestrian crossings / shared service			✓
Density			✓
Permeable street patterns			✓
Difficulty to walk or cycle			✓
Local amenities within walking distance to residential areas			✓
Safe and convenient external active travel links		✓	
Open space present and accessible	✓		

6.6.5 Summary

Overall the SOA scored highly in aesthetics but scored lower with regards to active travel and connectivity.

Table 6.18: Summary of Active Living Checklist Scores for Stranmillis 1

	Green	**Amber**	**Red**
Score	8	5	17

6.7 Cross-case Comparisons

This section will discuss the four cases which have been presented, by considering the score sheets, and the observations made regarding each built environment, how they measure up to active living characteristics (Table 2.1) and what this could mean. The SOAs observed have similar built environments which consist of predominantly residential land use, located close to a main road leading into Belfast and within almost identical distance from the city centre. The first two SOAs had more to offer, particularly regarding the surrounding context as they were both located near main roads where services were located. Although Stormont 2 has a main road running through it, it offered little in terms of amenities. The least deprived SOAs are larger than the most deprived, however, by the nature of SOAs, they would all have a similar population.

Water Works 2 and New Lodge 2 are denser residentially than the other two SOAs, due to the housing types being dominated by terrace housing. However, this results in a grid-style built environment, making the most deprived SOAs more permeable and better connected to surrounding areas. Although not the most inviting environments, they were effective to walk through. This is evident by comparing the number of roads leading in and out of the SOAs, with the first two SOAs having more routes in and out, in an area that is much smaller. The affluence of large, detached and semi-detached dwellings, results in a built environment less residentially dense, spread out, and being less permeable and poorly connected, demonstrated clearly by the observational walking routes. Creating Places, the guidance document critiqued in the previous chapter, specifically outlined that development in inner urban locations should be high-density rather than then pertaining to the style of a suburban setting (section 3.13 of “Creating Places”). This was the clear distinguishing factor in terms of design and density, the first two being of medium density, and the latter two resembled more of a low density suburban setting. However, the quality of the built environments in the first two observations were recognisably poorer, largely due to neglect, the abandonment of

properties and graffiti. In addition, the design and density of each SOA also had a clear impact on connectivity with the first two being more favourable in terms of active living as it was easier to traverse and permeate through the area, compared to the latter two cases. The overall scores can now be considered, and a breakdown of the checklists scoring is presented below (Table 6.19).

Table 6.19: Summary of all Checklists

	Water Works 2	New Lodge 2	Stormont 2	Stranmillis 1
Active Transport	2	2	3	1
	4	6	3	3
	6	4	6	8
Aesthetics	2	2	6	6
	2	1	0	1
	6	7	4	3
Connectivity	4	4	2	1
	4	3	2	1
	0	1	4	6
Totals	**8**	**8**	**11**	**8**
	10	**10**	**5**	**5**
	12	**12**	**14**	**17**

First, looking at the Active Transport element to the checklist is it clear that all SOAs scored poorly, largely due to all four having no cycling infrastructure. With regards to Aesthetics, the first two SOAs scored poorly while the last two SOAs scored well, due to the built environments being of good quality, no neglect and green infrastructure throughout. Lastly, all four SOAs regarding Connectivity had average scores, amber ratings, with New Lodge 2 scoring highest and Stranmillis 1 with the lowest score. Therefore, with regards to Active Living three out of

four SOAs, had a higher red rating than green or amber, whilst Stormont 2 had the highest green rating. However, the aesthetics of the built environments were certainly the determining factors of the ratings, albeit an important one, overshadowing the better ratings the more deprived areas obtained in the areas of Connectivity and Active Transport.

The observations and scores associated present the complexities of representing active living concepts within the built environment. Areas of opposite deprivation were chosen deliberately as this has been linked to the quality of built environments as well as social health. However, when assessed exclusively on active living, it is not clear that one is better than the other. Some conclusions can be drawn, such as the similarity between the types of built environments. The first two being predominantly terrace housing, no private parking, with little greenery, the last two predominantly detached dwellings with private parking and abundantly green. By these observations, these can be linked to levels of deprivation. In relation to active living, terrace housing was notably effective in terms of permeability and connectivity compared to the detached dwellings represented in the more affluent areas, which had very little permeability and connectivity. Therefore, it could be ascertained, hypothetically, that a mix of good quality terrace housing along with green infrastructure, effective active transport with regards to cycling and public transport and other amenities, would score highly in the Active Living checklist.

This demonstrates that the checklist brought up findings which can be corroborated, objectively with other areas which are (or are not) associated with active living concepts. It has shown why the latter two scored highly in aesthetics but poorly in active travel, as it resembles the style of sprawling environments which are commonly related to car dominance, and the first two scoring higher, but being let down due to the neglect and urban decay related to socio-economic disadvantages. These observations were responding to the associations of built environments and deprivation. The next section will consider built environments which are health orientated, brought up by professionals throughout the interview process. This

presents the second portion to this chapter and uncovers the professionals insight into built environments.

6.8 Active Living Orientated Products

This section presents existing built environments in Northern Ireland and recent initiatives which were expressed by the interview participants. This provides insight into first-hand experiences in the delivery of certain initiatives which relate to active living and also the obstacles which persisted within the delivery. Real-world experiences offer another dimension to professional attitudes as the discussion can be directed to actual experiences of professional work. Examples of good and bad practice, which professionals referred to throughout, will first be addressed to set up the four NI initiatives; Better Bedford Street, Belfast Rapid Transit, Connswater Community Greenway and, Belfast Transportation Hub.

6.8.1 Difficulties in Delivering Active Living in Northern Ireland

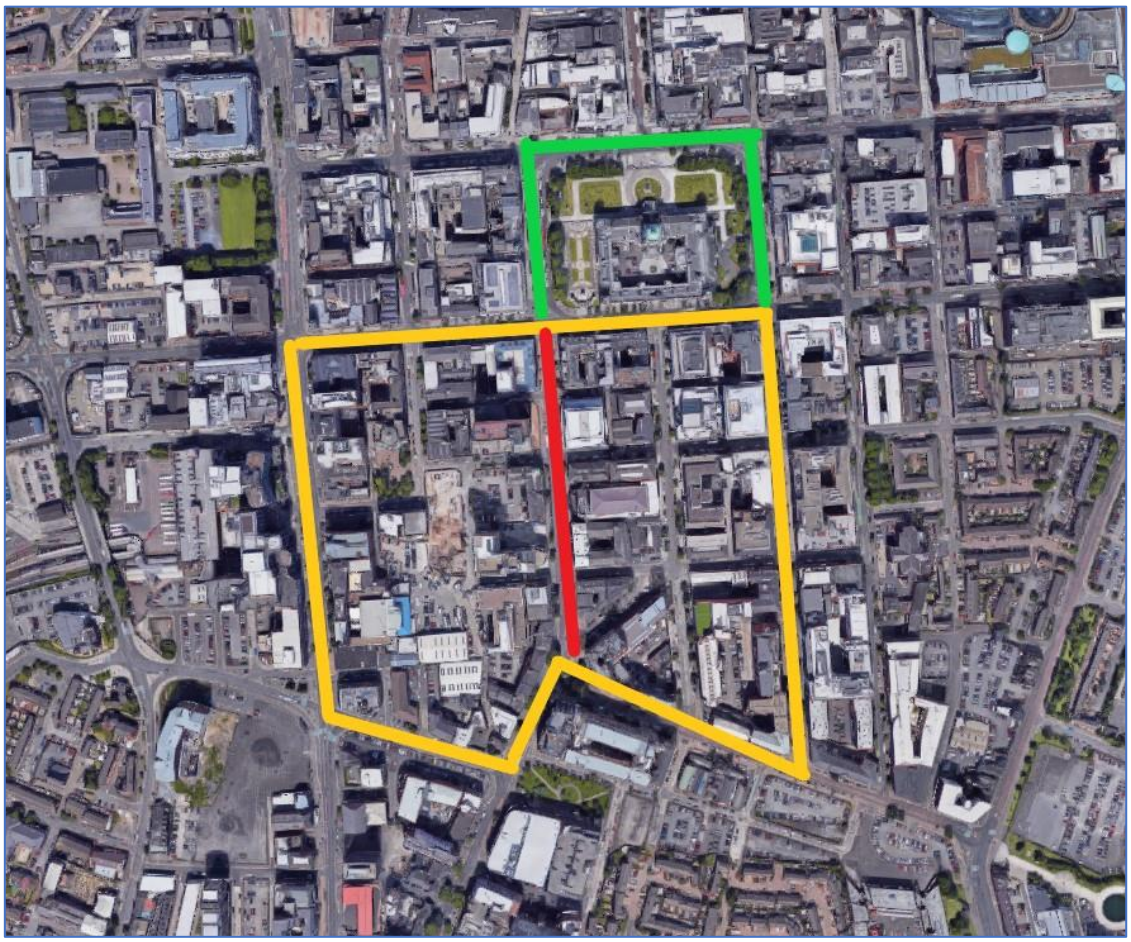
Northern Ireland has been designing housing layouts planned around the geometry of the private car, where the road layout is prioritised with housing being designed around road infrastructure, rather "*fortuitously*" (N3). P8 suspects that aspects of health and the built environment such as active travel, walking routes and connectivity are more than often looked at entirely separately, and not as part of the holistic development, which results in many aspects of active living being marginalised, and then eventually disregarded altogether, as they are never imposed.

Difficulty engaging with developers on the health agenda was expounded on by A4 regarding the Waterfront Hall area, where proposals included active frontages, permeability and public space. However, after certain investors were brought in, BT and Hilton, the developers demanded they were going to build walls surrounding the site and that there was to be no permeability, paraphrased by A4 as "*the developer doing what they want if the city wants their*

money". This insinuates that developers may propose certain things that they know will look good on paper, then changing the design once a project has been granted.

Another example concerned the Linen Quarter (Figure 6.25) located directly south of City Hall comprising bars, hotels, cafes, restaurants and offices. The proposal again looked good graphically, but in implementation the product was monofunctional and did not include any health orientated elements which were initially proposed, reasoned by it not "*stacking up financially*" (A4). A4 continued, saying, that this was a missed opportunity, as housing, tall apartments, and somewhere where people truly wanted to live, could have been developed.

Figure 6.25: Linen Quarter, Belfast City Centre (Linen Quarter in yellow, Bedford Street in red and City Hall in green). Source: GoogleMaps



These examples demonstrate projects which could have been health orientated and were proposed with design characteristics which accommodated for active living. However, it seems that after proposals are produced many aspects of the development can still change and disregard a lot of the initial features which could have impacted on health. If this is the case, it is clear how developers may be disingenuous with their proposals only to change them for financial gain, which could be a significant issue which would need addressing. However, not all projects have this fate, and many projects have in some way integrated health into projects within Northern Ireland, largely in relation to active travel. Plans of sites such as Sirocco, Belfast, were suggested to show promising signs of a more "*Nordic approach*" which focus on pedestrianised space (N2). The "Nordic Approach" has evidently had an influence on many participants and in particular, Copenhagen, through innovative approaches the city has on sustainability, liveability and mobility.

6.8.2 The Professional Field Trip to Copenhagen

Members of the Strategic Design Group[33], many of whom were interviewed, travelled to Copenhagen, Denmark, on a field trip which seemed to have a valuable impact on certain perspectives. This visit was continuously brought up as an outstanding example of active living delivery. E1 discussed that approximately two thirds of Copenhagen's population cycle and those who do not, do so in relation to a lack of physical infrastructure provision as opposed to social or health reasons. This was pointed out to be an important recognition that in order to increase levels of active living there needs to be appropriate provision for it to manifest. A3 elaborates, that the question should be asked if you walk or cycle, and if not, what are the factors that cause that choice and more importantly what are the factors that can be changed. They exclaimed:

[33] A collective group of different professionals instrumental to the delivery of the Living Places design guide.

"what I found really interesting from [the field trip] was that it's not enough to make something a positive good choice, you have to make the alternatives quite negative."

They believed that you could have the best cycling infrastructure being protected, smooth, separated from other vehicles and safe, yet, if the journey by the car remains an easier option, people will most likely not use active travel. Conversely, if the journey by car is made unattractive, with regards to parking costs, volume of traffic, reducing the number of lanes so that traffic is more concentrated per lane so movement is slower; active travel would then seem a better alternative. Therefore, active living must be more convenient and efficient than other ways of life, otherwise it will not work. This is important, as this demonstrates that it is the whole sense of a design of a place in its totality which directs people in how they live, not only should active living infrastructure be provided but the car dependant alternative should be less appealing in design and interventions, in order to make a difference in levels of physical activity.

Another element brought up in relation to Copenhagen was apartment living. P1 stated how almost everyone lives in apartments, and that the professionals from Copenhagen were "*astounded*" by societal perspectives of apartments in Northern Ireland, with mindsets of "*I'm not living in an apartment!*". P1 considered this a real problem in Northern Ireland, the opposition to density, "*the opposition to anything tall*". This is exacerbated by the absence, at the time of the interview, of tall building policy and the number of tall building proposals being submitted and ultimately refused. P1 related several occurrences were tall building specialists travelled from England to persuade Belfast City Council on the benefits of taller buildings:

"He has been around the world looking at what tall buildings deliver. He was really telling the council the benefits of a tall building and nobody was getting it! We have gone into planning meetings and he has not been listened to [even though] he is bringing forward schemes throughout the UK" – P1

P1 continued that height, particularly near conservation areas or historic buildings, is "*scary*" for professionals in Northern Ireland. Furthermore, outdoor personal space with regards to apartments, typically through balconies, is incredibly limited in Belfast as it is not something that is required and is costly. If Belfast had such a policy were a certain amount of balcony space was required, it completely changes how a developer builds, with regards to their structure and commercial model (A3). A3 argues that it could result in a better outcome for people who live in the city. Only focusing on commercial viability does not address making the city more attractive to live in, and this should be a real driving force. Copenhagen inspired professionals in Northern Ireland to think differently about the built environment and one project where this manifested was called the Better Bedford Street project.

6.8.3 Better Bedford Street

Bedford Street is located in the inner city of Belfast, running through the centre of the Linen Quarter (red line in Figure 6.25). N4 described this street, along with those parallel, as examples of appalling design, dominated by cars and parking with those who use the street being an afterthought. Better Bedford Street was a pedestrianisation project which was inspired by Copenhagen and the pedestrianisation of Times Square, New York; as well as the Living Places document and was delivered in September 2018 (E1; P10). The focus was around the recognition that the majority of space within streets is given to road vehicles and the idea was to:

> *"reimagine it in a more proportionate way based on the way people are choosing to go through that space, and actually by realigning the infrastructure we can actually catalyse more people to be more active in a space, and that's the aspiration for Bedford street, is to reimagine the space"*
> *– E1*

Many of the interviews took place before the project was carried out, so the success of which was unable to be discussed, however the project intended to build parklets[34] on both sides of the streets, resulting in a reduction of parking spaces. This would provide an opportunity to remove the "*clutter*" which was located on footpaths and allowed the cafes and restaurants to utilise these parklets as their outdoor space (E1; P10). It also would free up the footway for more people to flow through the street. The intention was to make the street a better gateway for pedestrian movement, as well as creating a better destination in its own right. According to P10, the project has a strong collaborative effort and is said to be "*totally outside the box*" for engineers, due to the narrowing of streets, increasing pedestrian space and the overall focus on "*the active*". This was expressed only as an experiment, carried out to a high standard, and if it works it could potentially be permanent.

The process of collaboration to this project was said to be as important, in terms of learning, as the actual product itself (P2). They reflected how government, particularly in NI, has a lot of "*red tape*" which results in them unable to achieve things quickly (P2). The institutes were instrumental in getting everyone to work together, as well as having support from senior professional levels, such as Peter May, the Permanent Secretary at that time. Again, the professionals involved made a point to highlight that the project is entirely in line with the PfG, and forces professions to leave their silos and become more outcome focused. E1 and P10 both using the term "*clutter*" to describe the current street portrays some level of cross-communication in justifying the reason for the project.

However, the positivity and pride of the professionals was not shared by everyone involved with the project, particularly those working within the health and active travel NGOs. Speaking with N4, they explained that it may be a good start, but it is incredibly limited, temporary and

[34] Parklets are a sidewalk extension which provides extra space for pedestrians. They are usually built within a parking space and can have many functions, such as seating areas (Hartmann, 2018).

that the initial proposal was something much more radical than "*one week of parklets*" but they had chosen something much more cautious:

> *"We could have done a lot more. But when you have the council, Dfl, communities, all involved on the steering group, it goes back to the voices. Its symptomatic of an overly cautious system that says no, we'll scale it back."*
> – N4

The voices referenced here was perceived to be, by N4, the fear of negative responses from businesses who felt that it could negatively impact on their business. The overall perception from traders is that removing parking will be detrimental and N4 admits how in certain meetings where groups are brought along, the "*nonsense*" rhetoric that it will destroy their business is heavily prevalent. N3 admits that traders struggle with active living concepts as they make a connection between parking and a thriving city, the reality being that evidence shows this is not the case. Footfall often increases as more people are incentivised to walk, but the mindset of business owners is strong, and they seem to have an impact on decisions. N1 discussed how the pedestrianisation around city hall would be a great test but claimed that the council are afraid of it not working, exclaiming that if that occurred "*then what will we do!*". Although, testing out certain approaches was perceived to be incredibly important by N1, and in concurrence with N4, regarding the importance of at least attempting something slightly more radical. Better Bedford Street provides an optimistic example of Northern Ireland testing the concept of prioritising pedestrian movement through an inner city street, however similar to the examples of Waterfront Hall and the Linen Quarter, initial proposals where different to the end product, proposing more radical active living considerations but not delivering them.

6.8.4 Belfast Rapid Transit

The Belfast Rapid Transit (BRT) is a good example of PfG objectives being implemented and delivered, linking the East and the West of Belfast together. It is a ninety-million-pound project, over five years, and was quite a disruptive project, resulting in prolonged road works (P2).

Hence, it was essential that there was public engagement, ensuring everyone was aware of the longer-term benefits. Participant E2 was involved in putting in the shelters and told of the importance of the health benefits in having them every 400 metres which not only helped journey times but encourages active living. In their experience, this was the first project, working as a civil engineer, where they were getting a holistic view of how infrastructure should be integrated with other aims, linking it to the PfG, where active travel and the modal shift in public transport is important. E2 explained how the BRT changed how they are "*selling the line*" that roads cannot keep being built or widened, and how they must look at alternatives. This demonstrated a significant shift in practice directly related to the aims and objectives of the PfG and how it trickled down to the engineers and therefore, having a strong clear legislative push and direction from higher documents influenced and impacted on practice. E2 reinforces:

> *"in terms of our high-level strategies, the PfG, that active travel is hugely important. So it is a driver for us as public servants, and every business case is written on the basis of how are we delivering the strategies, so the business case has to provide the evidence of how it links to the overall strategies, and sustainable transport and active travel are fundamental to that." – E2*

E3 echoes this sentiment and tells of the behavioural shift with BRT, and how it is starting to broaden minds of civil engineers on the active living theme. This is also heightened as the BRT unit shares a floor with the cycling unit and they are also working in tandem with Sustrans[35]. This is hugely significant as it demonstrates that effective collaboration can make a real difference in professional cultural perspectives, as seen here, the sustainable transport specialists influencing the engineers they are working with, as well as producing outcomes from collaboration.

[35] Sustrans is a charity making it easier for people to walk and cycle, and with a wider interest in transport and 'liveability'

Certain problems arose regarding the vested interests which, in a small society like Northern Ireland, can have a loud voice similar to the experiences in Better Bedford Street (N4). In this case, the taxi lobby wanted privileges to use bus lanes which could have diluted the potential of the public transport system (E3). This, ironically, had political support, contradicting the PfG and was on the cusp of happening but was avoided due to the issues concerning Judicial Review of the Permanent Secretary. This could have resulted in a watered-down version of the BRT but got side lined, although E3 admitted that does not necessarily mean it will not be readdressed in the future. Getting the government on board is emerging as a common theme and one that can be challenging, although not all initiatives come from a top-down approach, and this is exemplified by the Connswater Community Greenway.

6.8.5 Connswater Community Greenway

The Connswater Greenway has garnered real success and influence in terms of active living, linking urban communities together, provision for walking, cycling, safe and well utilised (P2), being described as the "*heart of healthy places*" (A1) and quoted by WHO as an exemplar in healthy practice (P7). The project invigorated a resurgence in greenways and has been replicated elsewhere throughout Northern Ireland, although it was not the first of its kind, as similar projects first sprung up in Derry (H3). It was born out of the local community saying that they had a real set of needs with problems in terms of health partly due to a lack of safe accessible public spaces. Certain parts of the community did not feel safe walking to amenities such as the local health centre and leisure centres, exacerbated by territorial issues which requires a more sensitive approach. Public spaces and parks were deemed unsafe and intimidating places by the community and consequently were not used in everyday life - a clear example of recognising a problem, finding a solution and implementing it.

Initially, the project was met with significant scepticism from politicians, but now with its success greenways are being promoted across Northern Ireland. It is unique in that it was driven by the community and did not come from the state, but rather the East Belfast

Partnership who obtained Lottery funding for it (P4). This approach was expressed as the "*great thing*" about the Connswater Project, how it is effectively bottom up, community led and contributed to an engagement between neighbourhoods. Members of Belfast City Council highlighted how it inspired the Green and Blue infrastructure draft plan, covering many areas such as ecosystem services, pollution, health, urban heating and many more, also being referenced in the LDP.

