



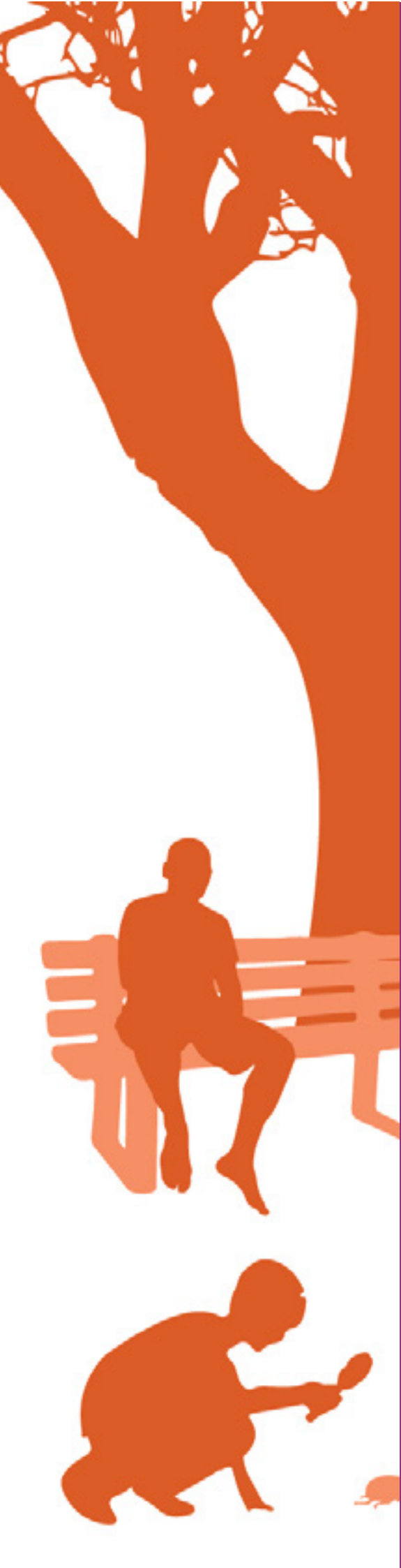
# Design Codes for Health and Wellbeing

March 2025



Tibbalds





### Acknowledgements

This document has only been made possible with the dedicated input from several contributors. Particular thanks goes to Michael Chang, who drafted much of the content within the document, and has been integral to the process overall.

Special thanks also go to the wider steering group, including the organisations on the front cover, as well as Amy Burbidge, Lee Heykoop and Garry Hall at Homes England.

Supporting organisations:

UDL

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# 1 Introduction

The built and natural environment are fundamental building blocks for people's physical and mental health and wellbeing. As well as forming the physical setting to our lives, our homes and neighbourhoods significantly influence our wellbeing and patterns of behaviour. The design of neighbourhoods inform our behaviour, and are central to ensuring the long-term health of our communities.

This document provides guidance to all of those involved in the design code process, and those interested in prioritising healthy placemaking principles within the built environment. As a reference guide, the document establishes a policy framework and baseline, before outlining specific principles that should be incorporated into the content of health-focussed design codes. The document does not outline reasons to start a code, or information on the process of preparing a code or the resources/timeframe involved, as this information is widely available from other sources.

This document will help in:

- understanding local health issues and priorities;
- developing a vision for health-based area coding; and
- establishing coding requirements to ensure healthy placemaking.

Design codes set out expectations for the design of buildings, spaces and places. They are an important planning tool for shaping homes and neighbourhoods. Design codes apply to those elements that can be controlled through the planning process, and are predominately instructions to developers and architects that bring forward planning applications. Most design codes are focussed on new development, but they may also apply to existing places (or where there is another mechanism for delivering these changes, for

example funding for retrofit). The benefits of design codes include the ability to:

- Shape places through clear design requirements.
- Build trust through engagement and collaboration.
- Make decision making more efficient, and create certainty through clarity and a common understanding.
- Facilitate building of more and better homes and places by setting aspirational requirements.

By focussing on health and wellbeing, places have the potential to deliver additional long-term benefits to communities, including the reduction of health inequalities. Making health considerations central to the design code (and wider framework of policy) ensures development proposals are being shaped positively, even before they reach the planning application stage.

## Why is health important?

Being in good health, and the absence of ill health, means that people have good physical and mental wellbeing. This allows people to take part in life, within our families, communities and wider society.

## What are health inequalities?

Health inequalities are unfair and avoidable differences in health across the population, and between different groups within society. Health inequalities may arise from variations in income, education and the work people do. But crucially, they are also a result of the homes and neighbourhoods where people live, including their access to green space and healthy food.

## Why is tackling health inequality important?

The reduction of health inequalities is a question of social justice as well as economic growth. The cost of health inequalities can be measured in both human terms (lost years of life and active life) and in economic terms (the cost to the economy of additional illness).