However, there were insights uncovered providing a different perspective on the project. P4 candidly expressed that planners and those in regeneration never recognised potential there and rhetorically asks how in thirty-to-forty years had the developers or the state not promoted regeneration there, suggesting that they did not associate that promotion to a planning role. According to P4, regarding the Lottery funding of the project, the day it was announced, the government were trying to obtain funding for the Titanic Centre, which supported the narrative of boosting the economy via tourism, and the statement at the time was one of regret that the Titanic Centre did not obtain funding. They concluded how that seemed to sum up what the government truly think development is all about:

> *"economic development, jobs, foreign investment, reducing the risk from government because they were funding it, rather than delivering grassroots benefits for the people who live here"* – P4

This also relates to the Bedford Street project, that in general the scepticism and lack of support for a non-traditional, less economically driven projects hinders Northern Ireland from carrying out projects which aim to instigate significant change. It was only after the success of Connswater when professionals began to come on board, and this precedent is not recommended as opportunities could well be missed, with the Connswater Community Greenway being a prime example, as P4 states, it was due to risk-taking that the project paid off.

6.8.6 Transportation Hub

The new Transportation Hub proposal is a flagship project in its infancy located in the heart of Belfast and is being prioritised by the NIE. It consists of an eight-hectare site of mixed-use development, replacing Great Victoria Street train station, which currently resides on the site. Like the others, it is expressed to be in line with the PfG, which aims to provide high quality public transport, directly linking to the outcome entitled 'We connect people and opportunities through our infrastructure', which indicates journeys being made by walking, cycling and public transport. It is expressed as an important gateway to Belfast, stimulating economic opportunities, again the economic justification seemingly being the major driving force.

Participant N3 believes that the project remains in line with Belfast's car dependant history, and it is still predominantly focused on the movement of vehicles. Conflicting perspectives are unearthed regarding the hub concerning its ability to pragmatically impact on the movement of people, particularly when stepping outside the "*red line of planning*", where it was expressed how the road engineers are not understanding or accommodating for the movement of people. N3, who is involved in the project, candidly told of how wonderful the plans looked, the caveat being only within the planning boundary. Once outside, they believed there are immediate barriers for pedestrians, in terms of road crossings, impairing free flowing movement, not prioritising the movement of pedestrians; referring to road engineers they declared "*they don't get it!*". This again echoes the earlier discussion, in that, proposals are not living up to the initial standards presented. N3 concludes, the hub should be considering pedestrian routes to city hospital, to Queens university and to Ulster University, to the city centre, but acknowledged that is not the case and that car routes are instead being more considered.

Conversely, some professionals feel that connectivity is key to the phases of the project, with E1 stating how the project fits entirely in with the phase 5 of the Belfast Streets Ahead (a public realm regeneration project), although amused, recognising that phase 3 is not yet complete.

This provides insight on different professional cultures, with this example being an active travel specialist against an engineer. What may be progressive for an engineer, may seem very limited to other professions who specialise in areas of active living, demonstrating disparities between professional cultures.

N4 echoes N3, when discussing the new hub, who pointed out that the PfG talks about changing private vehicle dominated culture, not explicitly, but in terms of trying to be more focused on moving people:

> *"the reality is, time and time again, proposals coming forward, something like the transport hub, you can see that DfI roads main focus is keeping the traffic moving. They are not focused on getting people moving."* – N4

Participants refer constantly to a change in mentalities away from the focus on moving traffic, ensuring parking provision and the provision for taxis, without thinking about the movement of people first, or even at all. N4 critically states that professionals have been thinking this way for so long, it is terribly difficult to change that culture, there may be "*words on the paper*" that focus on people first, but they are still thinking about "*tin boxes*". E2 expressed how the hubs are very much focused on linkages to all surroundings, walking and cycling access however, conversely to this, E3 admits how they have talked about how changing facilities and bicycle lockers in such hubs, which could be potential retail space, isn't a good economic trade-off so they will inevitably "*shy away from it*" – concluding that "*this is the reality*" and again highlighting the power of the economy driven narrative. E3 also identified challenges in attempts to retrospectively weave in healthier considerations to existing built environments implying that the opportunity for radical change lies within new development.

6.9 Cross-case Comparisons

The cases discussed within the interviews uncovered three main points of debate, the first being the difference between proposals and products; the second; the perception of progress,

and thirdly, leadership. Although all the projects mentioned are generally positive towards active living concepts, they each contained a darker side, the complexities and challenges behind the project. Some projects had proposals leaning strongly towards more radical designs, or more people orientated projects, but through implementation the outcome was watered down and did not fulfil what it proposed. This demonstrated the uncertainty in delivering through a different approach as well as the power of the standard economic driven agenda that has arguably monopolised professional practice.

Furthermore, the discussions provided great insight into professional cultures and demonstrated the confliction from professions; where one profession may think that they are being progressive compared to other professions who think decisions are still conservative, from engineers to active travel experts respectively. Almost all cases expressed how it was a new way of thinking, or that the project was somewhat outside of traditional remit, some suggesting that this was used as an explanation to be less radical, and more careful, meaning that due to its nature it could be diluted to appease those who are more traditional in their professional approach.

Having political support was mentioned from almost every participant and it was positive hearing how the PfG has changed some professionals' thinking towards their work, and how this has manifested into practice. This was emphasised through certain projects such as the BRT which had engineers work closely with the cycling department and Sustrans, a noteworthy case of effective collaboration (E2). However, this project also brought about how politicians lobby against the active living agenda, supporting the taxi lobbies to use bus lanes, a supplement to the BRT that professionals' thought would dilute its purpose and contradict the PfG. Also, the Connswater Project was driven by the community and did not fully have political backing until it was recognised as a success (P4), and the Better Bedford Street scheme was said to be driven by professionals who attended the Copenhagen field visit and not the government (E1). This demonstrates that the government may not perceive

themselves as a voice for driving healthier agendas. In reality, they are said to prioritise others means and it takes professionals or communities to bring awareness to health orientated approaches.

Examples from other countries could help with health enforcement, such as Wales, which adopted the Active Travel (Wales) Act 2013 and has been an influence on several countries. N3 states that the use of such a bill is to oblige, during the development of a local plan, an audit of existing walking and cycling infrastructure to be complete, then to come up with a development plan for walking and cycling and development to be fitted in around this. This removes the retrospective element to active living considerations, safe routes to schools for example, with a school being unable to be zoned in a designated area until a walking and cycling network from housing is in place first. Consequently, it is a significant challenge has been identified in weaving "*a new approach*" in terms of active living into current built environments in Northern Ireland. Therefore, newer developments have the opportunity to deliver active living considerations, yet participants believed that built environments are still accommodating the need for space for cars, rather than developing alternative transport links, or expanding bicycle schemes.

6.10 Conclusions

The field observations and active living orientated products have established the importance of assessing and analysing the existing built environment itself. In doing so it has found that the most deprived areas (in terms of health) had built environment characteristics which supported active living but the quality of the built environment itself was evidently lower due to neglect and lack of maintenance. The least deprived areas had urban characteristics resembling sprawl but had good quality urban environments. This could mean that, due to the first two areas being deprived in health, employment, multiple deprivation and other measures, the built environment may not be a contributary factor. This demonstrates the caveat with looking at multiple deprivation measures, as they simply were not enough data on physical

activity or obesity, therefore settling for the broader category of health and MDM were only obtainable, at a local level. In addition to the policy-practice gap it has identified a further gap between practice and implementation with many active living orientated proposals reverting to more traditional practices during the actual project delivery.

Chapter Seven: Professional Perspectives on Practice and Processes

7.1 Introduction

Two vastly different elements of the development process have now been addressed, planning policy, which informs development, and the tangible products of development, the built environment. What happens in between the production of policy and development consists of different professionals working together and making decisions, which inevitably results in a mixture of differing professional cultures, each having their own sets of attitudes, values, beliefs and behaviours. This chapter differs from Chapters Five and Six as it solely focuses on the data obtained from the interviewees, their professional perspectives on their practices, which refers to cultures, and processes, which refers to collaboration and the planning process.

7.2 Practice

This section explores the concept of professional cultures amongst professions working within the built environment in Northern Ireland. This allows for multiple professions to represent their professional beliefs and their perceptions on other professions which they collaborate with. The interviews garnered three clear themes:

1. Professional cultures expressed by practitioners;
2. Professional perspectives on other professions and;
3. Professional approaches towards the delivery of active living.

The first theme considers how each participant values their own profession. The second covers the attitudes each participant portrayed regarding other professions, outside of their field. And finally, the third theme reviews each participant's insight into the delivery of active living considerations.

7.2.1 Professional Perspectives Expressed by Practitioners: an inward look

To begin, a discussion around the philosophy behind professions provides information on how each participant views their own work, along with their overarching professional values. These responses catalogued how each participant perceived their profession more generally, accumulating a list of attributes which begin to create collective insight into professional cultures of those involved within the built environment (Table 7.1).

Table 7.1: Professional Perspectives on their professional attributes

Participant	Profession	Quote
P7	Planner	*Planning is all about balancing competing land uses and acting as an arbiter between greed and sustainable decisions*
A4	Architect	*To try and understand mechanisms, procedures and protocols and give advice, and work with those to build a vision*
N1	NGO	*To work with partners to introduce new themes and ways of working*
E2	Engineer	*It's about analytical problem solving and how you deliver strategies*
H1	Health	*Trying to make connections and work collaboratively…in terms of…health improvement and health and wellbeing*
D3	Developer	*To create opportunity and provide a need for people who are unable to provide it themselves*

The quotes above demonstrate the more philosophical side to professionals, building visions and creating opportunities. These statements also validate the intrinsic collaborative nature into the multi-disciplinary working environment professionals experience daily. It is a positive sign when asked to broadly define their profession, participants immediately recognised the value in collaboration. This was not the only value that was shared across professions. A concept that had equal standing among all those interviewed was sustainability, whether it be the term itself or sustainable development, sustainable transport, or sustainable environments. Over half of the participants mentioned at least one of these terms, and they shared a common

meaning and recognition of the term. N4 mentions how planning policy has moved towards sustainable development, with A1 expressing how everyone working within the built environment appreciates sustainable development. An engineer expressed how sustainable transport being present within the PfG has provided a case to promote active travel within strategies, whilst D1 admitted that healthy living is becoming more prominent and how developing within certain densities allows them to create sustainable environments which support local convenience, a nod to active living characteristics. P11 provides an example from an English context who states that 100% of planning authorities have policies on sustainable transport. In Northern Ireland, participants expressed concern that planning has lost its way regarding sustainability. Attempting to reflect such approaches with what is actually happening in practice is a challenge, as economic justifications often supersede, resulting in less priority afforded to considerations of society and the environment (P7; N4). Hence, there is an imbalanced approach in delivering sustainable development as participants acknowledged that the economy outweighs other priorities.

Considering professional core values, most planning professionals immediately reflected on the codes of conduct compelled by the RTPI. Planners are bound by their professional ethics, respect, integrity and doing their due diligence (P3; P2). P1 emphasises how important honesty is as a planner, as their advice is heavily relied upon, again reflecting on the RTPI's codes. The discussion on professional values drew on planning being different than other professions. P7 and P10 described how planning is a "*strange*" profession in that even if you have a degree in planning, it is not an exact science which often leads to differing interpretations and opinions. This demonstrated some vulnerability within the profession with many professionals admitting that planning practice is often down to individual interpretation, and with that so too is the delivery of active living considerations.

In Northern Ireland, planners need to be stronger, and power struggles were evident through pressures placed on planners to deliver schemes (P4; P8). The fear of losing investment can result in poorer developments. P6 admitted that planning applications of poor-quality proposals have been approved by complying with policy, albeit the compliance is solely economically driven evidencing the concern over sustainability and the emphasis of economic growth. The planning profession in NI was described as "*very timid*" with planners considering themselves civil servants over being a planner (P4) meaning that tends to drive the government agenda more than the planning agenda, again providing an evidence on the weight placed on the economy. When discussing their role in driving better standards towards active living P1, a planning consultant, admitted:

> "*So, it's our job, I mean, if we tell them what the requirement is or what the guidance is, we should be pushing that and sometimes we…we're not forceful enough I think*"

P4 suggests that it requires major institutional changes as well as behavioural changes which the government can influence in order to put health higher on agendas but currently planning is framed around economic development; not improving health and enriching people's lives, contrary to the core regional policy objective. This identifies that it is not only planners working in the public sector that are "*timid*" or too economically driven, but something that is shared throughout the profession and a clear example of the planning profession culture. Consequently, a significant lack of consideration on health outcomes persist.

Architects seemed to focus heavily on their core value as serving the client and going beyond the expectations of their brief. This was unanimous among the architects interviewed, with A5 explaining that if they do not initially deliver to the developer's expectations they will go to another architect. This also resonated with the planners, having the fear of losing out if developers are unhappy. Architects discussed how the client can also hinder the architect in developing good design which was highlighted in an interview with A5, a lecturer and practitioner in architecture, who stated how business parks, five storey buildings in the middle

of a car park are considered the best model for a government office. This model contradicts active living principles, the offices being accessible only by car. A5 provided an example in which they recommended the offices to be built in the city centre and to have active frontages and detailing why that was the preferred option. However, the client (the government in this case) had a problem with this and kept going back to the architect asking if there was any way for the office to be stand alone, implying no intention to shift from ordinary "*bottom drawer*" design. Whether this is due to a lack of understanding of what the architect was trying to achieve, or resistance to the idea, is unknown although it draws on other challenges of overcoming the mentalities of professionals who may have closed perceptions to active living concepts, with A3 pondering, how can a shift occur with regards to convincing those who are not open to the idea? This portrays inner tensions professions have when discussing their own profession, explaining what their role is but the challenges that occur outside their remit and with other professionals.

There was also a consensus amongst engineers regarding their profession, that of problem solving and finding practical solutions to issues regarding development, heavily emphasising functionality. E1 refers to an analogy regarding the human body and stating how civil engineers are the bones, circulatory system and nervous system, a reference to roads, sewers and pipelines. It was this analogy that was used to try and explain why the SPG Living Places did not suit engineers and reinforced that, not only is policy both prescriptive and non-prescriptive, so too are professions. Engineers are direct in their approaches and it seemed that they have a very black and white view on their practices:

"*Delivering strategies. Value for money. Lessons learnt*" - (E2).

Yet P10 declares:

> *"People think its black and white, but it's not. Its highly politicised and subjective in a way. Planning will stop the worst, and bad developments happening. But the extent to which it can make an okay development a*

brilliant development is a different matter. Because the okay development is still okay, it won't be refused. Moving it to the brilliant is a more difficult task, requiring hearts and minds. Getting everyone signed up is key."

P10 clarifies the meaning of "*hearts and minds*" refers to getting everyone involved in the health agenda, particularly politicians and developers from the very start.

All the developers interviewed discussed several recurring topics, such as providing opportunity through development and obtaining profit from it. A developer does not want to build anything unattractive and there is recognition that there is nothing pleasant about building "*a large concrete structure*" (D3). Therefore, creating a pleasant environment was acknowledged, albeit not through the lens of health but rather commerciality. Health was generally not associated to physical activity amongst the developers interviewed. Rather, health was viewed in terms of air pollution, noise pollution and gyms. Developers also placed a lot of emphasis on safety and security which some conflated with health. D1 stated that their philosophy around residential design was around that of the single female, adding how important taxi drop off points are, being right at the front door, so that residents are only a few steps away from "*a safe and secure lobby*", which from the perspective of the research could have impact on design and on active living.

Almost all professionals defined their work in similar fashion particularly at a more general level. The next section explores participants' perspectives on other professionals and will draw out differences on how one expresses their perspectives and how others perceive that.

7.2.2 Professional Perspectives on Other Professions: an outward look

Professionals were certainly quick to examine and critique other professions, evident in the last section with professionals finding it difficult to discuss their own profession without mentioning others. P9 suggests that active living is not considered high priority in practice because "*you're dealing with Roads Service*", P10 elaborating that road service engineers are less flexible within their work and tend to design according to strict rules which relate to safety

and being less flexible in going beyond their codes. P3 described engineers as being "*very engineer focused*", with what roads and bridges are going to look like and how they are going to work, adding that there are many other aspects that need to be thought of. E2 clarified this by stating that it was only recently when they began to consider wider determinants outside the civil engineering profession.

The codes engineers adhere to are prescriptive and unchallenged, which is significantly different to the planning profession where planning policy is more open to interpretation. P8 continues with their thoughts on road engineers:

> *"they are very focused on safety. Whilst, I wouldn't say we want unsafe roads, I think sometimes the design standards are so strict that it disincentivises good place making."*

Therefore, planners perceive that prioritising safety guidelines can be at the expense of effective place making. An example was provided in how engineers tend to struggle with the concept of "*shared space*", where the car, walking and cycling are all equal - not fully understanding that shared space can slow traffic flow and act as a calming measure (P8). According to P10, there are tensions between the older generation of engineers (who remain heavily focused on cars and safety issues) and those strategizing policy because policy makers are beginning to moving away from the car towards active travel agendas. N3 proclaims that road engineers have the final say in terms of infrastructure, they will not adapt to anything unless it fits a certain standard, that standard being curb geometry and parking, stating that they are not planning for the movement of people. The perspective towards engineers is fundamentally similar to how they perceive themselves, however, the difference is that professionals outside of engineering view it as limited and inflexible, whereas engineers see it as functional.

Engineers, however, expressed how planning still wants every house to have its own parking, and therefore they do not feel encouraged to look at sustainable transport as a significant

alternative (E2). This presents signs of professions 'pointing the finger' at one another. E3 thought that planning can always be improved as currently it is too passive. They recommended that the people who design, plan and implement need better interaction between each other inferring the silo cultures which can occur in governance structures. A2 supplements to thoughts on planning being a "*strange profession*" as it has long been a refuge for geographers, sociologists and other professions, which results in the one profession consisting of multiple cultures. They express this, not as a criticism, rather that it reflects the sociological aspect of the built environment which is made up of different people and skills. However, it does provide context why the individual interpretations in planning could differ significantly with planners coming from varied backgrounds.

Perceptions towards architects are mixed, as P8 suggests that architects are understanding the health implications of development, however, N3 adding, "*but in an architectural way*". Proposals and designs may look wonderful, but they often have not thought about orientation or types of materials proposed potentially resulting in a design which is not people friendly (N3; E2). Some architects are said to be very pushy on the health theme in terms of bike stands and local amenity proximity, justifying a development based on connectivity and proximity to local services (P1). Conversely the same participant mentions that others are just simply focused on design, with P2 acknowledging how, in their experience, there are those who simply "*go to the bottom drawer*" and repeat a standard design. N3 discussed how architects are trained to be leaders, and this leads to the profession having a reputation of strong egos. P1 explained how an architect who has good leadership can drive healthier decisions if they are that way inclined. Planners agreed that architects recognised the overall health agenda, with P8 admitting that problems could occur in any profession, where architects may not look at things like connectivity, but through the collaborative process such concepts should be addressed.

Participants expressed how the developer can put pressure on the development process. P8 explained how they threaten to walk away if they can't develop what they would like, putting pressure on planners, politicians and architects. This only tends to occur if they feel it will impact on their profits and P7 reasons that you cannot blame them for that mindset as profit is their ultimate goal. Yet, it was surprising to find just how much power developers can have. P10 clarified:

> *"If you say to a developer "I'm sorry this is refused on the grounds that it simply isn't well enough thought through on the active travel agenda", and all the jobs associated with it go, you are hit with media, one side of the political spectrum will start asking questions and developers will lobby" – P10*

P10 admits that many developers see a clash between making money and doing the right thing and that developers will lobby against planning decisions if they perceive it to impact on profit. Planners should convince them that creating healthy environments is just as lucrative. It is not enough to convince developers that it is the "*right thing to do*" in considering active living, as most understand this. Rather, convincing them that it is also better for the "*bottom line*", the ultimate goal of developers, profit (P10). Convincing developers of the sellable aspect to healthier designs has been referred to as being better than convincing politicians, as developers in Northern Ireland seem to have a lot of power. In addition, the English context provided similar results with P12 candidly expressing:

> *"to be honest, it's the client that drives everything. So, if the client is interested in this agenda and wants to push it forward, then they will drive everybody to achieve it. It really is as simple as that".*

The challenge is getting developers to buy into the idea of, not only considering healthier approaches, but implementing them into their projects to drive revenue.

This does not suggest that developers do not see the value in healthier considerations as expressed by N3 and P7, how developers came around to the idea, even getting excited about it since they were learning a completely new perspective. However, the phrasing used when

referring to developers, such as, pressure coming from the "*developer's muscle*" and that the council then "*caved in*" and gave approval demonstrates the perceived power professionals feel developers have (A4). Again, another side is detailed by N2 who admits:

> *"We always complain a lot about developers, and I'm one of them, but at the same time they do have a role in pushing this agenda forward as well, because in some cases they actually go further than the council expects them, but it's purely as a branding exercise."* – N2

Even though N2 defends developers here, the beginning sentiments uncover underlying tensions that were evident throughout the entire interview process when professionals discussed other professions. Regarding developers, participants summarised them as being money driven, but this was something that developers concurred with, similar to the engineers, the outward description fits in with how engineers view themselves, albeit framed differently.

Architects and developers who had previously worked with local government expressed a lack of coordination and experienced challenges and issues between local and central government. The councils, and government departments such as DfC and DfI were thought to not naturally communicate with each other:

> *"they don't on a day-to-day basis work together. So, you end up in the middle, trying to sort of, broker things with them all." – A1*

A5 explains how, in his experience, the foundation of the planning system is fundamentally good and solid. Although, they are under resourced, and applications can take months to get validated, comparing Manchester and London as being streets ahead (A5). This was echoed by A6 who told of waiting months for permission on a small housing extension being the norm and described working for local government tenders as "*onerous*", not at all favouring smaller practices due to the amount of work needed for the application. A3 concurs with this line of thought, in that the system is "*not bad*" but there is not enough network for a constant dialogue, stating that the current system does not allow to bring people in, sit down and talk things

through. D3 stated that fifteen to twenty years ago a meeting with a planner could easily be arranged and they would negotiate. They continued stating, admittedly there is now pre—planning but to them it was not meaningful enough or helpful, there is not a proper discussion and after that, little to no consultation. They were unsure why the dynamic changed stating that it could be due to professionals not wanting to be held responsible or that they do not want to be in a position of power anymore, admitting that in their experience, it had gotten worse after the RPA. When probed about whether they would prefer more consultation they responded:

> *"without a doubt. And I would feel, planning in general, and we've talked about architects and all the rest, they even feel that the situation where we are back to the councils is a very poor way for going forward. You have people making decisions that aren't experts in the field. At the end of the day you can look at policy, but people make their own judgement. As much as the regulations are set in stone at the same token there is common sense, flexibility, and a set of rules is great of course, but each development is very different, there are reasons why things should happen in one and not the other. If you're dealing with experts in that field, you can talk it through. But with the councils, I think you just end up in a position which is meant in the right way but at the end of the day, councillors want to retain their jobs, and then other factors come into play that maybe influence and that's not a good thing because then you have decisions being made for the wrong reasons, not the right reasons." – D3*

D3 recognised that the planning profession is somewhat undermined by councillors who are not experts in planning, expressing how that loses their trust in the process, believing that it encourages decisions to be made for the wrong reasons. A6 described councillors having power as "*a bit like the x-factor*", if there is a good story (being the application) it will be approved. They also compared with England, where councillors where described as being well versed in planning and law, to NI, where they take a one-to-two-day course then make decisions on important applications, which raises serious concerns on how a concept like

active living would be driven. D3 recognised that whatever decision is made there will be one side that will not be happy, be it the developer or the community, but ultimately:

> *"what's the point of being a planner if you don't have the ultimate decision? That's why you are there. It should be up to the planners to make the final decision." – D3*

Planners were criticised of "*cherry picking*" what they deem important, and even though there are regulations to do with cycling, parking for cyclists, especially on commercial projects, in the experiences of A6, these are rarely imposed. Conversely, if the two-metre threshold distance between houses is not met, for example, planners "*come down hard*", suggesting that they focus on certain things and ignore others. In fourteen years of professional practice, A6 has never been in a position where there is debate over cycling paths, or other active living considerations. This does not provide them with "*a stick to hit the developer with*", therefore the architect does not impose certain values on a client because the planner does not impose on them.

How politicians are perceived is important to address due to the development process being highly political, although it is noted that no politicians were interviewed to defend the perspectives from others. The PfG emphasises health within the outcomes, but it remains the perception from professionals that politicians still have not "*got there yet*", or they are concerned with health in a different way (D2). According to D2, it's a sellable issue, the politicians seem to be more concerned about having X number of doctors or nurses in hospitals or cutting waiting times. There are suggestions that professionals in general pay "*lip service*" to this concept but when it comes to actual decision making, it is much more difficult. Generally, when professionals address other professions, the rhetoric is much more direct although ultimately, attributes negatively associated to professionals are deemed as positive by the profession themselves (Table 7.2). The next section looks at how professionals perceived the delivery of active living and the challenges and opportunities pushing such an agenda.

Table 7.2: Professional Perspectives on their own profession and other professions

Profession	**Other Professions claim:**	**Same profession claims:**
Engineers	Not Flexible	Prescriptive and functional
Planners	Passive / undermined	Arbiter / Mediator
Architects	Ego	Leaders
Developers	Too Money orientated	Branding and profit

7.2.3 Professional Approaches Towards the Delivery of Active Living

Many planners made the historical connection of health and planning, much in the same way as the literature review brought out. They admitted that, although health was important to planning, over recent decades they have lost connection, planning focusing more on zoning and economic issues, leaving health behind (P10). Although this is starting to change and health is becoming relevant again, there are unreal expectations on what planning can practically achieve (P10). Professionals were honest in their summation of the conceptual aspect of active living, describing it as just "*a normal concept*" (A3), "*common sense really*" (P2), and that "*it's not rocket science*" (A1), although there was acknowledgement that delivering it is much more complex. A2 candidly deliberated that they were not going to pontificate that it was cut and dry, with H2 declaring that even though active living is an important concept, because it does not fit neatly into anyone's remit, it becomes "*cloudy*" in practice. P10 suggests:

> *"there is a slightly unreal expectation of what planning can deliver in relation to [active living]. In some ways, planning only deals with a very small percentage of the built environment that is changing" – P10*

P10 believes that planning has an inability to influence unhealthy areas or services that have already been built, which resonates with the last chapter's discussion on the difficulty of retrospectively weaving active living into existing urban environments. An example was provided of a scenario that transpired in their work when a former Minister questioned them on what planning can do for the location of hot food takeaways, with P10 having to explain

that whilst they could introduce policy for new locations, planners cannot be expected to do anything to takeaways that are already located. This was also emphasised by E3 who commented on a significant challenge being to weave active living design into existing areas. Therefore, this emphasises the overall public health agenda on prevention, and how to stop certain uses from being located at specific locations, near schools for example, initially, and not retrospectively trying to solve problems, hence the built environment would certainly benefit from a proactive approach. H1 firmly believes that staff should be trained specifically on concepts like active living, so they have their own inhouse resource, upskilling the staff and helping professionals understand how planning and health interlinks which could then prevent unhealthy environments from being built.

P4 talked about how the planning profession is looking for redemption because political support has been slowly, falling away, and planning has been desperate for the belief for "*planning to come to something*" and health has been associated to that. This was expressed as being well intentioned but also that many planners are wanting to "*save planning*" or to make planning more important. Furthermore, P4 continues, that planners must be careful about their role and that there is a danger of the profession ending up being deterministic, that if "*we fix the environment, we fix the problem*", rather, the problem of obesity and obesogenic environments and its implication on society is complex. This debate is important, as there was a sense of desperation from other professionals, who are keen on active living principles, but are unsure how to implement them. It was expressed as a fear to P4 personally and something which occurred frequently, particularly in policy areas, of hooking onto an idea and that it is a simple causal factor. They concluded that if policy is made in this way it will be a disaster:

> *"that has happened in planning a lot, where we think of issues in a simple way rather than a complex way. But the role of the built environment is important and complex, and we need policy to reflect that."* – P4

It emerged just how complex delivering active living could be. This resonates with the 'wicked problem' (Rittle and Webber, 1973) of tackling the physical activity epidemic, hard to define

and difficult to solve. Whilst it was expressed that the transferred powers resulted in some shift towards the understanding of active living, compared to the old structure of the DOE, there remain many examples of a "*half way approach*", with professionals not daring to go the "*full way*" and lacking strong commit to deliver active living outcomes (N2).

When implementation of active living consideration was discussed, almost a third of the participants brought up the idea of installing gyms in developments, a design characteristic that, although positive for physical activity, does not fall under the remit of active living and utilitarian exercise. A1 explained that those carrying out active living considerations are those who understand it, "*which is rarely the client*", which correlates with the interviews, as all developers did indeed mention gyms. There were those who understand the concept fully, whether from individuals or organisations, but this does not necessarily mean that it is brought forward. Therefore, even though some professionals may have much more awareness on active living than others, it does not mean that it will be delivered.

For those interviewed who did not grasp the concept fully, another term was used in 'passive exercise' in order to get across the unintended nature of the physical activity, to encourage the participant to separate organised exercise. A1 continued that that's where landscape architecture has a clearer, better understanding of what active living should look like, conceptually, and is probably going to be perceived better through the eyes of a landscape architect than other professions. For those who had never heard of the concept they could still see the benefit of it, developers seeing it as attractive, but only if it is cost effective and financially sustainable, and easily incorporated but not something that is done in practice (D3). Again, this highlights how developers are interested in the idea, if it benefits them financially, which emphasises the need to build capacity on the concept on the economic benefits from active living practices, as this may be the framing in which the concept should be driven.

Almost a third of participants brought up obesity, however, all references made were brief and there was little emphasis placed on it. A3 stated how it is an area that they would like to tackle

over the next couple of years, and stated that the impact architecture has on obesity, is "*really obvious*" from architecture and planning perspectives. Professionals continually expressed that delivery in this area rarely manifests, and even if there is a health theme, it is rarely associated with physical activity or obesity. Planners also stated concern over imposing active living principles onto projects, suggesting that it does not necessarily mean that the infrastructure will be utilised in its intended way, meaning you cannot force people to walk even if that is the intention. This illustrated some uncertainty around what professionals feel they can control. Or what they should control. A5 questioned whether or not it should really be up to an architect to impose active living on a client at all.

There were many thoughts that education, at university level, is somewhat responsible for a lack of awareness amongst professionals, as health is not a major topic in most curriculums. An architect who also works within academia, when asked if health was a theme in architecture rclarified only to the extent of the starting point of the urban position, a loose association at best. Many participants reflected on how healthy concepts should be embedded more into built environment educational systems, with planners, architects and engineers learning about health principles with a quarter of participants referencing the importance of high-level education in universities regarding health, highlighting that a gap within built environment education is likely.

Health within the built environment proved non-contentious, with no participant questioning the benefits of active living considerations, but not necessarily being carried out either. H3, an active travel specialist, claims that in their experience planners and road engineers are still hesitant in delivering active living outcomes. They admitted that planners may advocate for it, but it rarely translates down into the on-the-ground divisions. This is the real struggle, especially outside Belfast, where mindsets are more stuck and walking and cycling tracks beside roads are incredibly difficult to achieve (H3).

The non-contentious nature clearly shifted when discussing mechanisms for increasing active living, particularly concerning parking standards. There is an overwhelming consensus that Northern Ireland is too heavily focused on designing built environments for the private car. Whilst some may not agree that banning cars from city centres is effective (N5), all participants agreed that car reliance is deep within the cultures of professions, politicians and society. This is a significant factor that makes implementing the health agenda around active living incredibly difficult, as the pandering towards cars results in a heavy focus on roads and parking. Although everyone perceives that active living is beneficial conceptually, when it comes to pragmatic solutions, such as a different approach towards roads and parking, there are many more complexities and disagreements on how that should manifest itself. Many high level professionals and politicians are not prepared to take the more radical approaches required to deliver active living, as summarised succinctly by P4:

"No one wants to see a city running unhealthy, but they are not prepared to confront the very issue"

This sentiment was echoed throughout the interview process, with N4 stating how the priority of the DfI is to move traffic and not about moving people, even though they promote a notional idea of a road users' hierarchy with pedestrians at the top. Transport spending is generally on cars and not on alternative modes with little to no discussions on congestion charges or road diets[36], and limiting parking as they are politically unpalatable. H3 adds that Northern Ireland spends a total of £2 per head on active travel while in Belfast it is £6 and Scotland it is £15 per head. This provides an interesting comparison to how much funding is being placed on active travel, the NI average being significantly lower. This is most likely due to the rural landscape of NI but this also demonstrates how reliant NI is on the car, being so rural and having very little funding to help with active travel.

[36] Road diet is a term used by participant P4 which has many features some of which include the widening of footpaths and reducing the number of vehicle lanes.

Twenty-three participants mentioned the ‘red line’, and how the planning boundary, embedded into the system, impacts on the level of which active living concepts are considered. There was a certain onus on architects in considering surrounding context, outside of the red line. A5 stated the problem in working in the private sector market who only keep within the red line, with A6, a private architect saying that the red line is 99% of the restriction. A5 continues, describing the difficulty with most architects responding to the project as a red line on a map, not looking at the holistic project, but also not required to address the broader picture. This fits in to N3 thoughts on how planning bodies need to be more astute in how they see development, as after they provide planning permission it just goes back to the red line. P12 also stated how engineers and architects will rarely think beyond the red line being more concerned about the problems within the area. This presents the mindset of many participants regarding the limited and narrow vision of development regarding the red line of planning and as a result it should be deeply addressed that the red line of planning permission is not a physical barrier

It has been demonstrated that professional cultures exist, although to what extent a profession influences the professional is difficult to gauge as individual perspectives are also intertwined. P7 expressed how a core value of their profession is making decisions based on your own professional judgement, associated heavily with individual interpretation. Whilst a profession influences certain decisions and influences ‘meaning’, this relies on the interpretations perceived by the individual, with a certain individual who “*has it on their radar*” is where health themes have shone through (A1). How it manifests into practice, and whether an individual who is inclined to think ‘healthier’ can impact on the product as a whole, is to be determined, but arguably unlikely, particularly if that individual is not necessarily in a place of power or leadership. Therefore, general and broad conclusions on the existence of professional perspectives are obtainable, and it is recognised that there are certain values that particular professions focus on. It seems that there are different levels of influence with broad brush

professional identities, which then filters down to individual perspectives which often conflict with one another, to then, finally getting lost in traditional practice.

In general, the term ‘active living’ was not found to be one used in practice in Northern Ireland amongst built environment professions. The majority in conversation had heard of, understood and accepted the general conceptual principles; summarised as being conceptually simple to pragmatically complex. Consequently, the general understanding of the term active living amongst professionals is mixed, demonstrating a lack of clarity, or awareness, on the terminology specifically, and much like within policy, not fitting neatly into any professional remit.

7.3 Processes

This section addresses the discourse related to the actions and the roles of professionals, what they carry out on a day-to-day basis and has an emphasis on collaboration, stemming from the literature. Like the previous section, a description of each profession is listed below, taken from the associated professional. These quotes try to better reflect more on-the-ground realities of professional work within the built environment (Table 7.3).

Table 7.3: Reflection of on-the-ground realities of professional work

Participant	Profession	Quote
P12	Planner	*We try and cover best practice as we can, make sure we undertake everything, and practice what we preach.*
A5	Architect	*[We] adhere to planning policy, and a client who is asking you to push that policy to the very limits of what it is adhering t*
N4	NGO	*We are an advisory committee to government on issues that affect mobility*
E1	Engineer	*We respond to the programme for government and we [have] set up a mobility group to try and help support the department and their indicators*

H1	Health	*We wouldn't have huge linkages with planning, but it's about making sure they know what we're at and us understanding where they are at*
D1	Developer	*We are the client, we are the one employing, we don't just let the professions get on with it, we're very strong and very opinionated, in what we want and how we want it*

The quotes above outline how participants perceive their professional responsibilities. They validate what has been previously expressed, with developers having a strong presence, health professionals having a lesser role in the built environment, but also frames this section which unpacks the collaborative processes of professionals and the politics behind the planning and development process.

7.3.2 The Collaborative Process

By its very nature, the development process is about collaborative working and it is essential to good place making (A1). Participants were content with the level of collaboration occurring in practice and the consensus was that the transfer of powers and the Review of Public Administration is responsible for better collaborative work. This was particularly evident from the participants working at departmental level due to transport and planning being under the same department:

> *"We used to be part of the DOE, and I think moving across what was left of the old DRD, a lot of the roads, infrastructure and travel, just by doing that we're all part of one department now. So, there's definitely many more linkages, discussions and collaboration within this department." – P3*

Collaborative relationships were expressed as "*getting better*" and so too the willingness to engage and deliver projects that may not usually be in the day-to-day remits of a certain profession (P1; N1). N1 pronounced that they feel they carry out the more innovative work, which is not necessarily included within government programs, who are ultimately trying to achieve certain targets (N2). Then, when it comes to the implementation, they hand over to

government departments and other partners and that relationship was described by N2 as "*very fruitful so far*", which implies a positive collaborative network between government departments and the NGOs who specialise in health in built environments. Yet, when probed, all participants suggested that collaboration is required. Some reasons for this from the perspective of a planner included the apprehension from developers being involved too early and fearing that they could lose or miss out on something early on in the negotiations, yet many professionals suggested that better collaboration could be achieved if all agencies came together much earlier in the planning process.

N1 discussed a useful approach in their experience, called an integrated design approach, which attempted to deviate away from specific roles, and was more about making everyone feel free to comment and contribute at any stage of a project, and not necessarily led by an architect. They expressed that this approach allows for professional perspectives to be equal and that projects on which they have worked using this approach produced effective outcomes. Conversely, they expressed negative collaborative processes in which an architect would call for a landscape architect, show him the building design stating: "*there's my building, there's the site, do your stuff, make it pretty*", admitting that that is an extreme example but clarified that in their experience that has happened. However, as this research found, not all perspectives appear equal within urban collaborative processes.

P8 explained how collaboration between the RTPI, RICS, ICE and other institutes is satisfactory, but on the ground, where people are often busy being commissioned by the local authority or a client, the opportunity to collaborate more widely is not realistic. N3 thought that more needed to be done at the planning, rules and regulations, and government policy stages. As mentioned in the previous sections, architects and engineers have been accused of having a certain ego that may hinder the collaborative process (N3), however architects claim that the planning environment in which architects work is challenging (A3). They claim that because there is not a lot of design expertise within councils assessing applications, that there

is a danger of architects designing to get a "*clean run*" through planning, rather than designing the best scheme most suited for the client and community. Planners additionally illuminated significant problems within NI as they admitted they were passing proposals on the grounds of "*if they would win at appeal*". Therefore, with this admission alongside the architect's disclosure of designing proposals to get through planning more efficiently it is evident how urban environments would significantly suffer in quality and how any consideration of active living is doubtful.

P10 reflected on how planners should not be expected to be the panacea to a poor quality project, turning something bad into something good, or on the other hand refusing a project because "*it is not perfect*". They express the need to realise, and understand, that there is a collaborative responsibility with all professions across the sectors. D2 emphasises a need for more joint working on events and conferences, bringing organisations closer together, and recognising that a particular profession has a need to promote their own brand, but understand the collaborative effort simultaneously, yet this begs the question of whether the two can work harmoniously together. H1, a public health professional, argues that the conversations around this area often occur in the forum of a conference or initiative and "*getting three hundred professionals in a room*" together which although it is a positive initial first step, it is not an outcome. There must be more outcomes in relation to collaboration and less thought around conversations and rhetoric, which are being conflated with collaborative work:

> *"A lot of people look at the output, oh we ran an initiative, it was really successful…so what was the outcome? Got 300 people? That's not an outcome. You don't have to prove that physical activity is good for you, what you have to measure is where people start, where they finish and, are they continuing in that behaviour. Then if they're doing that, they'll see the benefits." – H1*

Effective collaboration results in outcomes which affect the people it intends to benefit. Opportunities will occur in the contribution of active living outcomes by bringing together

different professional perspectives which can then influence built environments. If there is no outcome, then the initial collaborative efforts are fruitless. N2 expressed this as an issue that has been "*going on for decades*" which is why a lot of money has been assigned to areas in need of improving health but when you look at outcomes, they have not necessarily improved. This demonstrates the significance of monitoring outcomes and not simply investing money as it often leads to not obtaining benefits and not understanding why. This is a significant issue with current collaborative efforts, that the government may measure collaboration by the amount of investment being handed out and that professionals are meeting up with one another but this may be to no actual beneficial outcome. This also establishes how important it is in knowing what should be measured and this should be another part of effective collaborative work, again, H1 stating:

> *"You can't really do that until you brainstorm about who needs to be [a part of the collaborative process], then ask what it is we want to achieve, how are we going to achieve it, how are we going to measure it. Then you can see if you're missing something in the jigsaw and you may need to bring something else in." – H1*

This was in relation to H1's experience at the collaborative meeting regarding an open space strategy they attended to provide insight from a health perspective. On further reflection, they voiced that the discussion was only catered for those in planning and other built environment professions, feeling that they were involved in conversations that were not so much about health improvement. Their collaborative experience feeling tokenistic. This is a candid reflection on the realities of urban governance that public health officials did not feel comfortable as the meetings were not catered to other professions, and because of the difficulties in becoming involved and in giving their perspectives and feeling their values were not considered equal. H1 interestingly reveals that the discussion was more specific to planning and that they were getting involved in conversations which were not "*so much to do with health improvement [and] trying to push [the] health improvement agenda*". This experience reinforces that health is not being considered within the collaborative process and

how H1 separates planning from health. Yet it must be reiterated that the SPPS has the core objective of 'improving health and wellbeing' and therefore this demonstrates real-world experiences that this objective is not being considered.