## Headline statistics

More deprived areas are more dangerous for pedestrians, in part due to the quality and safety of the built environment. Children walking in more deprived areas are at much greater risk of serious injury or death from vehicles in more deprived neighbourhoods. Six times as many 5 to 9-year-old pedestrians are killed or seriously injured in deprived areas than in the least deprived areas (18).



Unhealthy homes: Across an average lifetime, 70-90% of our lives are spent indoors (17). 3.7 million households in England live in non-decent homes that are damp, outdated, cold or dilapidated (18).



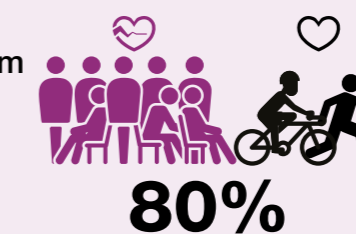
Globally, insufficient physical activity is one of the leading factors for death worldwide (17). In the UK, only 34% of adults walk or cycle 5 times per week (18).



People who do not feel they have a sense of community are four times more likely to have report poor mental health (18).



According to the WHO up to 80% of deaths from cardiovascular disease are preventable as they are caused by risk factors that are modifiable, including a lack of regular exercise (18).



Air pollution leads to 40,000 premature deaths per year in the UK. Some communities are more disproportionately affected: people from a black, black British, Caribbean or African background are five times more likely to live in the most polluted areas compared with white people (18).



**A design code for new development can:** improve road safety, and introduce measures to slow traffic speeds which make it easier and safer for pedestrians (and particularly children) to move around neighbourhoods

**A design code can:** specify size standards, quality standards, and comfort of new homes.

**A design code can:** require a network of safe, attractive, convenient routes to walk or cycle to nearby facilities, services, and jobs. It can also ensure sufficient density to support walkable neighbourhoods.

**A design code can:** specify opportunities for neighbours to interact, create spaces for children and adults to play, and provide community infrastructure such as schools, pavilions and community centres.

**A design code can:** help create healthy communities, by building in activity to everyday routines, for example play streets, adult gyms, and access to nature.

**A design code can:** mandate the introduction of planting and low-level greenery to filter the air; carefully manage and integrate parking; create calm traffic zones to keep cars away from sensitive uses such as schools; and make more active, less polluting modes of transport easier and safer.

## 2 Design codes and health

### **What is a design code?**

A design code is “a set of simple, concise, illustrated design requirements that are visual and numerical wherever possible to provide specific, detailed parameters for the physical development of a site or area” (from the National Model Design Code - NMDC). A design code specifies the expectations for the design of buildings, spaces and places. It can help to give developers greater certainty about what may be acceptable when seeking planning permission, and can lead to faster decisions if a proposal complies with the code.

Design codes are a key element in the creation of well-designed places. The Ministry of Housing, Communities and Local Government (MHCLG) has prepared the National Design Guide (NDG), which defines the ten characteristics of well-designed places. Based on these principles, the National Model Design Code (NMDC) provides detailed guidance about the process for preparing, and the content of, local design codes. Local planning authorities and other relevant bodies should prepare design guides or codes to be consistent with the NDG and the NMDC.

### **How can design codes improve health and wellbeing?**

Those producing or commissioning design codes can ask the following questions:

- How can existing local health priorities and other related policy objectives (e.g. air quality, physical activity and active environments, nature recovery, and climate change) be embedded throughout the design code?
- How can health outcomes from development be monitored and evaluated?

The NMDC emphasises the importance of using up-to-date evidence to inform a local planning authority’s (LPA’s) understanding of its area at an early stage in the design coding process. For a design code with a health and wellbeing focus, an important starting point is to establish the local needs and public health priorities in an area. This should consider evidence from various sources, such as the local Health and Wellbeing Board’s Joint Strategic Needs Assessment (JSNA), and joint local Health and Wellbeing Strategy, at the appropriate granularity of data for the scope and scale of the project. This should be undertaken as part of the baseline evidence-gathering.

Design codes as a tool (along with other health policies) can take a long term view, and influence good health across people’s ‘lifecourse’. In contrast to ‘immediate health’ (whether someone right now is afflicted with a particular illness) creating healthy places is important to long term health improvements, allowing people to flourish in childhood, have a productive adulthood, and an enjoyable retirement (21).

### **Health in local plan policy**

A design code can assist in implementing the local plan policies. Design considerations in the design code should reference the relevant local plan policies (NMDC). Where a design code is being prepared while the local plan undergoes review, develops, or is being adopted, the relevant design considerations should word and evidence any new policy requirements accordingly.