H1 suggested there should be a "*task and finish*" group, where key figures within the departments come together and discuss 6-8 topics, and if for example the PHA are involved in three out of those 6-8, separate meetings should revolve around those specifically to better involve the health perspectives. This again reinforces that health professionals are being fairly represented. Moreover, a planning consultant expressed that public health is only really collaborated with in terms of environmental concerns, and noise impacts on health. Speaking further on collaborating with public health due to their focus on obesity and physical activity P1 questioned if they should "*take that thought…should they be a consultee in the planning process*". This provides a different look into collaboration in terms of health professionals feeling that they could add another voice to the collaborative process, but a planner unsure if they should be involved at all – furthering the debate of cross-professional tensions and cultured professions.

The SDG, which was instrumental in developing the 'Living Places' guide and the Better Bedford Street project, consists of many different professions as part of the one group to enhance collaborative working within the built environment. The SDG demonstrates how collaborative work in NI is perceived, which is best described by E1 who defines collaboration as "*running far together as opposed to fast by yourself*". This gives the impression that, although collaboration may involve a lengthier process, the value of having it provides better outcomes. The SDG is said to be unique and the processes and delivery of work is carried out in a way in which government would not normally do things, in terms of policy and guidance. It is collaborative, involving people from all sectors, private, community, local government, central government. They are trying to "*put their money where their mouth is*" and they regard Living Places as this action (P2). They believe it can be of great help to the

built environment practices, with E1 emphasising how the SDG is not just about collaborating for collaboration sake. Although, Chapter Five has outlined the challenges with Living Places as a guidance mechanism.

The participants affiliated with the SDG spoke positively about the group and how it is key to bringing all other professions together. There is evidence of this from N4 who stated that being a part of the SDG has opened collaborative connections between access to transport and planning services and decisions made with regards to land use planning. This is also correlated with the RPA and with roads and planning now being within the same department.

The SDG have also carried out some work with active travel and they want to connect people better through opportunities and infrastructure. For example, through the work of Better Bedford Street which is a project which looked at taking cars and parking away from the street and handing it over to pedestrians as a trial. With regards to the actions of SDG, it is difficult to say how effective they have been in producing outcomes through collaborative practice. There is no doubt they endorse and believe in collaboration, which is expressed clearly in their aim of "*working together to promote successful, inclusive, well designed places*…". However, as E1 admitted, in recent years there has not been much focus put on the group, but it has been recently revitalised and maybe "*given time*" its success in championing collaborative practice can be assessed. This group could provide an opportunity for delivering active living and building capacity on the concept.

The level of collaboration and its effectiveness within NI found that, although almost all participants agreed that collaboration could be improved, the level of collaboration which was occurring was strong. RICS, RTPI, ICE and RSUA mentioned that they have strong coalitions with one another and that there is cross working across the bodies, the field trip to Copenhagen, the work on Bedford Street for example and the production of Living Places. P2, whilst laughing, expressed that now "*planners and engineers can understand each other's perspectives which is really good!*". Conversely, others thought that a fair assessment is that

although collaboration is good there is always room for improvement, with A1 acknowledging that good places come out of collaboration, but Northern Ireland is "*massively adrift of that*".

There are challenges and it is certainly something to note that more collaboration or better collaboration is not the panacea to development issues. It is constantly reinforced that there is the need for outcomes, and this lies heavily under political support. This brings attention to harder solutions coming from a top down position, as well as, a strong emphasis provided to grassroots levels so that they force constituents and politicians to support what they feel passionate about:

> *"hopefully the two can meet beautifully in the middle and we can actually do something! It's aspirational, but its gotta be all those different levers, from our point of view we trying to help government but also help the public better understand when you invest in infrastructure you invest in your quality of life"*
> *– E1*

Collaboration is occurring, it may not be perfect, but it has certainly improved. All professionals who participated were intrigued by the health implications of the built environment, but most shared a collective concern of the complexities and challenges in the delivery of active living – a need for harder solutions, incentives, disincentives and policy changes. In addition, planning being a highly political process which requires further attention.

7.3.1 The Planning and Development Processes

With the current political situation in Northern Ireland being untenable (see Chapter Four Section 4.3.2) discussing strengths of delivering health objectives or embedding active living principles was largely met with a wry response. P8 quipped that this research will be finished before Northern Ireland gets a Minister. Government at Stormont collapsed in January 2017 and there are no functioning executives which impacts on decision-making and policymaking. The overall situation provided conflicting perspectives. The situation had much more impact on some professionals but seemingly little on others, notably at local level. The circumstance

of the executive was expressed by D2 as a big hindrance and that NI is left in a policy limbo. They added that DfI said that they are not going to carry out any new projects until results from high court appeals come through. D1 described it as a serious inhibitor and that everyone must learn how to get on with it while that situation is ongoing. These seem to be, at the very least, significant distractions with this situation in relation to the development process. N3 explained how the PfG was the new thinking, outcome orientated, and that it requires all departments to work together - the deficit being that there are currently no ministers, so it is up to the civil servants, which is a "*great shame*" as political buy in is required for bigger decisions (N3). This justifies why the local level did not seem to be as affected because this political situation has more impact on new policy and bigger projects.

Political buy-in is so important and participant N3 was disillusioned concerning the spending of £180 million on the York Street Interchange (see Chapter Four Section 4.5.4). They asserted how it did not make sense and how that amount of money could have resolved all the cycling networks throughout the province and could deliver for more active people, and also benefit the health service. Regarding the York Street Interchange:

> *"Is that a good investment? [The] PfG is the top determining objective and everything else falls in underneath that. So, if increasing the number of people walking and cycling is at the top of the tree then everything else should be supporting it, but we find it kind of fades away." – N3*

Translating health objectives into everyday practice needs much more attention. Professionals have so much to consider that ultimately, considering everything is simply too overwhelming. A discussion between P5 and P6 unfolded regarding this:

> *"So, we look at everything, everything! Everything that we think is an issue for the borough, from allocating housing and economic lands to the settlement hierarchy..." – P5*
>
> *"…waste, infrastructure, built heritage…" – P5*
>
> *"…Tourism, renewables, every aspect. And we have to link it through to the community plan..." – P6*

"…and other regional policy as well, for example the SPPS, RDS and other strategies, we need to take regard of those and take them into account" – P6

Policy is all encompassing so much so, that it is seemingly a challenge to consider absolutely everything on a day-to-day basis. Therefore, it is suggested that only a handful of considerations are used daily which professionals would keep going back to and results in the cultured professions articulated throughout this chapter. Furthermore, active living is not one such consideration.

Stormont's collapse has been exacerbated by other decisions, such as the Judicial Review of the Arc21 Waste Incinerator (see Chapter Four Section 4.5.5) planning approval, which was carried out by the Permanent secretary Peter May, due to the lack of ministers at Stormont. E1 explained that:

"while that isn't the topic you are looking at, the impact on that will be severe, it really will change the culture. The PAC [Planning Appeals Commission] report said it should be approved and he was just following their recommendation."

Judicial Reviews infers that the project itself was not in question but rather the Permanent Secretary's ability to make that decision (A4). P2 told of how Peter May was completely supportive of projects like Better Bedford Street, and Judicial Review on the Permanent Secretary, according to E3, totally undermines his decision-making abilities. This can cause problems in that the general public may begin to question decisions, adding to uncertainty and complexities that will not be helpful to implementing outcomes that the PfG sets out, if future decisions could be under such scrutiny. This results in careful and safe decision making as no one would be willing to take a risk, expressed by D2:

"*You can't blame them for being unwilling when you have the spectre of the Judicial Review hanging over everything you decide*".

Regarding local level, the LDP is purely a city council document which must comply with the SPPS and RDS, and if it does not contradict them, Stormont "*shouldn't really have a say*", and they can bring forward their own policies for their area (P7). Therefore, the departments suffer the most as they have an oversight in regional planning and without the Ministers, they feel that they cannot produce guidelines or policy statements. Other areas in which it impacts is the community voluntary sector, without Stormont up and running, there are problems with the budget and "*no one is prepared to commit, risk or see things through*" (N7).

When asked if healthy principles were prioritised in councils', responses from P7 were that they are in terms of connectedness, healthy population and health inequalities. But in practical examples, in decisions on major planning applications and in planning committees, where councillors make decisions, they admit that they:

> *"don't know how the forefront of health and wellbeing is with every application that goes in front of [the councillors], if you're looking at a hotel complex or a factory, or 100 houses. There are so many things that they will have to look at, and maybe health and wellbeing is one of them, but in reality, it's probably not a primary consideration, but having said that it's probably not the primary consideration on anyone's mind to be honest." – P7*

This resonates with the other local planners who expressed that they must look at everything, here, P7 stating that there are so many things to consider. This presents the challenge at local levels with planners in councils, particularly for larger applications, only making recommendations, the decision going to the council chambers where councillors ultimately decide, and both have the need to consider such a vast range of factors (P7).

P1 stated how there are strong cultural aspects to some politicians' and professionals' view of development. Regarding the current Ulster University development, politicians were asking why no parking is being provided, that the "*students won't have that!",* P1 having to persuade councillors how student cities in other countries do not focus so heavily in providing them with parking. However, councillors ultimately have the right to decide what they want to pursue

and theoretically could take a completely different direction. P1 refers to the allocation of sites being of particular interest to the LDPs, having housing located close to community facilities for example. They continue, if this is carried out correctly with active living principles in mind places are accessible and places are "*going to work*" and it is important for this to be carried through in the development plans.

A4, an architect who also works within academia, reflects that most people want to do the right thing but due to a client's brief or other external factors that is not always possible. They reason that some developers may just want to get their scheme approved and passed through planning as quickly as possible and how that is a problem as there is an apparent belief that the vision of the city is driven more by developers than the councils (A4). Contradictory to this, D3 and D1 defend this position explaining how they employ architects, civil structural consultants, (planning consultants on occasion) who review and design the project, and whilst they have an input and ideas on the project, it is primarily up to the architects and other professionals to inform them and how to go beyond the metric of mediocre.

There were criticisms on the daily practices of architects such as responding to a project which is all about a red line on a map and not looking at the holistic project with A4 explaining that architects are not required to address the broader, connected picture. Therefore, it is demonstrated that architects are aware of concepts of walkability and connectivity (both associated to active living) but due to the restrictions of the red line they "*don't actually evidence that through their work*" (A4), a similar theme recurring through all professions and politicians, and A1 also highlighting the limitations the red line has on implementing supporting infrastructure, something that must be addressed if active living considerations are to be taken seriously.

When healthy considerations are being carried out it is often not done directly or even knowingly in some circumstances. N5 stated that it is not necessarily an explicit theme, but it comes across in a lot of the work they do. E1 concurs with this idea and states, regarding the

Bedford Street project, that it was not the government saying that they wanted to do it and that it was not even around active travel but rather about making a transport corridor better. Consequently, the first thought of how to "*make a street better*" (which was admittedly described as a vague term) was to remove all the cars, a decision made not directly to impact health or active living but to make the functionality of that street better.

Originally parking standards were a 1:1 ratio of apartments to car parking spaces, but according to P1, DfI are now accepting schemes with no parking, provided that an extensive travel plan is delivered. Therefore, a development without parking could arguably have much more work associated to it as a detailed document regarding alternative travel is required, making it unlikely to happen due to the additional work required. Generally, throughout the interviews, parking was deemed a contentious issue within the health realm, often associated as a major contradiction between the health agenda due to the mindset in NI regarding the private car and parking. P10 stated "*people in Northern Ireland love car parking*" and design characteristics reflect this by prioritising the car and consequently this completely contradicts the characteristics associated to active living.

P9 discussed how developers have the "*perceived need for parking*" and this can conflict with the city's vision of having less cars on roads. This results in a situation where, if the city does not accept that as a condition, they may not receive the investment for the project. This is a 'catch 22' in terms of wanting to have less cars to be healthier but not wanting to make it a determining factor in case investment is lost. Furthermore, inner city parking is offered to the public all day at low prices and even advertised by disincentivising active travel, by displaying a picture of a gentleman waiting at a bus stop, wet from the rain, with the caption 'seriously?'.

Developers view the provision of car parking as sellable and this issue resonates outside city centres in suburban housing areas. Documents such as Creating Places, has been said to exacerbate this, making it easy for architects, prescribing how to create suburban house parking standards (A4). P2 stated that DfI are currently carrying out a car parking study, as

the Department are suggesting a need to reduce parking, adding that this already has resulted in a lot of debates, qualifying that whether there will be a reduction in parking or not is yet to be determined. Regardless of the outcomes of this study, it is evident that parking is a topic which causes deep tensions throughout the planning process. This highlights that internally the departments are having conversations about disincentivising car dependence, and whilst active living and health are generally non-contentious in rhetoric, when solutions are discussed it is quite the opposite. Consequently, almost all professionals and politicians understand the rhetoric behind healthier considerations within the built environment, but when it comes to making certain decisions, such as parking, there seems to be a lack of responsibility or even association that it may impact negatively on health. H3 admitted that the Public Health Agency have offered that they would like to work with built environment teams but that their "*hands are tied without an assembly*" evidencing additional struggles due to the political condition.

There is a sense of uncertainty and a lack of leadership that is starting to be felt across the board (H3). No long-term strategic budgets can be put in place and nothing can be done without ministerial sign off, which is impossible currently. Furthermore, it leaves NI infrastructure development and policy development completely frozen and in a poor, stagnant situation. The public sector is fragmented, at local level the councils have very little spending available to them, according to P7, 4% of the budget is for councils, compared to 24% in mainland UK as councils have much more powers and responsibilities, water, social services, education, and at the higher levels D6 suggests that each department is trying to catch up with other departments' successes, implying silo working and lack of cohesion between departments.

7.4 Conclusion

The professional perspectives have demonstrated that the health topic within the built environment is largely non-contentious with many professionals agreeing that the philosophy of embedding health into the planning system and built environments is beneficial, in theory.

It is recognised that all professionals benefit differently from having health embedded, being sellable for developers, governments improving healthier societies, architects thinking outside the red line of planning permission and planners being less focused on economic development. P4 stated how no one would argue against greater health focus, as there are no arguments against having a healthier environment. D2 adding that generally, everyone they work with would be in favour and no politicians are outwardly opposed to health concepts, hence, all professional cultures agree upon the importance of the active living concept. The difficulty is embedding it at a systemic level as that requires a significant cultural shift. All built environment professions are open to the concept, although the complexities arise on how the concepts are delivered, how to shift systematic professional practice, and society, away from an entrenched car culture. P2 summed up by saying that they do not think that anyone is questioning the benefits of active living, it's the challenge of Northern Irelands' culture around the dominance of the car.

Car dependency is one of the biggest threats to active living and this goes much deeper than behavioural change. Power and policies drive car use significantly, with powerful car and oil lobbies. Even cutting-edge technology in mobility with the electric car gives a disingenuous depiction of health improvements in terms of active living because that does not remove the significant hindrance to the concept, car dependence. It could be questioned why tramlines are not being pushed, investing in cycling infrastructure, or the goal to reduce the number of cars, instead of adapting technology to using a different fuel source, and not actually solving the problem of physical inactivity or obesity. Investing and commitment to cycling infrastructure is key to improving physical activity, however, the threat is that the built environment's infrastructural network already exists and weaving that into an existing fabric is incredibly difficult. When discussing planning and health the only major interactions and linkages between the two in practice, as per D2, is about preventing physical harm (safety), toxic substances and access/location of health services. The main linkages with active living

considerations are currently being driven economically which results in serious conceptual conflictions.

Having the RTPI, RSUA, ICE, RICS, united on the health agenda could result in active living filtering down to thousands of those involved in the built environment. Eventually this could manifest within built environments with opportunities in new developments and within regeneration. Cities need to be open to these interventions and what must change is the more radical nature of interventions, eventually, if this is to be driven forward. Therefore, whilst collaboration is beneficial and necessary for implementing active living, outcomes are required from collaboration. This could consist of pushing the agenda of city living, making it more attractive and not just making it work commercially. This concludes the empirical portion of the research and the breakdown of interviews, along with field observations and policy critiques in the previous chapters. The data unveiled within these chapters can now be further discussed and analysed alongside the literature and this will be presented in following chapter.

Chapter Eight: Delivering Active Living in Northern Ireland: a discussion and analysis

8.1 Introduction

This chapter combines the empirical and desk-based portions of the thesis in order to advance the knowledge and understanding of active living delivery in Northern Ireland. In doing so the chapter follows a logical synthesis of the core themes presented throughout; policy and plans; the built environment; professional perspectives; and, urban governance. By discussing and analysing these core concepts within the literature and alongside the conducted empirical work, a critical investigation into active living unfolds, contributing to the field of research and extensively fulfilling research objective 5. This will reinforce the research validity whilst uncovering unexpected findings and, most significantly, the importance of such research.

8.2 Policy and Plans

As discussed in detail in the previous chapters, urban planning is framed within a dense policy network which serves to inform those working within the built environment with regards to the future use and character of land and buildings in city regions (Barton and Tsourou, 2000). However, policy objectives do not necessarily bear equal standing. HUP emerged in response to a need to recognise the health implications of policy and the importance of pursuing health objectives (Barton and Tsourou, 2000). The extent to which this has been achieved or pursued in Northern Ireland is unclear. Drawing on the findings outlined in the preceding chapters, this section critically considers policy in terms of its effectiveness and utility in professional practice as well as the opportunity participants suggested local plans have in delivering active living.

8.2.1 The Effectiveness of Policy

The policy arena in Northern Ireland is vast for a small nation and is fragmented due to the history of centralised departments (Dowdall, 2004). D5 elaborated how they perceived each government department to be continuously attempting to catch up with the success of other departments, inferring that not only are they working in silos, but competing with one another. This resonates with Gleeson and Rozo (2013) who identified that a lack of a unified vision agreed upon by people in a leadership role can result in a "my department" outlook as opposed to an "our organisation" outlook. They emphasise a need for a common goal which applies unity and promotes collaboration. Silo mentalities were also identified within the ABC council between community planning and spatial planning. These teams were ineffectively collaborating with each other and demonstrated the lack of a unified goal as the community plan raced ahead with its production to rival other councils. It seems that the government levels are producing policy and plans in the hope of progress with little direction and unity on how to effectively delivery them. This is evident within current policy in NI which has attempted to optimise older policies and including new approaches. The concern is that the planning system remains encumbered by extant polices which caused confusion amongst participants as to which one to enact and prioritise (Table 8.1).

Table 8.1: Older Policies alongside the intended replacement

Older Policy	**Intended Replacement**	**Cause for confusion**
Programme for Government (2016) (NIE)	Delivery Outcomes Plan	Only developed due to the absence of a functioning Executive
Planning Policy Statements (DOE)	The Strategic Planning Policy Statement (SPPS)	Many of the PPSs are still being referred
Regional Transport Strategy (DOE)	Ensuring a Sustainable Transport Future	Engineers still refer to the RTS
Creating Places (2000) (DOE)(DRD)	Living Places (2012)	Creating Places is more engrained, and Living Places lacks impetus

Extant urban plans (DOE)	Local Development Plans	LDPs not being implemented until 2022

Without referring to it directly P5 and P6 admitted that one of the extant plans was “really out of date” and that they all have “different approaches to various topics” which results in inconsistencies. This echoes the above point on silo working and how poor spanning across professional boundaries has impinged on stronger cooperation towards shared outcomes in the delivery of health improvements. At a regional level the SPPS was produced to address the overwhelming nature of the PPSs and with local policy being produced in accordance with this there is opportunity that local planning will become much more consistent.

Comparing Creating Places to Living Places demonstrated how the approach to supplementary planning guidance (SPG) has changed, from prescriptive to non-prescriptive. The research found that not only did non-planning participants fail to accept Living Places as the replacement to Creating Places but even planners themselves admitted that it had not gathered the traction that was intended. P1 expressed that Creating Places was embedded in their practice and with the emergence of Living Places questioned “which one” should be used. This highlights a significant concern for contemporary planning policy. There has been a deliberate shift away from a prescriptive approach by policy makers, yet professionals are finding it much more difficult to reflect in practice which reinforces the policy-practice gap, as policy makers are not listening to what professionals respond better to. In this study, Living Places has been ineffective with professionals preferring documents which are clearer and easier to reflect in practice. It could be surmised that whilst professionals acknowledged that Living Places encourages place making and urban stewardship, Creating Places is favoured. Whilst both documents are non-mandatory SPGs, Creating Places was found to be well-established within cross-professional practice. There was some bias presented towards Living Places from those who produced it, yet even they were not convinced that it had the envisioned impact.

Living Places does not explicitly focus on active living, yet its message in urban stewardship resonates deeply within the research, particularly with collaborative urban governance. From an active living perspective this research argues that Living Places is not more active living orientated than Creating Places. In other words, one is not held in a higher regard than the other[37]. It is then argued that it is not the contents, nor the non-mandatory nature, which professionals have failed to embrace but the style in which it is presented. It is understandable that a non-preservative, flexible approach to a guidance document has been unsuccessful in its attempt to replace a prescriptive format, and lessons could be drawn regarding the intention to replace certain documents with one which has a completely different approach as professionals will find difficulty in its adoption. It must be emphasised that the intention of Living Places was to get professionals to think differently about the built environment. Therefore, professional cultures can also be associated in the ineffectiveness of Living Places as it is argued that it removed them too far from their comfortable professional remit and highlights an inability to collaborate effectively.

The policy critique (Chapter Five) found that health is indeed included throughout policy, as is physical activity and the significance of walking and cycling. Nevertheless, planning policy failed to effectively represent obesity. Whilst planning policy referred to physical activity it was never associated to obesity. Whilst this research does not focus on obesity it has been recognised within the research rationale that physical inactivity is a contributing factor to obesity. Justifying the necessity of implementing active living outcomes because of obesity and other social health issues could be significant in achieving healthier goals. Northern Irish planning policy and governmental policy fails to alert professionals not only of the seriousness of the obesity and physical activity epidemic but the impact policy (and in turn they themselves)

[37] To clarify, both recognise health as important and how the built form can impact on health, both mention walking and cycling without mentioning physical activity or obesity.

could have in directly addressing it. This does not imply that professionals are not aware of the impact they, or the built environment, has on obesity but rather that it is not reflected or represented in policy. Therefore, in terms of achieving health objectives by being well defined, with regards to obesity, physical inactivity, social isolation and other public health issues, planning policy has been ineffective as it has not identified these as explicit concerns. Even the fourth objective of the SPPS in supporting design and place-making does not focus on physical activity and continues to focus on environmental issues and sustainable development. This finding corresponds with existing literature on planning policy. Barton (2015) stated how planning policy has considerable influence with the natural environment in air and water, some of which are critical to health, yet falls short in explicit recognition towards obesity or in being more robust towards physical activity.

Policy must first be understood and well defined to effectively implement policy objectives. With improving health and wellbeing as the first core objective within the SPPS, it supports the WHO definition of health which provides a clear and concise definition, allowing professionals to reflect on what exactly they intend to improve; physical, mental and social wellbeing (WHO, 1946, p.100). Yet, health is often used alongside the common and well-established term wellbeing of which no definition is provided. When asked about the meaning of wellbeing, professionals participants found difficulties articulating, explaining or elaborating on the term. Aligning with chapter one, it is understandable that professionals find wellbeing difficult to define as there remains a considerable lack of consensus even in academia (Dodge *et al*, 2012). Consequently, with health already established as being a secondary issue within the built environment (Tsouros, 2015), meaning that it is not considered a priority, having wellbeing attached (almost exclusively) may not help the delivery of health objectives as the professional participants seemed to interpret it more as a 'buzzword'. The confusion regarding wellbeing became clear when multiple professionals defined it using the health definition. It is difficult to pragmatically determine what the inclusion of 'wellbeing' has achieved in practice besides adding ambiguity to the re-emergence of the health theme which itself may be

considered still in infancy. This is not to insinuate that a definition of wellbeing would assist with policy effectiveness or that its inclusion is moot, yet that it could arguably impact on how this can be spatially reflected. A similar problem was identified by participants P5 and P6 who found difficulty in spatially reflecting the community plans vision of the term 'happiness'. Although improving wellbeing and ensuring a community is happy is well intended, it could be interpreted as challenging to effectively reflect spatially.

Similarly, Crawford *et al* (2010) declared that despite the increased attention on certain aspects of health, neither planning practice or government policy fully recognise the intimacy of the connection between space and wellbeing. Barton *et al* (2009) clarified, as this research has done, that this does not mean that there are no linkages, rather that the links are implicit, not explicit and lack a systematic or comprehensive approach. It is argued here that the effectiveness of the sustainable development movement incorporated into planning may have impacted on the health agenda. The literature supported this with how sustainable development resonated with urban planners and was brought to the forefront of planning as the sustainability concept recognised the interrelationships between economic growth, environmental protection and social equality, however in practice many countries prioritised economic growth (Fry and Zask, 2016; Barton, 2005; Barton *et al*, 2003). The empirical study found that almost all participants mentioned sustainable development and it was evident that the concept was embedded throughout all professional cultures. As sustainable development was introduced circa the health agenda, sustainability has clearly garnered more traction. Therefore, the broad acceptance of sustainability may have been at the expense of health.

In terms of active living, policy is largely directed more towards active travel, cycling, walking and public transport, and this was also reflected throughout the interviews. Whilst the characteristics of active living are within policy (in relation to mixed uses, connectivity and density) they are not framed conceptually through health. For example, the SPPS seemed to frame connectivity, active travel and mixed uses within sustainable patterns of transport and

development. This evidences the onus placed on sustainability over health. Without health being framed succinctly both the policy critique and the participants mentioned how active living principles were peppered across the policy domain, weakening its emphasis and not fitting neatly into policy and, as a consequence, practice.

8.2.2 The Utility of Policy

Throughout the empirical work there was a lack of consensus on how policy should be utilised. In Northern Ireland recent planning policies have been specifically written for flexibility (as advocated by planners and NGO participants) so that development does not become overly restricted. In this way, local areas can interpret policy to suit their particular needs. Yet, non-planning professions criticised planning policy for being non-prescriptive and thus susceptible to manipulation. This impacts on all practice, as non-prescriptive policies were suggested to be harder to enforce which gives planners less power and as a result architects cannot use the power of planning as a mechanism to influence developers (A2; E1; P10; D3; A4; A6; H4). The analogy of whether planning policy should be 'the carrot or stick' was used several times without any consensus demonstrating how the discussion was full of conflicting perspectives.

Barton *et al* (2013) believes that to significantly improve health, radical changes in policy are required. Chapter One outlined how the 2006-2007 smoking ban is a good example of political commitment to tackling a public health concern. The difference was that the health concerns connected to smoking are explicit whilst the concerns with public health issues and the built environment are implicit with many contributing factors. It was found that in practice planners knowingly approved poor quality proposals which may have negatively impacted on health because at a technical level they complied with policy. This validates that at technical level active living has no presence, as no proposal in the experiences of the participants had ever been granted due to its health or active living impact.

Consequently, not only was a gap found between policy and practice, a further gap was found between conceptual theories of policy and how policy is utilised by professionals. This is best exemplified in HUP which states “the need to go one step further and pursue health objectives as central to planning work” (Barton and Tsourou, 2000: p1). The SPPS has recognised the health implications of policy with its inclusion of a core health objective, however the question remains how this is actually being pursued. Professionals outside of planning and NGOs seemed completely oblivious to a core health objective (A5, A3, D3) and, whilst not denying it, had not experienced any change or shift in practice towards healthier considerations. It is evident that the core objective of improving health and wellbeing is not being fulfilled. This is significant as planners should be driving the core objectives within the SPPS and they should be filtering down into local policy. Whilst it is promising that health and wellbeing have been included in policy it has not been utilised to drive these ambitions in practice. N3 suggested that if NI had an Active Travel Bill similar to Wales it would fundamentally influence rules and regulations of the planning process and being embedded in statutory plans, and a shift from the rules and regulations about the geometry of the car which are espoused to currently have a significant influence on planning.

This research argues that even a small shift towards health would have been noticed by non-planning professionals even more than planners themselves as their perspectives on health considerations are vastly different. This was demonstrated in the Better Bedford Street initiative where engineers declared a radical shift away from traditional practice, whilst NGO participants thought it as a conservative step. Planners and NGOs expressed that a healthier shift in practice has occurred, yet if the core health objective was being utilised (as stated by planners who already have a more progressive perspective on health compared to engineers) it would have been noticed by other professionals, even if practice had slightly shifted. However, this was not the case. Three polarising opinions emerged regarding policy utility. First, that focus should not be placed on policy standards as it would not be impactful. Second,

that policy is at a good standard and therefore no change is required. Third, that policy itself needs to be radically changed.

Policy can be a powerful catalyst, but only in the hands of skilled leaders. Conversely, Sotarauta (2016) explained that in the hands of bureaucratic planners it can lead to "hollow planning cycles" without true impact, and this was drawn out throughout the interviews, with architects and developers expressing how planners roles are undermined and N1 explaining a need to increase education and capacity. P4 confirmed this, stating how planners in Northern Ireland see themselves as civil servants first then secondly as planners. They expressed that this resulted in them being too timid and lacking in power and even if they did drive certain policy criteria that advice may not be taken onboard. The policy-practice gap on active living is therefore multiplied significantly with policy lacking strength as it almost entirely is based on the procedure of decision-making rather than specifying outcomes, alongside a culture of timid civil servant planners. Addressing this would be to provide planners with more actual power, not having their profession undermined and being more than simply a guide, or mediator through the planning process. With more power, planners could enforce active living at a technical level and ensure that such considerations are being delivered, but currently participants almost exclusively believed that the only opportunity for delivering active living in policy is through the LDPs.

8.2.3 Opportunity for Active Living Through Local Development Plans and Community Plans

Whilst a growing body of literature stresses the significance and importance of active living and public health epidemics (Sallis *et al,* 2016; Jones and Yates, 2013, Edwards and Tsouros, 2008; Allen and Allen, 2015), the concept is not used in NI planning policy vernacular and therefore incorporating physical activity is not conceptually encompassed. The literature acknowledged the importance of a local approach in drawing out active living principles, with HUP emphasising the neighbourhood context (see sections 2.3 and 2.4). Similar emphasis

was placed on local policy by the professionals. The opportunity currently exists to shape these local policies through the LDP process. Questions are raised as to the extent to which this opportunity will be exploited. The LDP process also provides the opportunity for the community to become involved through community planning. This was embedded in legislation including the Local Government Act (N1) 2014 and the Planning Act (Northern Ireland) 2011. However, the synergy between community and spatial planning did not seem to transpire as expected. Spatial planners working on the production of the LDP found the rhetoric within the community plan difficult to spatially reflect. One of the key contributing factors to this apparent disconnect appeared to be how the process was initially presented to practitioners and how it manifested differently. The LDP and community plan were presented as having equal status yet spatial planners felt it was level with the corporate plan and the LDP was lower level. The LDP team described how the community plan "*cantered on*" without them and referred to it "*as a race to be the first council to produce their community plans*" (P5). This resonates with what D5 stated regarding government departments "*playing catch up*" with the successes of other Departments, the same mentality being reflected at local level at the expense of synergy with their LDP.

As previously noted, the PfG ensures that LDPs take account of policies to encourage the use of walking. PfG Outcome 2 states that in order to protect the environment LDPs and planning decisions must take account of regional strategic policy and encourage physical activity. It then aimed to promote electric cars and establish bus corridors. Policy and plans are intended to influence one another, especially in relation to spatially reflecting aspirations, but it was found that certain rhetoric was not spatially reflective and created a challenge manifesting it in practice.

If polices are considered relatively weak, they are unlikely to be reflected locally. The Local Policies Plan, stage four of the local development plan process, was referred to as being key to active living opportunities as this is where key site requirements will be addressed. Yet, P5

described this stage as when they can start "*drawing lines on maps…[where] this number of hectares…is going to be zoned for economic development land, this is going to be zoned for housing.*" Hence, it is clear why some professionals expressed unrealistic expectations directed towards policy and more attention should be given to implementation, as the opportunities at the local level for active living are unlikely to be fulfilled. P6 admitted, the biggest opportunity to utilise health in planning is through the LDP, submitting that ultimately, it is up to the councillors if they want to pursue that or not.

8.3 The Built Environment

Active living environments have many characteristics (Table 2.1), however within the urban fabric of NI not all of the characteristics are given the same consideration in planning policy and decision-making. This section aligns the literary and empirical findings specifically in relation to the built environment and active living characteristics.

8.3.1 Active Travel: walking, cycling and car parking

All characteristics of active living are deeply explored within the literature; however, the empirical study did not have the same reflection. Due to an emphasis on the broader concept of sustainable development, focus has tended to be primarily placed on one component of active living; active travel. The participants tended to associate 'active travel' more within the health discussion as opposed to active living characteristics. Consequently, large portions of the interviews deliberated on walking, cycling and public transport. Whilst these are vital components of active living, without the other core components important associations regarding street design, neighbourhood scales and density were discussed less. This may have also resulted in some disassociation between car dominance and design characteristics and more emphasis on parking.

The impact car parking has on active living was mentioned in literature, but it was unexpected just how much NI professionals placed emphasis on its impact. Edwards and Tsourou (2006) claimed that car parking is a huge burden in urban areas, and this was agreed upon by all

participants who discussed the usage of private vehicles. Health in planning was so often discussed as a non-contentious issue, however when the discussion shifted to practical approaches, like reducing parking standards, the seemingly non-contentious domain of health and the built environment became contentious. Evidence that the pursuit of health objectives is more difficult than the inclusion or recognition of health objectives. There were, however, examples of projects which did fulfil health orientated objectives.

The Better Bedford Street project was offered as a good example of a project which reflected the objectives of the PfG and SPPS. The SDG helped drive this project forward, removing several parking spaces, albeit temporarily. Those involved expressed how difficult it was getting that approved as DfI did not seem comfortable removing parking spaces in fear of backlash, pandering towards taxi companies and business who thought that it would impact negatively on business (N4). The uncertainty with removing a small amount of on-street parking was juxtaposed with large multi-storey carparking facilities which where concurrently being erected in other parts of the city. N3 shared an experience of their inability to obtain planning permission from the DfI to install a bicycle rack outside of their office due to it resulting in the removal of two inner city parking spaces. What emerges from this is the difference between professional and governmental rhetoric, and the actions they are prepared to take to achieve what is expressed in policy, programmes and guidance. The road user's hierarchy (referred to by N4) for example, where pedestrians are citied as to be prioritised over vehicles was described as a "*notional idea*" that is "*essentially nonsense*", and that in reality it is completely inverted. This demonstrated how the health agenda is portrayed as non-contentious but when delivering outcomes requires a rethink of car parking, the opposite occurs. It becomes incredibly contentious, with fear of lobbying, political criticism and overall public perception. Many professionals interviewed did not share the view that removing parking would be disastrous but rather shared the view that the overall government departments and politicians had this stance. This concurs with Haughton and Counsell's (2004) implication that some decision-making and perspectives are driven, whilst others are

diluted and marginalised. Evidently, not all professionals share the same opinion on car parking yet the opinions advocating for car parking reductions are seemingly disregarded.

In practice, A6 suggested that planners "*cherry pick*" what they deem important and admitted that nothing associated to active living has ever been imposed on them, potentially exposing how decisions are being directed by engrained "*path dependant"* culture rather than policy. As a result, A6 was not able to levy anything on a developer who may not have any interest in healthier design characteristics. It is evident that certain regulations are more enforced than others, most likely facilitated through traditional cultural practices. If the root to this cultural practice of planners focusing on only a small portion of specific regulations can be found, it could help towards embedding a healthier style of planning by uprooting deep seated traditional practices. A6 elaborated that in their experience bicycle racks were proposed with each house in a residential development yet removed after planning permission and bigger driveways were built instead. Implications were made here regarding the lack of monitoring after the planning process on a proposal to ensure that the development is delivering precisely what was agreed upon.

The observation carried out in Stranmillis 1 brought attention to the prospect of having separate pedestrian infrastructure. In this case, the pedestrian route seemed solely recreational as it did not lead to services or amenities, but it highlighted an opportunity, to rethink pedestrian infrastructure, shifting away from roadside walking or at the very least implementing mandatory buffers between the road and pedestrians, a concept which is well established within active living literature (e.g. Jackson, 2001). Roads have also been associated with the lack of appeal for pedestrians. Chapter Two highlighted how roads can encourage high speeds and feelings of danger for pedestrians walking alongside. Ellis *et al* (2013), using the Real Walkable Network (RWN), demonstrated that walking also involves road crossings, shared spaces, bridges and not simply road footpaths. Davis and Parkin (2015) mentioned how engineers are essentially given free rein to maximise speed and

capacity of the private car. When discussing corner gradients with E1 they admitted that they viewed corner gradients from the perspective of being convenient for cars confirming the lack of an active living perspective. Having a mindset shift to provide walking opportunities other than roadside could facilitate and encourage more walking but could be difficult to achieve in practice. Edwards and Tsourou (2006) firmly expressed the need to create a comprehensive travel plan for walking and cycling and the interviews alluded to the Active Travel (Wales) Act 2013 which specifically addresses routes for walkers and cyclists.

Many cities are beginning to shift their mobility towards pedestrianisation and investing in cycling infrastructure, restricting parking and increases to public transport provision, such as Copenhagen (Nieuwenhuijsen and Khreis, 2016). However, the empirical research revealed that NI has a deep-rooted car culture which filters through to all individuals, professional, government and society. Together with a monopolised public transport system, a car dominated urban form and the cultural mindset of a society which is largely unwilling to give up using a private car, a shift to active travel was considered an insurmountable task. Parking could be taxed heavily, public transport made more affordable, inner cities be pedestrianised and comprehensive walking and cycling plans for residential developments (BMA, 2012). In Northern Ireland, this is demonstrably difficult in practice. Better Bedford Street demonstrated a positive trial in implementing active living conditions however, temporarily removing parking spaces from a street in a city centre is unlikely to increase or encourage more daily physical activity in the long-term, rather there is a need to address the areas which are unconnected and to stop future developments from being unconnected by ensuring they support active living principles. Therefore, existing built environments are incredibly difficult to retrospectively change. A rethink of how the built form facilities active living must occur if it is to be embedded within professional practices.

8.3.2 Rethinking the Built Environment: The red line and retrospective development

The field observations corroborated the literature on how characteristics of residential development have changed, with older terrace style town houses accommodating active living more than the contemporary suburban sprawl style development (Barton, 2015; Frumkin *et al,* 2004). Overtime, residential development has shifted to accommodate vehicles rather than people. It is then necessary to rethink the built environment once more, to shift back towards the facilitation of pedestrian movement, yet there are difficulties in implementing a new approach. P10 referred to the difficulties in addressing the concern of fast food outlets and provided an experience of a politician who requested that there should not be as many available. However, they had to explain that little can be done to those that are already located within cities and towns. Similarly, once roads and housing schemes are developed there is little that can be done to retrospectively incorporate active living features. How can developers begin to incorporate the style of older housing developments which accommodate for active living? Creating Places (2000) emphasises that inner city houses should resemble higher densities, giving an example of terrace housing, and that inner-city housing should not reinforce a more suburban setting, completely in support to the conclusions of the field observations. Yet, the newer developments which are similar distances outside of Belfast city centre to the older developments, resemble those of an urban sprawl setting.

In general, planning policies' intention towards the creation of good places is evident but as this gets filtered down into practice and into implementation it appears to become incredibly diluted, watered down through planning negotiations and costs. The result is residential developments, squares and public realm being located in relative proximity yet not connected, which is crucial in the promotion of active living (Conisbee, 2017; Jackson, 2001). Routes to different places within neighbourhood areas should be looked at as pedestrian routes, not car routes and which are easily accessed by walking or cycling. N3 purported that the new Transport Hub proposed for Belfast would have been a perfect way to implement such

concepts and to link the Hub with the universities but that it failed in doing so during the initial discussions. They expressed that the conversations surrounding the proposal were firmly rooted in vehicular movement and not the movement of people. With the so called “red line of planning” (N3) little context is given to the surrounding area, and it has been referred to as a huge challenge in Northern Ireland. What is happening currently is that the red line becomes a tangible boundary and residential developments are being built beside one another, even beside retail parks, with little or no connection to them besides using a private car. The biggest challenge in NI is changing the geometry of the built environment from the car to people (N2).

There is an abundance of evidence which proves that active living consideration contributes to healthier societies, yet it remains unpopular (Bahadure and Kotharkar, 2015; Duncan *et al*, 2010; Frumkin *et al,* 2004; Anderson, 2011). This may infer that it needs to take a different direction. The research has demonstrated how planning, and the processes of the built environment are highly political, and that politics usually prioritises the economy over everything else. Therefore, to instigate real built environment changes perhaps active living should not be framed around health but rather how it benefits the economy, and by-proxy improving health. This highlights the complexity even in analysis, with many problems in implementing active living relating to the lack of emphasis placed on the all-encompassing advantages of the concept and that these are not imposed. Being framed not to improve health but the benefits to the economy may help drive active living forward. The literature overall and the interviews subsumed the built environment around economic growth and politics, and therefore as opposed to aiming for a radical change and shift towards health, health could be driven in regard to economic growth and politics. This could make it easier to popularise health and active living being embedded into practice and is achievable given the amount of evidence justifying active living principles.

Two additional thoughts which could be developed with further research were brought to light by H2 and P6 respectively, who recommended a need to reconsider the high street, with a

potential shift from retail to residential, and greater integration between health and education in schools, getting children to understand basic health concerns from an early age. H2 had strong suspicions that built environment professionals will soon have to rethink the functionality of the traditional high street due to how online retail, banking, groceries are removing the functions of the town centres (Savitch, 2003). In Northern Ireland, main streets have been forgotten, village squares are now empty car parks and the petrol stations now being the community hub (PLACE, 2012). Therefore, the high street may once again provide opportunity for residential usage, rethinking sprawling development and bringing people back into town centres.

8.3.3 Field Observations and Statistical Analysis

The field observations found that, from an active living perspective, deprived areas in health and multiple deprivation tended to facilitate greater (or had greater potential to facilitate) active living. This was due to grid-like design, proximity to amenities, and residential density. However, they scored much lower in terms of quality, aesthetics and the condition of the built environment. In essence, the most deprived areas were objectively more similar to a traditional neighbourhood and active living environments, with the least deprived areas more akin to suburban sprawl, even though they were a similar distance away from the city centre. Consequently, whilst more deprived areas tend to have increased obesity rates, physical activity and poor health, in this case they facilitate active living better and potentially further research on physical activity levels in areas of high and low deprivation could be insightful asking the question why are those living in more deprived areas unhealthier and more obese in an environment which facilitates daily activity? Jackson (2001) stated how the immediate environment is one of the most important determinants of physical activity and Black and Macinko (2008) reported how neighbourhood characteristics are consistently associated with reduced body weight (Table 2.1). Neighbourhood characteristics displayed within an area

suffering from urban decay could arguably impact on individual choice to utilise that environment.