### **A multi-disciplinary process**

A wide variety of contributors are involved in the preparation of design codes (see section 3 and 4 for further details). Collaboration and training are vital to ensure that the right people are bringing the right skills to the team. To prepare a health-focused design code, local planning authorities must be able access the right expertise, including public health skills, knowledge, and urban design skills.

Urban design training in local authority public health teams should be undertaken. These skills might include understanding the context and local needs, and being able to identify appropriate solutions to problems, all of which are compatible with competencies set out in the Public Health Skills and Knowledge Framework.



# 3 Use of the document



Seasonal planting adds colour to spaces.

## Who should read this document?

This document has been put together to help those involved in the production of design codes, to embed healthy placemaking principles into the coding process. As a collaborative process between professionals, stakeholders, and the community, the production of design codes will inherently have several parties involved.

Public health professionals can help planners, urban designers and developers in creating well-designed places that tackle local health issues and support healthy behaviours through spatial planning and policy. To see a checklist of actions for all stakeholders outlined below, see section 10.

If you are:

- a member of the local public health team – you will hold access to vital data and resources on local health determinants and inequalities. These local health issues should be identified early during the coding process, and relayed to the team undertaking the design code (for example, through early statutory consultation, or internal briefings). See section 4 for details.
- part of the Local Planning Authority – you are central to embedding public health within the code, as well as making sure that the code is practical and usable for all. In your role as client and adopting body you should initiate early contact with the public health team, and help identify how local health and well-being needs can be addressed through the coding process. Engaging with the local community, residents and interest groups will be a key role as part of this process. Beyond the adoption of the code, a clear approach to monitoring and evaluating the impact of the code on health determinants should be developed.

- a planner or urban designer – you may be the author of the code and responsible for bringing everything together and ensuring the code is a practical tool delivering health outcomes.
- a local politician – the long-term health of your communities will be important to you, as it is integral to the economic functioning and social wellbeing of society. Having in-depth knowledge of a local area, and constituents' concerns will help to address local inequalities in the code. You should use your platforms (in briefings, committees, and gateways) to champion public health in design codes. Health inequalities can be tackled through placemaking and the design of the built environment (and enforced through a design code).
- a local resident – you hold valuable local knowledge about the key health issues that people in your area face. Your input into the design coding process through public engagement is critical to the success of the process and delivering tangible change in your area.
- a developer or investor – you will have a responsibility to deliver healthy places through the implementation of the design code. The design code process can draw on your invaluable practical experience in delivering quality placemaking that reflects local community feedback. This might include pre- and post-occupancy consultations or questionnaires.

Delivering healthy places should be prioritised, and the stakeholders outlined above will help provide access to robust local granular health data. Pro-health design coding informed by collaboration between public health teams, the private sector, and local planning authorities can help to fill this gap.

A detailed action checklist is included in Section 10 of this document.

## Structure of the document:

This document provides advice on how local design codes can shape the built environment and help address local health priorities. It explains:

- how design codes can contribute to health improvements and address health disparities. This can be achieved by taking evidence-based actions to address the avoidable, unfair and systematic differences in health outcomes between different groups and geographies (see Section 3 and 4).
- how design codes can fit into a wider policy framework aiming to improve health outcomes (Section 5).
- how community engagement should be integral to the process (Section 6).
- how a vision for healthy places can be delivered through a design code and other implementation tools (Section 7 and 9).
- what implementing these design principles at different scales could look like (see Section 8).
- specific actions for each group involved in the design coding process (see Section 10).



Multifunctional open space allows for play and resting and mature trees provide shade.

# 4 Planning and public health

To embed healthy placemaking principles that aim to address local health inequalities, the process needs to consult public health officials and integrate them.

## Who are public health officials?

Since 2011, the government has given local authorities more devolved power to make decisions that improve the health of their local population. Public health officials act as vital conduits between the local authorities, the government (Office for Health Improvement and Disparities (OHID)), and the NHS. They are involved in commissioning and collaborating on a range of public health services, for example education, care, and regeneration. Prioritising public health at an authority-wide scale has benefits for all, and can be summarised in the diagram below:

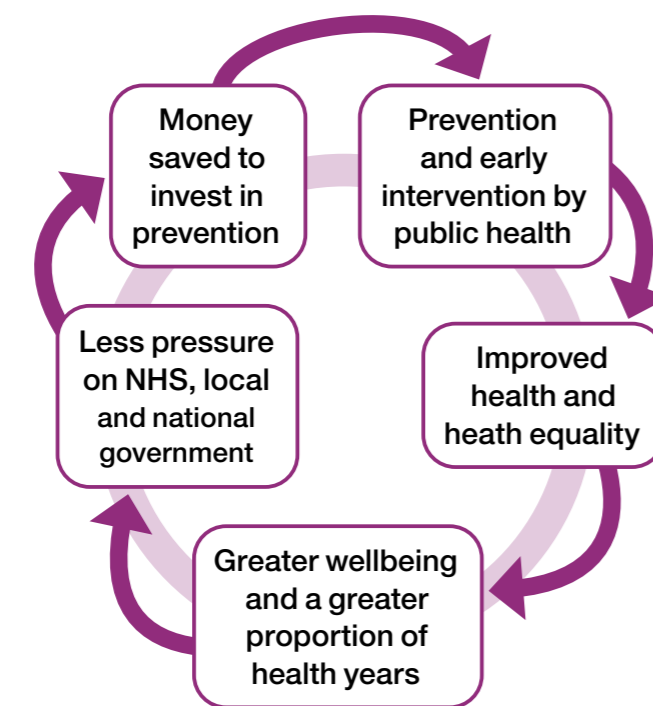


Figure 1. The virtuous circle of public health (19)

## How can planning help deliver public health outcomes?

As identified throughout this document, the built environment has a significant impact on health outcomes (see Figure 1). The planning system specifically influences and directs the built environment.

The planning system is plan-led, meaning that local authorities must keep an up-to-date plan with policies that identify the scale, scope, and type of change that can happen across a local area. This might include significant new development for new housing, but it also might provide guidance for small scale household improvements, such as installing an extension. Planning can enhance health outcomes by:

- Controlling new development through the development management process, in line with local plan policies and design guidance (for example a Design Code)
- Directing development towards the most suitable places (e.g. close to existing facilities and public transport links)
- Protecting sensitive areas from development, for example local green spaces
- Encouraging the retrofit and improvement of existing places, through for example, public realm improvements

The remainder of this section explains how public health officials should be involved at each stage of the design code process.

MHCLG has set out the coding process in the National Model Design Code. The Analysis stage involves determining the scope of the code and describing the baseline for the area, the Vision stage sets out the goals for the design code to achieve, and the Code stage is where detailed standards and parameters are specified. Including health professionals at each stage of the coding process (Table 2) will be as critical as involving other local authority departments, the community or the developer.

- Local public health teams should help identify and address key health issues early in the coding process, which can ensure they are prioritised. The evidence-informed approaches set out in resources for local authorities on planning healthy places can be the starting point. See Annex for signposting to further supporting evidence.
- Local authorities, NHS England and integrated care systems have duties to improve population health and take action to reduce health inequalities (in their four domains) (2, 3). These organisations have access to a wide range of health data and evidence which could be used to support decision making and provide an evidence base when preparing design codes.

Local planning authorities and health teams will have access to data-based insights into place-specific economic, social, and environmental determinants of spatial health disparity. This is critical because these vary across regions and the UK and are not static. Local design codes should be informed by evidence of conditions locally, rather than taking a generic approach.

## Health Inequality Domains

The domains of health inequality are defined by the Office for Health Improvement and Disparities. These set out the variety of individual characteristics and societal influences that have been shown to contribute to health inequalities. These are

1. **socio-economic status and deprivation** – the impact of low incomes, unemployment and poor housing situations
2. **protected characteristics in the Equality Duty, which are** – age; disability; gender reassignment; marriage and civil partnership; pregnancy and maternity; race; religion or belief; sex; and sexual orientation.
3. **vulnerable groups of society, or ‘inclusion health’ groups** – for example Gypsy, Roma and Traveller, or people experiencing homelessness.
4. **geography** – the impacts of specific geographies such as urban, rural or coastal, as well as the population composition, regional disparities, and the built and natural environments. (16)

For information about how design codes can directly tackle these domains, please see section 7.

**Table 1 - Public health involvement alongside the NMDC design coding stages**

Coding process (NMDC part 1, para. 21)		Actions for public health
<b>1. Analysis</b>	1.A Scoping	Consider defining the geographical areas and policy areas the code covers, based on where priority population groups are and how to prioritise different health determinants, as framed by the four domains of health disparities.  Consider local health issues and themes that could be addressed through the code, such as obesity, loneliness or health and wellbeing for children.  Help identify the communities that need to be part of the engagement.
	1.B Baseline	Consider evidence from local health profiles and the joint strategic needs assessment at the appropriate granularity of data to inform the baseline analysis of the area covered.
<b>2. Vision</b>	2.A Design vision	Consider whether the vision for the place is informed by area-based health priorities. Priorities from the local joint health and wellbeing strategy, integrated care strategies and other relevant health strategies should also be considered.
	2.B Coding plan	Consider whether the coding plan can prioritise areas where a focus on health determinants can benefit population groups (including marginalised communities) that would benefit most from a focus on addressing health disparities.
	2.C Masterplanning	Consider health measures / outcomes that could be achieved through creating and implementing a masterplan.
<b>3. Code</b>	3.A Guidance for area types	Consider tailoring requirements for relevant design issues according to health needs and priorities, behaviour change and health improvement principles. All these considerations should be referenced back to relevant local plan policies and evidence of need (and mechanisms of delivery). Concurrently, public health informed-design codes should be flexible and agile enough to respond to changes in policy, guidance and best practice.
	3.B Code wide guidance	

Some local authorities have already established ways for planning and public health to work together, by: appointing joint officers who work across both planning and public health teams. Other authorities are developing a protocol to establish joint working arrangements with planning departments, and transport and environmental departments (who often have oversight of public realm/open space management/maintenance)(4). These protocols have been particularly useful in two-tier areas for clarifying working arrangements between the county public health and several district planning functions.