Jackson (2001) explains how distinguishing accessibility and adjacency helps in identifying sprawl, where shopping centres may be divided by a physical barrier. What could a two-minute walk now requiring a vehicle, and low-density single land-use development with wide roads and excessive corner gradients. This describes Stormont and Stranmillis much more than the other observations. Conversely, connectivity (a strong proponent of an active living environment) increases when streets are laid out in grid patterns as there are fewer barriers and multiple routes to a single destination (Jin and White, 2012), also reflected strongly in walkability research in Belfast by Ellis *et al* (2016). The observations of opposing characteristics of sprawl and neighbourhood style design provided another perspective to the built environment, as subsequently what separated the two environments was aesthetical quality, a factor that also cannot be overlooked. Hence, why the observations recommended that the more pedestrian friendly style of New Lodge and Water Works would perhaps work much better if the quality of their environments were greater. This was also referenced by Drewnowski *et al* (2016) who stated that perceptions of areas, social connections, accessibility and physical activity can all be influenced by the design and quality of the built environment which is difficult to quantify.

The literature also predicted associations found during the observations as the first two observations were urban forms that were much older than the latter two. Barton (2015) gathered that from a planning perspective it is noticeable that travelling by foot has given way to the car, which is being provided by built environment decisions, and consequently, unhealthy built environments are being built into the urban fabric. This explains why the Water Works and New Lodge are more associated with active living environments, as they were built when cars where not as popular as they are today, and contrastingly why Stormont and Stranmillis have the design characteristics of sprawl, built around a time when the private car

was engrained into society. Again, it must be acknowledged that Creating Places addresses this and recommended terrace housing for new inner-city housing, yet it does not seem to be delivered and was actually referred to endorse suburban development (A4).

The statistics for obesity and physical activity in NI ill-represented NI in its entirety. When a statistic is being presented as the figure for Northern Ireland, with a sample size of 2,500 participants, it is obvious that this ill-represents the national level. This was the case for obesity, physical activity and active travel statistics and was also the justification for looking at Primary 1 and Year 8 statistics as these was carried out at the Local Government District scale. Therefore, the research accepts that broad statistics on active travel usage, physical activity and obesity may not genuinely reflect what is happening nationally but reflects the statistics and small sample sizes obtained by the government. Both the literature and the interviews expressed the areas suffering from high levels of deprivation are more commonly less healthy, obesity emerging as one of the most significant global health issues with lower socio-economic status areas most affected (Thaper and Rao, 2015). However, Townsend (2015) states that obesity rates are soaring in the newly established middle class. This raises major concerns that focus should not only be placed on one socioeconomic class and public health challenges must be addressed more holistically.

Therefore, to honestly address active living, there is a requirement for honest and more in-depth research and statistics on obesity in Northern Ireland, in order to properly validate and monitor the real trajectory of the epidemic. Assessing the built environment has had historically significant results (Grant, 2014), however statistically data must be more robust to spatially reflect and analyse the built environment regarding obesity and physical activity. Acquiring the knowledge and expertise from a range of built environment professionals went some way toward addressing this identified limitation and to facilitate triangulation of data.

8.4 Professional Perspectives

The professional perspectives of the interview participants demonstrated that professional cultures do indeed exist. With the overall acknowledgement of the link between health and the built environment, there is an underrepresentation in practice. Kent and Thompsons' (2012) assumptions that health has been buried deep, demoted to an 'invisible pursuit, diminishing its importance', is accurate in the context of Northern Ireland. Yet, the interview process demonstrated that professionals are certainly aware of the associations between health and the built environment. Benveniste (1989) surmised that planning theory is divided up between, normative planning (what should be done); 'in use' theory (theories derived from actual experience and practice) and; espoused theory (what planners say they are doing). This connects to the research deeply and helps to analyse and interpret the research findings. For example, normative planning rhetoric on the delivery of the core objective of the SPPS, to improve health and wellbeing, 'in use' theory that this is not being delivered, and espoused theory which implied health considerations have increased.

8.4.1 Social-Constructionism of Northern Ireland Built Environment Professionals

The research findings indicate that professional cultures exist and that professions broadly share certain values and ethos. Edwards and Tsourou (2008) similarly identified this during their work on healthy cities, stating how professions interpreted the 'healthy city' concept differently according to their interests, cultures and values. Steurer (2013) advised that varying values and cultures are deep-rooted behind practice. Yet, the idea that only one perspective, that of a professional culture, exists within the environment can be developed in support with the literature. Adopting the social constructionist logic, applied in the research framework, helps to uncover the multiple perspectives and rationalities at play across contemporary professional practices, both internal (from within) and external (outward). In doing so, the research found that a perspective hierarchy was evident which consisted of six tiers starting with broad over-arching perspectives and narrowing down to the individual

perspective. This is founded heavily on Naidoo and Wills (2008) who discussed how constructionism is open to multiple perspectives on how professionals perceive something within cultures with differing interests and priorities.

The introduction of the perspective hierarchy begins by considering the built environment process in its entirety. Here, there is a general external rationale noticeably present among professionals. This reinforced a socially constructed process regarding many professionals working within the same overall process, spawning from education, policy and practice. All participants shared a common understanding of achieving sustainable development which was exclusively accepted. The acceptance and conformity towards sustainability evidences clear cultured professions within the built environment.

The next level is distinguishing traits appeared to come from the public and private sectors. The obvious characteristics were that the private sectors were more candid, honest and critical when discussing the overall built environment process and their experiences. This is not trying to imply that the public sector participants were not honest, but they held back on certain responses and when asked their perspective, for example how practice then translates into product, referred to other professional positions who may be better equipped to answer. This also applied when questioned on a policy-practice gap. This reinforced a broader cultural perspective which aligns with the literature on governance, and the need for state and non-state actors to collaborate, as they will perceive things differently and will contribute another dimension on collaborative efforts. The public and private sector have two vastly differing objectives (confirmed by P4 who stated how public planners view themselves as civil servants first) and therefore it would be essential that these roles are acknowledged, respected and addressed in the effort to produce healthier active living environments.

The following tier consist of professional perspectives and is where overarching core values that every participant within a profession agreed upon came into play. For example, planners adopting the RTPI Code of Conduct, which every planner referred to regarding their

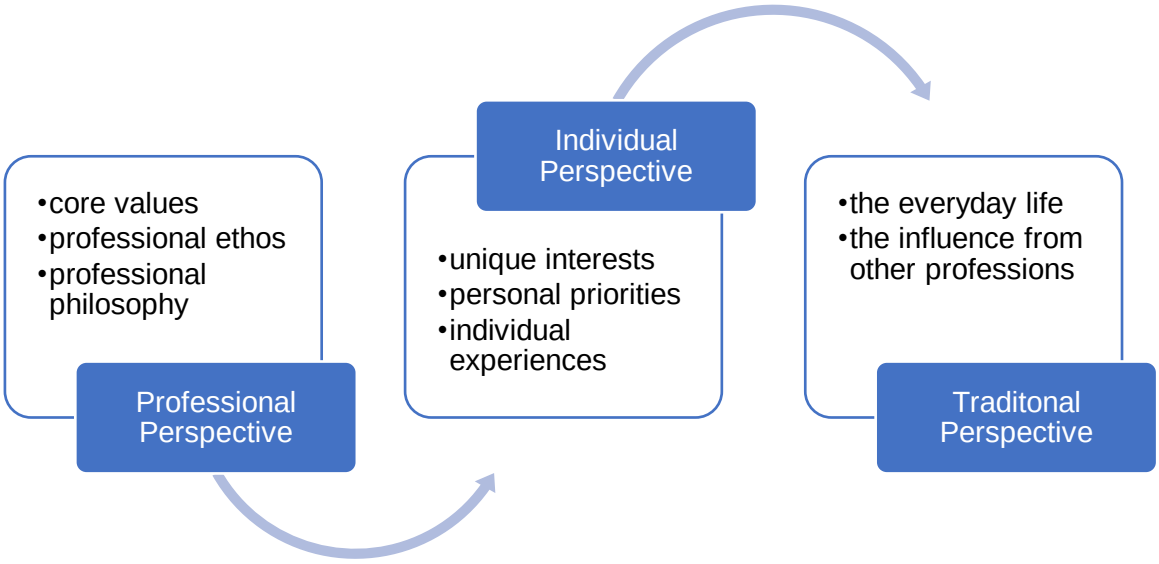
professional core values. Developers having the shared commonality of making a profit. Architects articulating the importance of going above and beyond meeting the client's brief. This professional commonality is the most evident expression of 'meaning' being derived from social interactions, being socially constructed and related heavily to the espoused theory of what professionals say they are doing. To reiterate, the social construction discussed here relates specially to the constructs within professional practice. This reflects on 'reality' as being constructed through social exchanges amongst various actors operating in particular social contexts (Quintana Vigola, 2015)

The next hierarchical perspective derived from an organisation, company or council. Here, different professionals work together but under the same shared core values or ethos of a specific company. For example, those working within government departments, have a clear and distinct philosophy or overarching framework. Also, planners from different councils may have different views and priorities (as articulated by the LDP teams), similarly to architects working in different firms (A6). This distinguishes them from competitors and was largely more extant in private sectors with architects and developers expressing how they are unique.

Following this, and admittedly more present within larger organisations, are teams working on specific projects, cross-cutting professions and sectors - sharing a specific and relatively smaller common goal, which could differ and even compete with other teams, evident within the LDP and CP teams where professionals involved have a clear goal. This can be both positive and negative, most notably exemplified within the discussion with BRT and LDP teams respectively. The tensions between spatial planning and community planning have already been discussed and positives from teamworking were evident within the BRT team. Engineers and sustainable transport professions were working closely together on the BRT project and most importantly sharing their experiences on how engineers' traditional practices were challenged and that it was of benefit. This was similar to Better Bedford Street with P10 claiming that engineers had to "*think outside the box*".

Lastly, the individual perspective is reflected, the core of all perspectives, reflecting more subjectively, and whilst this subjectivity may be socially constructed, it is argued that this perspective has not been socially constructed professionally. This is where the individual perspective can be distinguished from professional perspective when it is evident that the profession has not influenced this perspective. Here, professionals can disagree with the previous stances outlined and conflict with their own professional practices. Every participant shared this perspective, stating "*if it was up to me...*" or "*personally…*". As a consequence of these mixed perspectives, it raises the question how this then impacts on the delivery of active living. In order to develop this, it was recognised that the ranking and hierarchy of perspectives outlined above does not manifest itself in such order within practice. What was found amongst most professionals is that three main perspectives flow through their practices and processes (Figure 8.1).

Figure 8.1: The flow of perspectives in day-to-day practices



First, professionals hold strong recurring values and a common ethos concerning their profession this was mentioned first and foremost. Next, the individual response emerged, an impulse which may or may not come forward at all, perhaps only a thought, or indeed can be enacted and verbalised, during collaboration, consultations or informally. Then, ultimately

normalised cultured professional practice will ensue. To elaborate, a planner proudly reflecting the RTPI code of conduct (professional perspective), feeling strongly about health (individual perspective), followed by the actual outcome in practice (traditional perspective). Following this logic, professionals could regard health highly, reflecting this verbally but nothing actually manifests in practice, perhaps being subsequently superseded or, listened to but having no effect on the outcome. This was evident during the interview with the ABC council planners, who admitted to approving decisions that they were aware of being poor quality - individually perceived yet approved due to the broader professional traditions of general compliance. Also, with A6 in designing proposals which could have been better, yet simply accommodating the developers brief. How perspectives are shaped in practice, begin broad, then encounter a narrow individualist perspective, which is largely academic as decisions are then made from the broader professionally pragmatic perspective. Again, this is evident by P7 who admitted if they had their way, the city centre would be pedestrianised. The individual perspective is not necessarily right or wrong and perhaps why the inevitable traditional professional culture is practiced.

However, the individual can influence practice if they have enough power, which from the interviews seemed to be politicians, developers and others in senior positions. Councillors with such power have been commented on taking subjective approaches to decisions, which diminishes professional guidance, particularly if that guidance is health orientated and they are not driven by such an agenda. A4 who had certain visions on a proposal was told by the developer what they wanted so they had to succumb to a simpler architectural proposal, which often would not support active living. A6 also provided the example of councillors enacting their own political agendas on proposals, and E3 stated how the engineering "*hierarchy are old school*", which created one of the biggest challenges for them in changing those mindsets as they are so reluctant to change. In their experience, working on the BRT and collaborating with the sustainable transport group changed their mindset on engineering which demonstrated how effective collaborating can drive active living but ultimately they were not

convinced that civil engineers in general are shifting their practices to be more health orientated.

8.4.2 Collaboration

It is globally recognised that many different actors working together in collaboration is better to achieve larger goals. The literature suggested that collaboration is about dealing with collective concerns regardless of the intention, as professionals will have different reasons for similar actions (Michie, 2016; Thompson and McCue, 2015; Healey, 2006). The interviews validated this by the developers admitting that they would not choose something on the grounds of health but on the grounds of marketing that may happen to impact on health. The initial literary interpretations on collaboration focused on collaboration itself. SPAHG (Spatial Planning and Health Group 2011) identified that the short comings of collaboration are largely due the lack of understanding between professional cultures. Elzbakidze (2015) was correct in saying that it is vital the difficulties of collaboration are explored. During the analysis of the interviews and looking over the literature it became much clearer what the major difficulties were.

The literature revealed that, not only should leaders be more collaborative, they should act on behalf of wider interests and manifest collaboration into formal mechanisms (Sotarauta, 2016). Healey (2006) describes collaboration as intentional process which deals with matters of collective concern. Furthermore, collaborative governance was defined by being consensus-oriented and aims to make or implement public policy (Ansell and Gash, 2007). Evidently, the emphasis is not placed on collaboration itself, rather it is placed on action transpiring from collaboration. In addition, the quality of collaboration was discussed when health professionals stated that collaborative meetings were not suited to their profession, that their voice was lost and they felt their involvement was tokenistic. Tackling health concerns was cited as being trans-disciplinary and planning and public health silos only increase the difficulty in tackling such issues (Townsends *et al*, 2015).

This requires stronger commitment and leadership to empower both professionals and work towards common goals, inclusively. E1 elaborated, stating how collaborating for the sake of collaboration is also ineffective. What is required are outcomes and actions that derive from collaboration. This was found to categorically fall short. Almost all professionals acknowledged the difficulty in turning health-orientated rhetoric into reality. The TCPA (2016) specifically produced documents which explicitly tackle public health issues such as obesity through planning but such explicit documentation on active living is not found in an NI context. This again highlights the lack of association NI has between public health concerns such as physical activity and the built environment and potentially could be responsible for the limited strength in policy and practice.

Once discourse on active living commenced all participants were easily bought into the idea, especially if it could improve profits. Although, it was evident how everyday professional practice could impede the implementation of active living. The architects interviewed were quick to understand the concept but admitted that influencing physical activity is rarely considered in practice and deemed mostly irrelevant (A5). Developers agreed stating that if active living was required, they would reflect this during planning approval and if something is not required they do not consider it in their proposal (D4). Engineers were described as prioritising functionality and as civil engineers focus mostly on roads and bridges, it became clear through the interviews that their major concerns regarded the movement of freight and ensuring that traffic moves with convenience.

The perception others have regarding planning was not necessarily criticism, but rather sympathy, acknowledging that they are unlikely to appease everyone. The mediation of planning inevitably results in at least one unhappy actor. The study found recurring characteristics which planners are perceived to culturally harbour, being overly passive or conservative. This could be a result of the profession suffering from undertrained staff and under-resourcing and additionally other professions recognising that their decision is not final,

and that politicians and other powerful actors may not listen to a planner's recommendations. Again, this emphasises the existence of cross-professional tensions within the built environment. The literature expressed how creating a unified front can help achieve a common goal (Gleeson and Rozo, 2013). Once a common goal is achieved, teams should be made aware of the objective and how they can individually be involved. And how a well-established goal with those involved held accountable to a specific task aallows collaboration to thrive. In the case of NI, collaboration was occurring but was not thriving or producing strong results.

Yet, the projects explored throughout this research in Northern Ireland should still be viewed, and were by some, as progress. To draw lessons, learn and make progress in delivering active living there is a need to test certain approaches (N1). The projects and initiatives mentioned throughout the interviews were testament of this. What BRT and Bedford Street provide is a learning curve that can be used for future projects. Many professionals addressed that both projects are completely divergent from traditional cultures. They were certainly more cautious and conservative according to some participants, but it should be viewed as a positive. Different professional cultures were accepted, collaborated and achieved a common goal of delivering a project which was outside traditional remits (P10). The projects and initiatives demonstrated the effective translation of outcomes presented in the PfG and have been delivered as an effective product (E1). With the nature of the political environment and the engrained traditional perspectives, it is believed that these projects could provide significant lessons for future projects and for driving active living principles.

8.4.3 Active Living: enabling and disabling practices and perceptions

Active living is generally not a term used in practice, but it is one that was understood by participants. Perspectives on active living demonstrated a commonality, a shared viewpoint on the importance of active living, the benefits of active living and ways of implementing it. Although the overall consensus was that active living is not embedded or prioritised in policy

and practice, some principles are carried out, although often not under the guise of health. For example, encouraging people to walk, cycle and use public transport was often associated with lowering fuel emissions and improving air quality.

The research found that, although all participants recognised the role of the built environment and active living, there was an underlining stance that it is down to the individual whether they are active or not. This raised concerns as this stance appeared pessimistic and defeatist in attitude towards the built environment and active living. Health and active living need to become “popularised” within planning (A2) and “mainstreamed” (N4). This resonates with what Kent and Thompson (2012) alluded to, that the known positive relationships between health and planning have been deemed inadequate to prompt any real change, and that the concept must be presented differently in order to lobby for change. Attempting to frame it outside of health, as an economic driver, as planners are now typically focused on driving the economy could provide more impetus. The attitude should be that, whilst it is true that choices are ultimately down to an individual, built environment professionals should do all they can to enable and encourage active living. They can then be satisfied and proud, knowing that at least they have professionally contributed to healthier communities which are more active, through careful, thought out design and spatial considerations. The defeatist attitude, although ill-advised, is somewhat understandable when there seem to be so many variables that are stacked up against health being driven and embedded within practice. Professionals may not want the additional responsibility of trying to improve health as well as all the other responsibilities. However, by tackling health, the economy can be positively affected, so too can the environment and society as though health is the epicentre of the sustainable development paradigm and this should be engrained within professional cultures.

Professional participants suggested that citizens do not want certain built form characteristics that have been proven to improve quality of life. There was enough evidence to suggest that the public have different perspectives on good quality environments compared to those who

are familiar with active living. This highlights the importance of defining the public's interest, as this may not necessarily mean to pander to their wants, as they may not be aware of the determinants between health and built environments. Participants claimed the strong societal cultural elements that are at play, the demand of cheaper peripheral housing, in semi or detached style, private gardens, driveways, the complete lack of demand for living in apartments, city living, public transport usage and car culture. Car culture in Northern Ireland is incredibly powerful and the road infrastructure supports this. D2, who had previously worked in politics, explained how politicians want to do make their constituents happy so to be re-elected, and therefore listen to them when they want or perhaps do not want a proposal built. One resolution is to educate the public so as they lobby politicians which then could influence planning decisions. However, how to carry out such education is unknown, which raises the question of how a societal cultural mindset can be changed and who would be responsible for doing so, if anyone at all.

The literature highlighted how perceptions and practices can unconsciously accommodate for certain housing preferences, for example, suburban low-density housing supplemented with poorly thought out cities, regardless of the conceptual support of active living (Pagliarin, 2018). Therefore, the difficulty in achieving a shift towards health, or active living becoming prioritised is due to the conflicting interests across the entire process. Steurer (2013) addresses such conflicts with regards to multi-level governance and; hard and soft regulations. Whilst this was similar to the case research, even more conflicting interests were apparent. Gilroy and Tewdwr-Jones (2015) declared how each sector is becoming ever more comfortable with their specific, separate responsibilities. What this research defines as traditional professional cultures. It was argued within the literature that the deep-seated embedded professional cultures impede collaborative governance because traditional practices constrain the propensity for radical transformation (Hall, 2009; Bloor and Dawson, 1994; Greed, 1998), almost regardless of what individual professionals believe to be right. Considering this the sentiments of Allmendinger and Haughton (2010) also resonated in terms of the necessity to

harness ‘specific actors’ as well as groups within collaborative governance. Northern Ireland’s SDG may have been just this, harnessing specific individuals within the built environment process. Although this group was instrumental in delivery Living Places it was expressed that the document had failed to be effectively driven it and that it did not have the impact that it hoped. Yet, if this group could gain momentum, investment and political backing it could prove invaluable. What this discussion is providing is the looming reality which N4 referred to, that it still depends very much on the individual to instigate radical change. They expressed how much time they have spent in ensuring strategic documents have major commitments in them, but without a powerful individual to drive them the difficulty is turning those documents into a reality.

Within the urban governance of the built environment there are socially constructed cultures visible within professional cores values. This ranges from what one perceived purely based on their professional background to what the individual believed to be right and wrong outside of their professional practice. The conflictions between individual and professional perspectives, what an individual believes to be right and what their profession has always traditionally done, could result in the inability to change the status quo of professional practice, depending on the influence the individual perspectives have. Elbakidze *et al* (2015) presented the importance of exploring the difficulties of collaboration head on, and in Northern Ireland it is obtaining effective and deliberate outcomes in delivering active living.

8.5 Urban Governance and Active Living in Northern Ireland

The final section of this discussion and analysis directs back to the initial goal of The Ottawa Charter for Health Promotion: to put health higher on social, economic and political agendas. It has been well established throughout just how political the planning process is, and with that urban governance (Vangen *et al*, 2014; Adams and Watkins, 2014; Tewdwr-Jones, 2012; Pennington, 2000). Chapter Four uncovered how there has been a shift from government to governance throughout the UK which advocates for multi-level collaboration between all those

involved within the development process, both state and non-state actors. This results in many actors who are all intrinsically involved within a process deep-rooted in politics. This section will first discuss governance and leadership, then the role of planning and politics, and finally, the findings relating to those without power and leadership but who are just as important to the overall health agenda.

8.5.1 Governance vs Leadership

Governance distinguishes and separates itself from collaboration, as governance recognises the importance of the individual (Vangen *et al*, 2014). It is the processes and action of individuals who can influence and enact the agenda of collaboration to deliver outcomes. Leadership requires individuals who use their ability to direct actors within governance structures, which Sotarauta (2016) states through acknowledgement and respect, although, in practice it was evident that leadership has its impact on outcomes through power.

Individuals in leadership roles act as a catalyst for change alongside individuals who enact effective influence on collaborative outcomes through urban governance. The research found that power was more evident regarding outcomes than Sotarauta's (2016) belief in acknowledgement and respect. Yet, this does not mean to infer that power is a negative. Rather, without powerful leaders, processes can result in a vast amount of inclusion with equal amounts of confusion and without a designated lead, concerns regarding accountability can arise which corresponds to the interview findings (Bell and Stockdale, 2016). For example, when asking planners how health has then manifested in implementation, they suggested that they are not the most suitable people for the response, P2 stated that they do not carry out a monitoring exercise. Architects affirmed that they are simply trying to meet the developers' brief, and if a brief does not incorporate health or active living considerations then they are not obligated to. In addition, developers stated that once they have built their development, they move onto the next project and therefore it is then up to others to maintain that area. This suggests that they may not fully consider long-term built environment impacts. Hence, it can

be argued that leadership principles are a fundamental determinant of how effectively policy is conceived of, resourced and operationalised (Collinge and Gibney, 2010: 388). In the context of the increasing socioeconomic complexities and the delivery of active living environments this leadership is more significant in the long term.

P5 stated that even if they considered and implemented active living within planning applications, people may not necessarily utilise it in the intended manner. However, this should not be conflated with implementing active living principles being less important. In order to obtain outcomes, individuals in power and those throughout urban governance must try and take some accountability and responsibility for deep-rooted and socially complex problems. This appears to be a great challenge for active living, as within the governance dynamic it is unclear who takes ownership of this concept and how it manifests into formal mechanisms. This is illustrated by the fact that both the professionals interviewed, and the existing literature acknowledged that active living does not fit neatly into policy and processes and as a result impacts scientifically on the promotion and contribution of active living outcomes. If health is broadly supported through policy; what is the key leadership battle that prevents this support from being implemented to its full potential? The answer, like all other answers regarding wicked problems, is not one which is simply defined but rather, multiple variables can be discussed.

8.5.2 Planners and Politics

Edwards and Tsouros (2008) believes planners can become champions of active living, advocating for the principles embedded within HUP concepts, but they must take a leadership role in doing so. Macmillian and Tampoe (2000) outlined two types of leadership roles, a more charismatic 'hearts and minds' style and a more transactional 'task forced' style. P10 referred to the term "*hearts and minds*" and stated how this mindset recognises that planning is not black and white but is highly politicised and subjective. P10 elaborated that this term, "*hearts and minds*", was about getting people onto the active living agenda concluding "*everybody,*

particularly politicians". Other professionals used rhetoric related to planning such as "*mediate*", and how more focus should be given to the "*softer side*" of planning (H2). This seemed to be a root to the conflict of leadership. Planners can be undermined by those in more power, such as politicians and they cannot provide a significant leadership role in bigger projects. The questions arised, are planners more passive due to political power or are they more passive in nature and therefore politicians can exploit their power? This is unknown. However, it was evident that planners are moving towards "*guiding*" others within the development process, a deliberate intention to be less prescriptive, and a move away from the more structured development control (P2). Yet, stringent parameters are necessary otherwise ad hoc governance occurs (Tewdwr-Jones, 2012). Leadership challenges faced within planning are often through regulatory restrictions rather than problem solving and P2 agreed by stating how "*the best things are done from collective will, rather than imposed*". This provided a contentious issue and one where there was little consensus, notably by D4 who stated that if planners don't enforce it, they don't consider it.

Participants believed that in order for planners to implement active living they require more power so that they can provide more leadership (P7; P4; D3; H5; A2). Studies have shown that cultural change with planning has occurred over time through leadership. For example, the work and ideas of Ebeneezer Howard and Patrick Geddes as outlined in Chapter Two were instrumental changes to the conditions of urban living that were achieved through planning. However, it is argued that planners have become too timid (P4), or perhaps too comfortable in their everyday roles to radically change current practice. To implement active living within practice it is evident how formal leadership roles lie outside traditional 'comfort zones' of practice. The irony is that a radical change in practice would see planning reverting back to its roots planted by the pioneers of Howard and Geddes. Even the generative fundamentals of the rhetoric around producing fairer societies and engendering sustainability can seem contradictory due to the contrasting drivers on competitive economies and continuing urban sprawl. Hence, it can be argued that leadership principles are a fundamental

determinant of how effectively policy is conceived of, resourced and operationalised (Collinge and Gibney, 2010: 388).

The aim of the European Healthy Cities Network (EHCN) was to put health high on social, economic and political agendas. Whilst this research found that it has been placed on agendas it is not being reflected in practice. Generally, the interview rhetoric began positively until it turned to address health concerns with practical outcomes, the discussion turning ever more desperate. Planners do not necessarily come from a planning academic background; therefore, many planners may not be aware of planning theory compared to an engineer's academic background and their profession. This may impact on the accountability and identity issues. Yet architects also come from many academic backgrounds and they are considered to be effective leaders in the development process which suggests that it could be how these professionals are being trained.

What the literature expressed explicitly was how health and associated issues are considered as secondary issues, and regardless of what policy contains. All participants agreed that this was indeed the situation in Northern Ireland. Actual accounts were given regarding the BRT system, politicians backing the taxi lobby to give them access to public transport lanes even after advice from professionals expressed that this could be at the expense of the new systems' functionality. The politicians eventually conceded; however, this was only due to larger problems amongst politicians directing their attention to the Arc21 incinerator. This demonstrates how attention can be (and is) displaced depending on the 'issue of the day'. The professional who presented these experiences did not seem confident that this issue had been resolved, merely parked for the meantime, concerning them and the future of the BRT. This opens up significant dialogue concerning political support and political leadership. Why would politicians, who within their PfG support active travel, lobby for taxis which could impede on a transport system which actively complements their intentions. Nevertheless, it contradicts what they have claimed to support, modernising public transport, making it more

viable and delivering the BRT, but instead they seemed to lean towards making taxis more viable.

It must be reaffirmed that during the time of research Northern Ireland did not have a functioning Executive and Stormont had figuratively collapsed. Whilst the impact this has had on a practical level has been investigated, it also provides a solid demonstration of the overall political leadership situation in Northern Ireland. Political unrest is historically engrained within the country, even after the Troubles with Northern Ireland having been reverted to Direct Rule several times. There was an unnecessarily long time period to undertake the RPA, due to political boundary issues and now, although not reverted back to Direct Rule, the government has been inactive for almost three years (as of Summer 2019). With this in mind, who should really be the leaders driving the health agenda, when Northern Ireland's political context is constantly distracted by perpetual sectarian political stalemate?

E3's comments resonate here, that they believe that the Permanent Secretaries need to show more leadership in dictating the PfG, inferring that they currently do not. In addition, there were many comments made regarding developers; themselves admitting the undermining power planners have due to politics, and others claiming that developers themselves have significant power in Northern Ireland. These two factors together, are arguably the greatest hindrances to active living being embedded within practice, and why no radical change will occur, an impotent political climate (P4) and the pressure from developers (A4).

The political landscape also left planning professionals erring on the side of caution due to the potential of Judicial Review, when their Permanent Secretary's decision was undermined surrounding the Arc21 incinerator. The literature's depiction of the planning process being full of political tensions is apt in the context of Northern Ireland. Pennington (2000) discussed how powerful lobbies can often exploit planning decisions which was found in this case, and due to this the planning process can be prone to controversy (Adams and Watkins, 2014). Planning objectives concerning health are difficult to pursue when aspects of transport,

housing, health, and regeneration do not coincide with one another and too much emphasis is placed on short term economic and political gain being a key initial step (PHAC, 2008). This correlated with the research deeply.

Participants believed that there will be no radical change in the governance of Northern Ireland, progress relentlessly being hindered by political issues. Health is generally tokenistic, and the most vivid threat is that the development process will remain as is. Whilst the political situation may not provide much hope, it could result in the local level taking on the leadership required. The Connswater Greenway initiative demonstrated how a bottom-up approach can be effective. The community expressed their needs and developed a successful greenway which ignited interest in greenways throughout Northern Ireland. The question can then be raised whether or not major change originates from bottom-up or top-down approaches. Communities can have a loud voice, as politicians often want to reflect what they say in order for re-election, however it has been established that they may not necessarily know what is in their best interests in relation to urban planning principles. If the public were more aware of how the built environment can impact on physical activity this could drive politicians to act in response which could be enacted during community consultation stages. E1 discussed how projects like Connswater provided a great example of a bottom-up approach and also how the PfG has a top-down approach, concluding that although it is aspirational, the two can meet in the middle and something can actually be done. This demonstrates the importance of both approaches, and not to rely on one.

8.5.3 Actors in Urban Governance Without 'Power'

Vangen *et al* (2014) discussed how leadership is rarely enacted by individuals not within formal authority and as a result 'key actors' should be incorporated, explained as leaders without legitimate power to lead and steer collaboration towards agreed outcomes. Papas *et al* (2007) informed that research into urban governance and public health issues is relatively recent and changes can take considerable time. In this case, it can be ascertained that the 'key actors'

are those part of the non-government organisation, coded as ‘N’ throughout the empirical work. This infers that ‘N’, although being key to the process, perhaps lack the power required to pursue health agendas. Conceptually, acknowledging an individual or organisation who hold no formal authority as a ‘key actor’ in the endeavour to provide them with more power within governance proceedings is a good idea. It is recognised that Belfast Healthy Cities (BHC) did indeed help in the achievement of the inclusion of ‘wellbeing’ in the SPPS. This also provides encouragement as it demonstrates a willingness from the departments to actively incorporate health objectives yet, it is not clear that this is manifested in practice. This highlights the limits of their power and remit. BHC also are the only significant influencer of Healthy Urban Planning (HUP) in Northern Ireland and again, how they manage to manifest this into actual outcomes is unclear, as their role as a key actor is more advisory and they discussed how they pass on their work to departments to enact.

Relating to Martens (2007), one could perhaps invoke the unfortunate circumstances of weaker actors struggling to achieve their goals within large governance networks – even sacrificing their values in an effort to be represented. Within the urban governance of Northern Ireland, in this case, it is clear that those who hold the most power, and because of this, the most leadership are developers and politicians. These positions appear to have the most influence of decisions regarding the built environment. This does not mean to infer that ‘N’ do not have influence on decision-making and on developments, schemes and proposals. However, if active living is to become more embedded into the practices of built environment professions, they may lack the necessary power and leadership to shift traditional practices.

8.6 Conclusions

The research findings show that some interview questions have a clear and concise answer, whilst others are more nuanced and complex. The research findings reveal how professionals have varying perspectives on issues, with sometimes polarising views. This demonstrated the

interpretative processes which occur, not only between professions, but between professional and individual behaviours. The research evidenced perspectives which derived from 287

professional encounters, symbolic interactionism, but also the perspectives from outside the traditional professional mindset. The study regularly found that traditional practices superseded the views and values of an individual, particularly with regards to everyday practice. It also identified that the importance of having an individual in driving certain agendas is paramount, but those individuals are not found or represented across the built environment process, rather more often from powerful lobbies, developers and politicians. The government and the planning profession in Northern Ireland have attempted to address health, through policy and also in recent projects. Although this research has found that it lacks support, popularity and is framed within the 'aspirational'.

Furthermore, built environments historically accommodate active living, and contemporarily hinder it. Yet, there is hope. It is still early in NI to assess progress surrounding the built environment, due to the SPPS only being produced in 2012 and the opportunities implied towards to LDPs are not enacted until 2022. Local developments plans offer a lot of opportunity in delivering active living environments according to participants, and initiatives such as Better Bedford Street, whilst not as progressive as some may have suggested, show promising signs that the PfG objectives can be delivered and that professionals are at the very least attempting to try more progressive approaches. BRT also demonstrated how cross-professional collaboration resulted in engineers thinking differently from their traditional practices. The caveat is that it is all encapsulated within an inadequate political system, bolstering the perpetuality of the status quo within the development process.

Chapter Nine: Conclusions

9.1 Introduction

Recent decades have witnessed a concerted effort from the field of urban planning to reunite with health in response to the rapidly changing built environment and an emphasis was placed on physical environments to support health promotion. Active living emerged as a core concept in the WHO EHCN and within HUP and focused on how the built environment can encourage physical activity. This research has demonstrated that there are opportunities to increase the promotion of active living outcomes in Northern Ireland but there are a number of challenges which need to be overcome. Policy has shown promising signs by including health objectives and being well represented at all levels of government, yet health generally is not being considered within professional practices of the built environment. Moreover, through a critique on planning policies and local development plans the concept of active living was not present and the under-representation of active living was also present in practice which was drawn out from the participant interviews. In addition, observations undertaken across Belfast demonstrated that by assessing the built environment specifically on active living, it was evident how the urban form can facilitate or hinder active living, emphasising how the active living concept can be spatially reflected. Whilst there was acceptance from built environment professionals on the importance of active living conceptually, contentious issues surrounded active living outcomes (such as reducing parking standards) that were considered to be too radical to be embedded into practice. Additional insight was gained on embedded cultural practices, individual perspectives and influences from powerful stakeholders in promoting and implementing active living outcomes. Such values and beliefs having a contribution, both positive and negative, in the promotion of active living outcomes.

This chapter concludes the empirical study undertaken into the delivery of active living outcomes. It ties together the principal findings and conclusions emanating from the research. Attention will be given specifically to revisit the aims and objectives identified in Chapter One.

Subsequently, Section 9.2 will return to the research aim and objectives, addressing the theoretical underpinnings of the research, the advantages of the chosen methodology and the overall empirical conclusions. Section 9.3 will succinctly provide the contribution of this research to the development of theoretical knowledge before outlining certain recommendations and future research in Section 9.4. The chapter will conclude with final remarks in Section 9.5.

9.2 Critical Reflections: Aligning Policy, Product, Practices and Processes

The origin of this study began by establishing a link between health and the built environment. Public health concerns were identified such as the physical activity and obesity epidemics and urban planning, a built environment profession, was found to have an intrinsic association to influence these issues (Townsend, 2015; Barton and Grant, 2006). It has been recognised that built environments can influence healthier decision making by encouraging physical activity, or conversely influence unhealthier decision making by hindering physical activity (Swinburn *et al,* 1999). HUP was then acknowledged as a core proponent of linking together health and the built environment, however this concept was broad and covered many of the attributes articulated in the determinants of health diagram (Figure 1.1). Through HUP and the EHCN, the concept of active living emerged which specifically facilitates a way of life which integrates passive exercise into daily routines by spatially reflecting specific design characteristics within the built environment (Table 2.1).

Through the review of existing literature, the research acknowledged how the concept of active living is vital to addressing physical inactivity. However, it was recognised that the health agenda, and active living alongside it, has not resonated with built environment professionals compared to sustainable development. Consequently, the research aimed to critically investigate the contribution of planning policies and professional practices regarding the promotion of active living in NI. The literature review also supported the research's need to focus on the collaborative effort to tackle complex societal issues and collective concerns such

as active living and identified research gaps in policy and practice (Michie, 2016; Addison, 2015; Thompson and McCue, 2015). The importance of exploring the challenges into the multi-professional arena of collaboration was emphasised as each profession will have different values, beliefs and behaviours (Elbakidze *et al*, 2015; Alvesson and Sveningsson, 2008). The research undertaken provided valuable contributions which uncovered these values and beliefs in relation to active living research by identifying the provenance of active living in planning policy, implementing active living assessments and the perspectives professionals have on the active living concept.

The exploration into the relationship between active living and HUP uncovered the role and responsibility professionals have in contributing to physical activity levels whilst further acknowledging that planning alone cannot facilitate this. This was initially demonstrated within the definitions of 'public health' and 'active living' which highlighted the necessity of organised efforts between planners, architects and other professionals to build environments which encourage physical activity (Lefebvre, 2014; Winslow, 1920). Further literary explorations on the professional aspect to active living delivery raised several questions and concerns. The effectiveness of urban governance (how government and stakeholders decide to plan, finance and manage urban areas (Slack and Cote, 2014)), caused concern due to the development process having many vested interests with many differing, sometimes competing, values. Such values influenced how policy was interpreted, shaped the power dynamics between professionals and their decisions, and ultimately shaped the built environment product. The various value frames examined in this research helped to better understand contemporary professional cultures across the built environment sector, listed by Lefebvre (2014). Thus, the review of existing literature demonstrated how the multitude of perspectives, consisting of differing levels of power, influence and leadership, identified a research gap on the impact these perspectives may have on the delivery of active living (objective one).

In theme with Lefebvre's (2014) emphasis on professionals, there was a need to explore collaboration and to go beyond the remit of the blinkered vision on individual professional sectors and to consider that different professions may interpret active living differently (Elbakidze *et al*, 2015). Consequently, a social constructionist epistemological paradigm lay the bedrock for the empirical study, a well-established position within planning research (Quintana Vigola, 2015; Burr, 2003; Greed, 2000). This proved crucial as it presented an interpretative methodology in symbolic interactionism where meaning is largely constructed through social interactions, and given the context of this research, specifically through professional social interactions. With this, three research methods were deployed, a policy critique (Policy); field observations (Product); and semi-structured interviews (Practices and Processes), which intended to address vastly different areas of active living. The research framework which the study adopted successfully catered for the empirical work. This validated and supported other planning practice research which used similar qualitative approaches (Van den Broeck, 2015; Silverman, 2016; du Toit, 2015).

It is important to reflect on the geographical context of the research, which was Northern Ireland, as this not only provided the professional domains in which the semi-structured interviews were carried out, but also the chosen field observations and the planning policy critiqued. In addition, to draw on external dynamics emerging elsewhere in the UK on advancing the delivery of active living environments, specifically in relation to developments in both policy and practice an English context was also incorporated within the empirical research. This was acknowledged to be only a brief insight to demonstrate that the research was not completely confined to one specific geographical context and that general consideration into other policy domains, at the very least, was addressed. A more in depth comparative approach could have been undertaken, however the surface of this part of the research reflected the detailed research of the NI context and was considered to be enough to bolster the research.

With the geographical context of Northern Ireland, the research could examine how NI planning policy directly addresses active living and how professionals perceive policy, in terms of how it is written, used and prioritised. Through policy, development has the potential to be controlled and the literature heavily suggested that comprehensive policy can result in the delivery of active living outcomes (Edwards and Tsouros, 2006). Yet, it relied on how that policy was interpreted, with different professions having conflicting views on how policy was utilised. In addition, how policy was perceived inevitably impacted on proceedings and eventually the delivery of plans and proposals. Planners and NGOs largely perceived policy to be reflective of active living principles, the inclusion of health and wellbeing being justified as an achievement by itself. Architects, developers and engineers perceived planning policy (particularly newer planning policy) as too non-prescriptive, flexible and easy to manipulate. The interviews with participants working on local plans also presented challenges with inter-department tensions, especially in the relation to the production of the LDPs. By critiquing policy this research has demonstrated that there is a lack of consensus between professionals on how policy should be written and how policy should be used. With perceptions on policy largely being associated with certain professionals, the research has also identified that there are professional cultures evident surrounding planning policy discourse and professional tensions (objective two).