Such protocols may include:

- a commitment to embed health in plan-making and decision-making;
- establishing thresholds for consulting public health; or
- providing guidance to developers on which developments should be subject to a health impact assessment.

Where these protocols exist, they can be updated to specify local thresholds for public health involvement in design coding, e.g. according to which stage of the design coding process, and which scale, type or area the design code applies to. Greater public health involvement may be indicated for larger developments, or areas of greater deprivation and/or population density.

**Use of public health evidence**

Local public health teams have access to a wealth of evidence and local health data, not all of which is published. A conversation with the local public health team is a good place to start when seeking evidence and data, particularly at ward level.

Other sources of research and evidence can also inform local design code development as the basis for designing for health and wellbeing. New evidence is constantly emerging about the links between the built environment and physical and mental health outcomes. For example, research from the fields of neuroscience and psychology are increasingly providing an understanding about the factors of urban design that can directly affect mental and emotional health and wellbeing through aesthetic experience (7, 8).

The role of public health involvement can be to help identify, interpret and apply this evidence, especially if there is a need to integrate evidence signposted from other sources of guidance and information.

**Further reading:**

A selection of local level evidence and data can include (but is not limited to) Indices of Multiple Deprivation, the Joint Strategic Needs Assessment, the Public Health Outcomes Framework (5), and the Strategic Health Assets Planning and Evaluation web tool (6).



Access to local healthcare facilities is important at all ages. In this example, a medical practice is integrated into the ground floor of a new high density residential development.

# 5 Framework of policy relating to health

The National Planning Policy Framework (NPPF) advises significant weight should be given to developments that reflect local design policies and take into account local design guidance and design codes. Planning policy at all levels encourages the creation of healthy communities, and the NPPF explicitly requires planning policies and decisions create places that promote health and wellbeing.

The National Design Guide (NDG) and National Model Design Code (NMDC) are prepared by the Government to raise design quality in new development across the country. This guide uses the same terminology as set out in the NMDC, and should be read alongside the NDG and the NMDC. The NMDC notes that “design codes are important because they provide a framework for creating healthy, safe, green, environmentally responsive, sustainable and distinctive places, with a consistent and high-quality standard of design”. This guide provides supplementary advice in the preparation of design codes.

In December 2024 the Government published an update to the NPPF. This establishes the need for all local planning authorities to prepare design guides or codes consistent with the principles set out in the National Design Guide and National Model Design Code. These codes and guides should provide a local framework for creating ‘beautiful and distinctive places with a consistent and high quality standard of

design’. There is also an emphasis on moving design codes from the local authority area-wide scale, to a more local scale focussed on specific issues (explained in Section 7 in more detail).

The NPPF also makes specific reference to reducing health inequalities between the most and least deprived communities (paragraph 96), through features such as sports facilities, access to healthy food, green infrastructure, and layouts that encourage walking and cycling.

On its own, a design code does not guarantee delivery of healthy places. However, it fits into a hierarchy of local design policies and guidance in the planning system (see Table 1)(see note 1). At each spatial scale, wider determinants of health can be articulated, and embedded into appropriate policy/ guidance documents, so that aspirations and principles are followed through to implementation.

Table 2 demonstrates the different scales at which public health inequalities can be addressed. For successful healthy placemaking, it’s essential that all involved groups work together consistently, both across different levels and across various sectors.

## Further reading:

Reference to further guidance by [Quality of Life Foundation](https://www.qolf.org/wp-content/uploads/LGA-Empowering-Healthy-Places-Final-compressed_1.pdf): [https://www.qolf.org/wp-content/uploads/LGA-Empowering-Healthy-Places-Final-compressed\\_1.pdf](https://www.qolf.org/wp-content/uploads/LGA-Empowering-Healthy-Places-Final-compressed_1.pdf)

## The Wider Determinants of Health:

Refers to the social, economic, and environmental factors that influence an individual’s health. These might include living and working conditions, social support networks, education and income. Without tackling the Wider Determinants of Health, it is very difficult to address health inequalities.