Such tensions were found to be present throughout all participants with the general view that, professional relationships have improved since the RPA due to roads and planning working more closely together, but ultimately, they remain deep-seated. This seemed to be predominately expressed as manifesting from the older generation and the higher-level actors within the development process. Therefore, the empirical study exposed challenges within the configuration of the planning process and the constant battle between professionals and actors with significantly more power. The power discussed throughout was chiefly directed towards developers and politicians who have the ability to impose their beliefs on the process much more than other professions. As this study was purposely aimed at professionals, it was

acknowledged that the political nature of planning was an unavoidable topic throughout. This also reinforces that:

> Planning is a deeply politicised process, full of tensions and competing interests from within and beyond the profession - (Allmendinger and Haughton, 2010: 816)

Therefore, in order for active living to be delivered through policy, it is clear that policy should be more succinctly phrased to leave it less open to interpretation, as a participant described regarding the NPPF as having “too many coulds and shoulds”, which also resonates strongly with the SPPS. The research also found that the SPPS health objective was not being effectively implemented in practice. This has demonstrated that core regional planning objectives do not seem to be filtering down into practice, identifying a clear policy-practice gap. Therefore, simply including a health objective within policy does not equate to that objective being delivered, as certain aspects of health, such as physical health, are not being addressed directly. The research has reinforced the rhetoric in literature that health remains a secondary issue in the development process, it is not prioritised and is largely aspirational (Tsouros, 2015). This study has also found that the concept of active living, although generally understood and acknowledged, is not present in planning policy and is not clearly articulated with a strong coherent ‘voice’ within the circle of built environment professionals. Professionals often conflated active travel with active living; however, this is only one aspect of active living. Less emphasis was placed on the other design characteristics of active living (Table 2.1) such as scale and density. Yet, this identified the lack of capacity concerning active living whilst also reinforcing a critical concern professionals share regarding automobile focus in decision-making.

With this, increasing physical activity should be framed within active living, as this study has found that the importance of active living had universal consensus, conceptually non-contentious, amongst participants. However, the participants also acknowledged that not all professionals and politicians would be so open to the concept of active living. Professionals

in senior positions and also the older professionals were considered to be less open to the concept of active living due to the traditional professional culture being so engrained. This also applied to politicians but for a different reason of believing that the more radical approaches would displease the public. The participants perceived politicians to support the rhetoric of the health agenda yet be much more cautious on the delivery. For example, P4 stated how rhetorically no one would disagree with improving health until outcomes are aimed at such as reducing parking standards which was considered a highly contentious issue. The research verified that some professionals over others are more willing and prepared to be radical and contentious to achieve active living conditions in the built environment. However, the advocators of this approach do not currently seem to have the influence required to reflect this into practice. Having active living specifically articulated within policy and practice could help in its delivery and acceptance due to its spatial reflectiveness and specific design characteristics.

Key findings suggested that all policy related to the built environment should be spatially reflected making it easier to deliver. This resonates with the core principle of HUP to not only recognise health, but to pursue it within planning. It proved challenging to draw active living out of policy as it crosses over multiple policy domains and has been suggested to have resulted in active living lacking a place in policy, peppered throughout and without focus. Therefore, active living should not only be a planning concept but one that is recognised and understood by all those working within the development process. It was promising that health has been included within regional policy and how that has influenced local policy as a result. Many professionals placed a lot of emphasis on the LDPs and that they are key to delivering active living via policy due to them currently being in production. However, the underlying rhetoric was that it is unlikely that it will actually transpire.

As active living characteristics are spatially reflective it offers the ability to assess existing environments specifically on such characteristics. The benefit of the active living assessment

was the ability to critically observe the extent to which built environment attributes at a neighbourhood level promote active living. The literature and interviews associated poor health, and poor access to health to the built environment. Yet, statistics on deprivation demonstrated that SOAs within NI with poor access to health did not necessarily suffer from poor health. The field observations provided cross-case comparisons on two areas with high levels of deprivation and two areas of low deprivation and to critically observe their built environment attributes in Belfast (objective three). This clearly evidenced a cultural shift in practice as older developments characteristics responded better to active living environments (ALE) compared to the newer developments. The older developments being built when active living was a social norm as there was no reliance on cars and the newer developments demonstrated characteristics similar to urban sprawl, accommodating for car dominated environments.

The observations found that although the SOAs in higher deprivation scored better in terms of connectivity, the areas suffered from neglect and the quality of the built environment impacting on the results which demonstrated the importance of not only facilitating active living in design but ensuring that the environment is also maintained. Including observational areas with variable levels of deprivation was important to draw out differences and commonalities across socio-spatial environments, as it has been argued that higher levels of deprivation have been associated to physical inactivity and obesity (Loring and Robertson, 2014). This was also supported through statistical analysis concerning Northern Ireland through data obtained from the NISRA[38], DoH[39], DfI[40]. In effect, the field observations validated the multi-dimensional complexities of physical inactivity and obesity, as there was no direct correlation between the quality of the built environment and socio-economic status. To elaborate, built environments which facilitate active living could still have a population suffering from challenges with poor

[38] Northern Ireland Multiple Deprivation Measure (NIMDM)
[39] NI Health & Social Care Inequalities Monitoring System (HSCIMS) and Health Survey Northern Ireland (HSNI)
[40] Travel Survey Northern Ireland (TSNI)

nutrition, whilst sprawling environments which do not cater for physical activity, could have citizens with nutritionally high standards but lacking the recommended daily exercise. Further studies regarding physical activity levels would provide supplementary data on correlations between physical activity and ALE.

Recent initiatives in NI have demonstrated that active living principles can be implemented within the built environment. Furthermore, professionals have been inspired by European cities that advocate active living, which transpired into a project, albeit temporary. However, three key themes emerge as significant challenges: car culture, the red line of planning which impacts on surrounding context considerations and; key site requirements. The discussion went into depth regarding professional cultures, but these illustrate the main professional cultures which currently hinder the delivery of active living outcomes. Car culture is thriving in Northern Ireland and this study found that, not only should active living be advocated and entrenched in practices, the car as the alternative to active living must be disincentivised. It is not enough to encourage physical activity, rather car usage should be discouraged through parking restrictions, allotting more road space to pedestrians and cyclists, taxation and fully pedestrianised areas. However, these are often considered a more radical approach and the planning profession especially in Northern Ireland was described as "*timid*" and the leaders within urban governance who hold the most power are more than often those who do not advocate for active living considerations or radical approaches. This identifies a plethora off perspectives at play within collaborative urban governance.

This research uncovered the existence of professional cultures amongst professional participants and significant insight into cross-professional dynamics were obtained through the interview process (objective 4). Although conceptually the importance of active living had consensus, prior to the discussion many participants were unfamiliar with the term. Therefore, there is a need for increased capacity on active living. This will help achieve common goals which need to be well defined, outcome driven and more strategic overarching objectives

which all professionals can relate to. The concern is how will active living outcomes truly be delivered and who will support their delivery? As previously mentioned, some participants alluded to other professionals not being so supportive of active living, with E3 and P10 referring to older professionals and those in senior positions. A3 reinforced this by explaining the importance of changing the minds of those who are not open to active living. Ideally, it will require all professionals to be on board however the research found that planning professionals, compared to all other professionals, seem to lack a strong professional identity. This evidenced leadership challenges and the inability of planning professionals to take the radical approach of "*making things unattractive*" in terms of car dependence and not simply encouraging active living (A3). The research has therefore acknowledged the need for both encouraging active living whilst actively discouraging practices which hinder active living. The recurring question regarding this was who would take the leadership role in implementing this.

The planning profession consists of many workers coming from assorted academic backgrounds and this was presented as justification for planners' timidity. However, architects also come from a plethora of academic backgrounds (landscape architecture and urban design for example) yet their identities are much stronger. Suggestions from participants mentioned that architects are trained in a way which promotes leadership whilst planners are mediators, nevertheless reinforcing the existence of embedded cultural identities. It has been demonstrated clearly that the planning profession lacks power and leadership but has an influential role within the development process which should be utilised right through to the end of a project. Politicians and developers having deep seated, strong identities place additional pressures on planners who do not have the ability to confront, challenge or oppose decisions with fear of backlash, judicial review and appeals. Good quality, outcome focused collaboration will inevitably contribute to the delivery of active living outcomes, although this research has uncovered the additional complexities with aligning policy rhetoric to practice and implementation.

9.3 Contribution to Knowledge

With regards to health discourse in policy, the research both supported and contradicted existing literature. Chapter Two addressed the suspicion that plans and policy documents are not taking health on board and lack political support (Barton *et al*, 2013). The assessment of policy in Chapter Five found that health was well represented in policy (Table 5.1). Yet, the research also established that professionals believed there to be a lack of political, and professional, support regarding the delivery of health objectives. Hence, Tsouros (2015) surmising that key decisions from politicians, developers, as well as professionals still treat health as a secondary issue can be confirmed. The research then reinforces that although health is included throughout policy, it fundamentally lacks significant support in delivery.

The concept of active living lacked capacity and, although well received once discussed, many participants were unfamiliar with the term. Therefore, with the literature being clear on the role of policies and planners to translate active living into practice (Edwards and Tsouros, 2008; Allen and Allen, 2015) the research confirms that active living within the geographical context of Northern Ireland is more dominant in academia than professional practice. This had repercussions on the discussion as once professionals were aware of the concept, they would often direct dialogue towards active travel, a concept which professionals were more familiar with. In contrast to the well-established term of sustainability, which is embedded within literature, policy and professional practice, it is evident that there is a gap between the academic support and professional acknowledgment of active living. This affirms the literature's suggestion that sustainable development has superseded the health agenda and that sustainability resonated more at professional levels due to sustainable development allowing for an economic focus (Barton, 2005; Barton *et al*, 2003). The broader implication of this is that the delivery of active living outcomes is a significant challenge as the concept is relatively unknown in practice and the built environment characteristics associated with active

living are not presented conceptually but rather dispersed thinly throughout policy and practice.

The acceptance of the benefit collaboration provides in addressing multi-faceted complex social problems was translated throughout the literary chapters and the empirical study. The research also supported that simply collaborating does not tackle societal issues as there is a greater requirement on ensuring that the collaborative arenas and the parameters that shape them should clearly focus on co-designing outcomes and implementation from interprofessional working. This is similar to the inclusion of health throughout policy in that they are effective initial steps but there must be an effort to apply what it states within policy and what is discussed during collaborative urban governance. Understanding socially constructed professional perspectives is crucial to advancing the effectiveness of collaboration. What this research found is that professionals perceive their profession similar to how other professionals perceive them but framed in more negative undertones (Table 7.2). This could provide a start in better relations between professionals and was demonstrated in the restructuring of the departments after which planners and engineers claimed to have a better understanding of each other now that they work closer together. Conversely, the experiences of public health professionals (H1; H6) evidenced poorer collaborative efforts where their involvement felt tokenistic to them and their potential was not recognised. This reinforces that to improve collaboration professionals must obtain a better understanding of other professions. The research additionally identified that collaborative practices had improved after the restructuring of the NI government which provides contributory knowledge to the government structures. The research contributed to the advancement of knowledge regarding local planning and specifically tensions between community and spatial planning. Conrad (2008) explicitly addressed how local authorities should have leadership, unity in purpose and trust characteristics and assessing this throughout the interviews it was found that there were challenges evidently presented in this regard.

Professional cultures were confirmed during the empirical research undertaken, validating the epistemological position of social constructionism and the interpretative methodological paradigm. The research also supported that there are other perspectives at play within professional practice, and not just those which have been constructed professionally, most notably the individual perspective. The literary themes of power and leadership corresponded fundamentally to the research into professional perspectives and strongly reflect how the planning process is highly politicised and full of tensions (Allmendinger and Haughton, 2010). Additionally, the research established how planners working within the planning process have high levels of timidity not always directly acknowledged but presented under the guise of guidance. Compared alongside the literature, this timidity does not necessarily equate to a lack of leadership as Macmillian and Tampoe (2000: 197) suggested that a form of leadership can be more charismatic and deals more with the 'hearts and minds', which the research confirmed to be exactly that (P10). However, a major concern which this research offers is how effective that leadership approach is in the delivery of active living compared with influence through power.

9.4 Recommendations and Future Research

Following the key findings of the research, and notwithstanding the current absence of government in NI and an identified lack of leadership, this research proposes five recommendations to deliver active living outcomes. These are intended to be aspirational in nature to encourage thought-provoking ideas and stimulate debate in order to create the step change needed to ensure built environment policy and practice truly contributes toward active living.

First, public health concerns such as physical inactivity and obesity, must be explicitly included within planning policy through the concept of active living. Reference to the individual ultimately being in control of their physical activity is understood, however, if professionals have the understanding that they should do as much as they can to encourage physical activity

and contributing in tackling public health epidemics, it would result in a significant driver for active living.

Second, these themes (physical inactivity, obesity and active living) must be well and clearly defined. This must also be consistent throughout all policy, plans and guidance to avoid confusion. This can only be applied to future policy, but it will provide the delivery mechanism for active living which policy does not currently have. Furthermore, active living must not only be included and defined but presented so that it is spatially reflective. Using the active living environment characteristics allows the concept to be easily visualised spatially, again helping in its delivery. Learning from other cities, which the SDG has already achieved through a field visit to Copenhagen, is of great benefit as it demonstrates real-world practice.

Third, the challenges that the health agenda has had in putting health high on social, economic and political agendas raises the question on how health concepts are directed. The economic driver is a power entity in the development process, often being the sole reason applications are approved and often being the only major consideration for compliance to policy. This must be addressed if active living is to succeed. The priority which the economic driver has on the development process suggests that active living could be presented in terms of economic advantages, not being framed within a health agenda but ultimately impacting on health by proxy through delivery. Health and active living considerations have significant economic advantages and it is how that is presented as an economic driver which could make a difference as it would be conceptually accepted cross-professionally and politically.

Fourth, that capacity and shared understandings are present throughout education in universities which than can translate into practice, resulting in multiple professions being aware of the same concept. It is evident that engineers and architects do not have strong health orientated academic backings and this impacts on professionals and breeds professional cultures which may be less accepting of health orientated concepts. Yet the research verified that all professionals accept the concept, theorectically. This also leads into

collaboration, as having topics which all professionals understand could result in it having greater backing throughout decision-making processes. Furthermore, collaboration must be outcome focused and result in tangible outcomes which need monitoring. The collaborative effort must also be more inclusive of health professionals who considered their involvement tokenistic.

Lastly, the planning profession requires more influence as it is clear that they and other professionals believe that they lack the power that they, as professionals, should have. This is because they can be undermined by more powerful forces. They should be able to make decisions and ensure that those decisions are adhered to and they should not be in fear of review, which has led to a system where they are genuinely fearful of making wrong decisions and as a result a stagnant diffident culture persists. This research suggests that there is more opportunity available within the planning profession to deliver active living through local policy but a lack of leadership and the fear of leadership hinders progress.

This leads into future research, with the biggest opportunity being constantly directed towards the production of the local development plans. Further research on how this process is being carried out, the relationship between the spatial planning and community planning could be of huge benefit to understand the challenges and opportunities of their production. And finally, having better, local, statistical data on obesity and physical activity in Northern Ireland could help in adding knowledge and understanding in the area of further research to help tackle public health epidemics.

9.5 Final thoughts

The inclusion of health objectives and health and wellbeing has not yet manifested into professional practice. Health is a vast area which needs care and consideration on how it is framed, not simply included in the hope that practice will shift. Active living frames the physical aspect of health, not only in relation to tackling health issues but also how it can be spatially

reflected by delivering active living characteristics. There is opportunity to deliver active living as there is seemingly a cross-professional consensus on the importance of this research and in the concept. The consensus falters when it comes to delivery as it would mean embedded cultures, such as the reliance on the car, must be tackled, which is considered by those outside many built environment professions as highly contentious. This research has critically investigated the promotion of active living in Northern Ireland, by examining the policy discourse, observing the built environment, investigating the dynamics across-professional cultures and ultimately, the extent to which there is some alignment occurring across policy, products, practices and processes to plan for active living.

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Appendix Content Page

Appendix One: Active Living Checklist Template

Active Transport	**Green**	**Amber**	**Red**
Foot path present, on both sides			
Bicycle lane			
Lane on kerb			
Lane on road			
Separate infrastructure			
Bicycle Parking			
Any obstructions			
Buffer between pedestrians and vehicles			
Public transport provision			
Train			
Bus			

Aesthetics	**Green**	**Amber**	**Red**
Suitable quality of physical active travel infrastructure			
Stimulating / attractive routes in the public realm			
- Public art			
- Seating			
- Lighting			
- Green infrastructure			
Active Frontage			
Quality of superficial environment			
Any blind spots or lack of surveillance			

Connectivity	**Green**	**Amber**	**Red**
Safe and convenient internal travel links			
- Adequate pedestrian crossings / shared service			
- Permeable street patterns			
Is it difficult to walk or cycle through the segment?			
Local facilities within walking distance to residential areas and public transport?			
Safe and convenient external travel links			
Traffic calming measures in place			
Open space present and accessible;			

Appendix Two: Subject Information Sheet

Research Project Title: Linking healthy urban planning and active living through collaborative urban governance

My name is Owen Hawe and I am a PhD researcher at Ulster University's Built Environment Research Institute. I would like to invite you to take part in a research study which seeks to better understand the practices and experiences of those involved (whether it be directly or indirectly) with influencing day to day physical activity through the built environment – referred to as 'active living'.

As aspects of health and wellbeing are being slowly 're-knitted' together within planning policy and practice, now is the time to consider how the built environment can promote 'active living' which is described as a way of life that integrates physical activity into daily routines. This may appear to be a minor aspect of wider health debates, but research shows it could have a significant role to play in creating healthier urban environments. This would contribute to creating healthier societies and help savings on health systems which are burdened by preventable diseases.

The built environments land use patterns, transportation system, and design features provide opportunities for travel and physical activity, which has proven to have considerable health benefits. The rhetoric for better – and smarter – partnership working to span professional boundaries is growing ever stronger and collaboration between planning and other stakeholders is imperative to delivering more physically active environments. However, with the amount of professions working together in the development process, it is recognised that challenges are likely to occur due to differing perspectives. I intend to examine how active living is considered within professional practice and hope my research can offer some insights into the attitudes, experiences and perspectives of those working within the development process.

Before you decide whether to take part or not, please read the following information which outlines the research, your role as part of it and any further relevant information. If anything is unclear please do not hesitate to seek clarification. It is important that you are clear of what is expected of you as a research participant before you decide to participate in the study.

I would like to take this opportunity to thank you for taking the time to consider this application.

Participant Role

Participants in this research study will have been involved in development processes and have been identified from the categorising groups that pertain to their role within the development process that they have been involved in. All different roles within the development process have a perspective on their experience and therefore all information collected will be highly valuable to this study.

Do I have to take part?

You are not obliged to take part in this study and if you do you have the right to withdraw at any stage of the process should you change your mind. If you do decide to participate, you will be asked to sign a consent form.

What will I have to do?

Please read this information sheet carefully and sign the consent form if you are willing to participate.

Participate in an in-depth interview in order to share your views and experiences relevant to the research. This will take approximately 45 minutes.

The interview will take place at a location that is convenient to you. Please note that the interview will be recorded and notes taken throughout, if you agree to participate.

Will the information I provide be kept confidential?

The information you provide will be held securely and in confidence. Identifiers will be removed prior to the research being published as required under the Data Protection Act 1998.

Are there any benefits to taking part?

No incentives or awards will be provided to participants.

Risk

There are no perceived risks to your participation in this study. Ethical approval has been granted to conduct this research by Ulster University's Ethics Approval Committee.

The University has procedures in place for reporting, investigation, recording and handling adverse events. Any complaints will be taken seriously and reported to the appropriate authority.

Who is organising and funding this research?

The Department for Employment and Learning, Northern Ireland (DELNI) (2015-2016)

Who has reviewed the study?

The study has been reviewed by a number of academics from the School of the Built Environment, Ulster University. The study has also been reviewed by the Ethics Approval Committee.

If you require further information, please contact the Ulster University Research Governance Department.

Appendix Three: Interview Questions

Phd Researcher: Owen Hawe

The built environments' land use patterns, transportation systems and design features can provide opportunities for physical activity. Developing a built environment that supports 'active living' can facilitate the development of healthier societies, with developments that not only derive greater economic values but can also provide greater savings to local and regional health systems.

The following questions are relating to your experiences and explores several key themes including: active living, collaboration and professional perspectives.

1. What is your understanding of the term active living and its application within the development of the built environment?
2. In your opinion, to what extent have built environment professions expressed interest in the idea and delivery of active living?
3. What core values – such as from your accrediting body / professional institute – inform day-to-day activities in your profession?
4. In what ways does your specific profession facilitate and / or promote active living?
5. In your experience, to what extent is active living discussed amongst professionals and between professions?
6. Do you believe that current policy and legislation at the local, regional and national level sufficiently supports active living or do you consider more could be done?
7. Going forward, what are the challenges and opportunities in pursuing and fully implementing active living policies and interventions within the development process?

Appendix Four: Consent Form

Project Title: Planning for Active Living: Aligning Policy, Product, Practice and Processes

Lead Researcher: Owen Hawe

	(Please initial)
• I confirm that I have been given and have read and understood the information sheet for the above study and have asked and received answers to any questions raised	[ ]
• I understand that my participation is voluntary and that I am free to withdraw my consent and discontinue my participation at any time during the interview	[ ]
• I understand that the interview will be recorded for analytical purposes.	[ ]
• I understand that the researchers will hold all information and data collected securely and in confidence.	[ ]
• I understand that all efforts will be made to ensure that my identity remains confidential and anonymous (except as might be required by law) and I give my permission for the researchers to hold relevant personal data	[ ]
• I confirm that I agree to participate in the above study	[ ]

Name of Subject	Signature	Date
Name of person providing consent	Signature	Date
Name of researcher	Signature	Date