Table 2 - Health in the framework of national and local design guides and tools

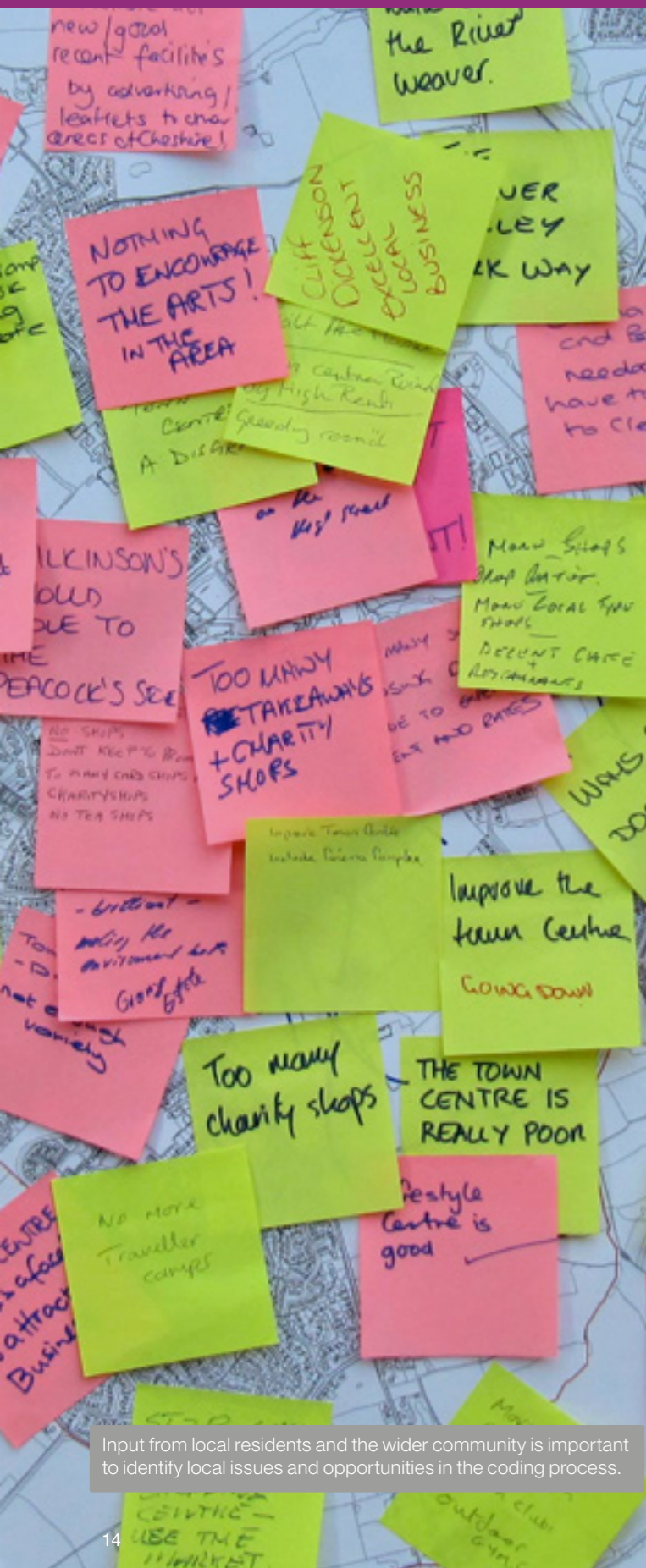
Spatial scale	Examples of design guides and tools	Responsibility	Relevance for public health
National	Government department and agency policy and guidance	Government departments and agencies	Objectives for well-designed places that promote healthy and safe communities
Regional	Spatial development strategy, regional design policy	Combined authorities, groups of local authorities	Strategic commitments to healthy places
Local authority wide	Local plan design policy and guidance Design code LPA Corporate Plan	Local authority (all tiers)	Policies, guidance and decisions on creating healthy places based on local health needs and priorities
Neighbourhood wide	Neighbourhood plan design policy Design code	Neighbourhood forum, town/parish council	
Strategic development area	Area-based guidance Area-based design code	Local authority, Developer (including housing associations)	Place-based health priorities to be met through design requirements in masterplans and phased developments
Development site and application-specific	Site-specific design codes Planning approval documents, including Design and Access statement, parameter plans and S106 commitments	Developer (including housing associations), local authority	

Informal ‘play on the way’ features can be included alongside many pedestrian routes.

Creating wildlife habitats can bring people closer to nature, and encourage education and learning about biodiversity.



# 6 Involving the community in the preparation of design codes



Input from local residents and the wider community is important to identify local issues and opportunities in the coding process.

When preparing design codes, local communities need to be involved at each stage of the process. Having a sense of control over decisions affecting your environment is a key determinant of wellbeing. The agency it gives can energise individuals, and empower communities to shape the changes they want to see in their local areas. Local people have lived experience, alongside skills and knowledge, that are invaluable to shaping the changes taking place in neighbourhoods.

**Throughout the process of drafting a design code, consider that the process itself, and the related community engagement, can deliver immediate health outcomes for the residents within the design code area.**

The NMDC outlines that communities need involvement at each of the three stages of the design code process: analysis; visioning; and coding. The engagement must be meaningful, measurable, and it should be clear how feedback has informed the process and output. Engagement should be proportionate to the type and scale of the code being produced. Those involved in the process must recognise that some groups are under-represented in the planning and design process, and targeted workshops and sessions should aim to focus on seldom-heard groups (particularly where health inequalities may align with such groups).

At the outset of any engagement, organisers must clearly explain how the community can get involved, and which elements they can influence, and what may be beyond the scope of their influence. The engagement material should clearly set this out.

Engagement should involve people who live, work and visit the areas affected. The consultation should also ensure views of local interest groups, parish councils, stakeholders, politicians, and statutory consultees are captured.

The process will likely need a range of in-person and digital events to capture a variety of viewpoints and opinions. Using a combination of these approaches will broaden the reach, and ultimately increase the chances of support for the final document. Such tools that might be used to engage with communities might include:

- Focussed workshops – a chance in smaller groups to discuss local issues and priorities.
- Drop-in events and exhibitions – an opportunity for a broad array of feedback to be collected, and a chance to speak to the team in-person.
- Virtual / online engagement portal allowing people to participate who are less mobile.
- ‘Quiet’ times during public events to provide a safe space for those that are neurodivergent.

Barriers to meaningful engagement that can undermine positive health outcomes include:

- Financial: people may not be able to afford access to the engagement.
- Geographic: people may live too far away to access the engagement.
- Cultural and social: people may feel that the events are not relevant to them and that they do not reflect their culture, language or identity.
- Physical: people with limited mobility, visual impairments, sensory impairments, hearing impairments or physical disabilities.
- Mental: people may feel overwhelmed or that they will be unwelcome or irrelevant.
- Temporal: many people may not have time to engage due to other responsibilities e.g. caring responsibilities

Refer to the NMDC and guidance set out in Planning Practice Guidance, Design: Process and Tools for details and recommended methods for engagement. Further information is available in the Code of Practice for Community Engagement from the Quality of Life Foundation: <https://www.qolf.org/code-of-practice>.

**A well-designed community engagement strategy is the start to creating a design code that will address local health inequalities by ensuring that everyone is heard. Those communities and individuals that are less vocal or seldom heard often coincide with those that are less well (20, 21).**



Community engagement should capture the thoughts and ideas of a wide range of voices, including children and young adults.

# 7 Preparing a health-focussed design code

## The importance of the National Design Guide Characteristics

The remainder of this section outlines how each design theme can promote a healthy placemaking design response. These themes have been linked to the 10 characteristics set out in the National Design Guide.

Different groups can be defined across the following (potentially overlapping) domains (see OHID All Our Health guidance). The domains can then be linked to the 10 characteristics in the National Design Guide:

- socio-economic status and deprivation - for example, under “Built form” and “Resources”, a well-designed home can be cheaper to heat, thus reducing fuel poverty, excess cold, and minimise deprived communities’ exposure to associated health risks.
- protected characteristics in the Equality Duty - for example, under “Movement”, an appropriately-designed street layout can make it easier for women, older people and people with hidden disabilities to travel about safely and confidently.
- vulnerable groups of society, or ‘inclusion health’ groups - for example, under “Identity”, creating shared and different design characteristics that can support social connections or consider the experiences of neurodivergent people in the environment.

- geography - for example, under “Use”, providing and designing for different land use needs of communities in urban, rural and coastal settings can ensure context-specific factors inform appropriate urban design solutions.

Figure 2 visualises this approach to addressing health disparities across the characteristics of a well-designed place, as established in the National Design Guide. It illustrates how well-designed places can benefit people’s physical and mental health by creating a community-centred environment and the prevention of harms, such as air and noise pollution, crime, accidents and excess cold and heat.

This also highlights the climate as a central consideration in design. Many of the design considerations outlined in the following themes address both the climate crisis and health inequalities concurrently. For example, planting and landscaping streets makes them cooler for people, but also addresses the Urban Heat Island Effect. This section therefore covers these design themes in the context of climate adaptation, and the impacts that not considering this will have on health.

The design themes, elaborated in this section have been adapted from the ten characteristics of the National Design Guide.

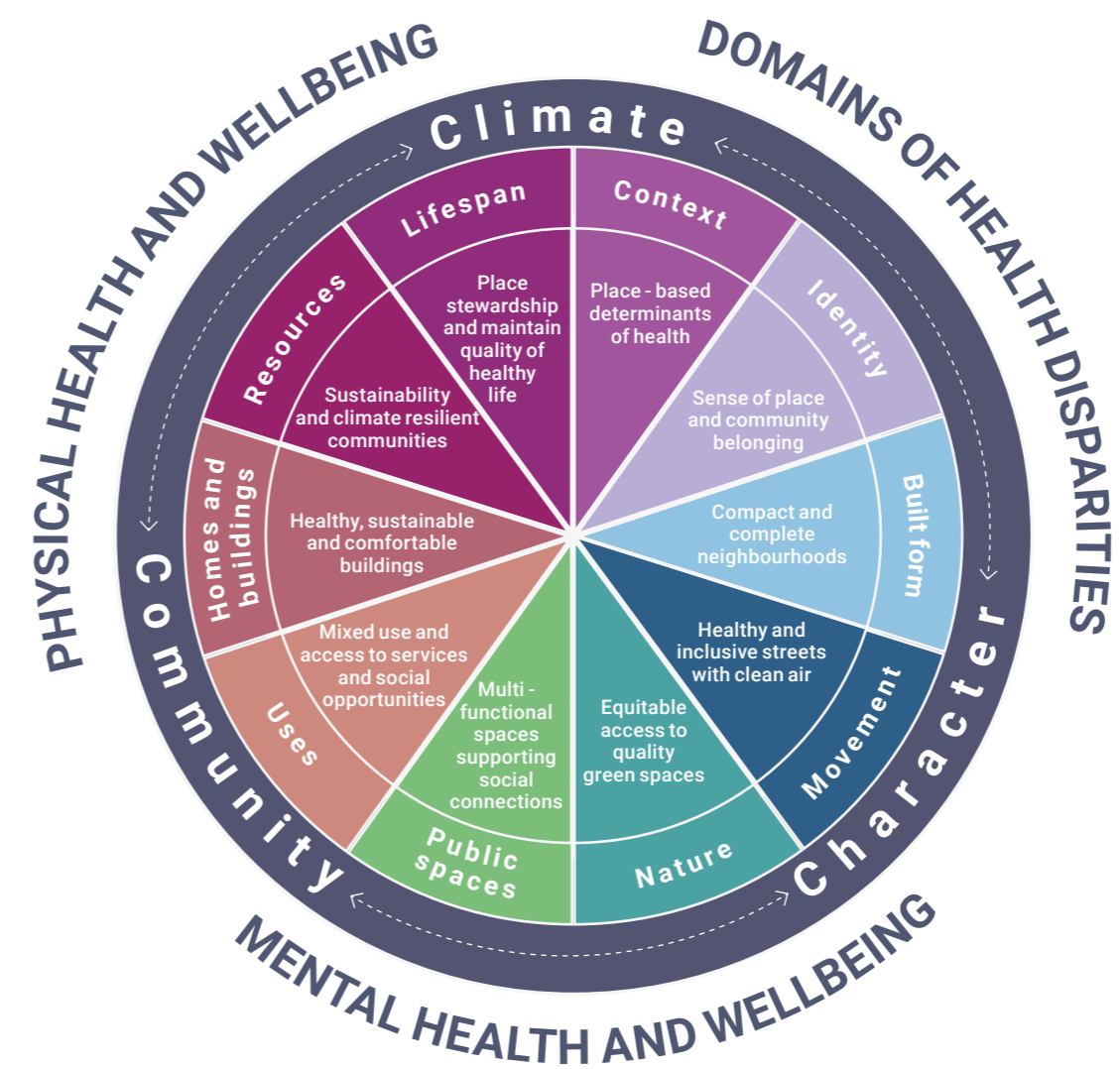


Figure 2 - Improving health and addressing disparities in relation to the ten characteristics of a well-designed place, adapted from the National Design Guide to include health considerations (centre ring) and outcomes (outer ring)



Public spaces should provide a range of opportunities for play, rest and socialising.

### Strategic principles

Although each design code will vary according to the local context and vision, a code focusing on improving health and addressing health disparities should consider the following principles:

- support the promotion and net gain of physical and mental health and wellbeing, including social connectedness at a population level, aligned with existing public health initiatives.
- explicitly focus actions on reducing - and not widening - health disparities, i.e. the needs of different population groups in age and gender, living with poor health, deprivation and health vulnerability (see Section 4).
- embrace opportunities to meet health and wellbeing outcomes through achieving multiple design priorities and co-benefits. This might include social cohesion, safety, inclusive economies, active travel, environmental sustainability, and climate change adaptation.
- take a “lifecourse” approach that aims to address the diverse needs of population groups from youth to older age throughout the lifetime of the development.
- proactively secure community and expert public health input throughout the design, management and maintenance of a development. This will help to promote acceptability, encourage stewardship, and establish long-term social cohesion.

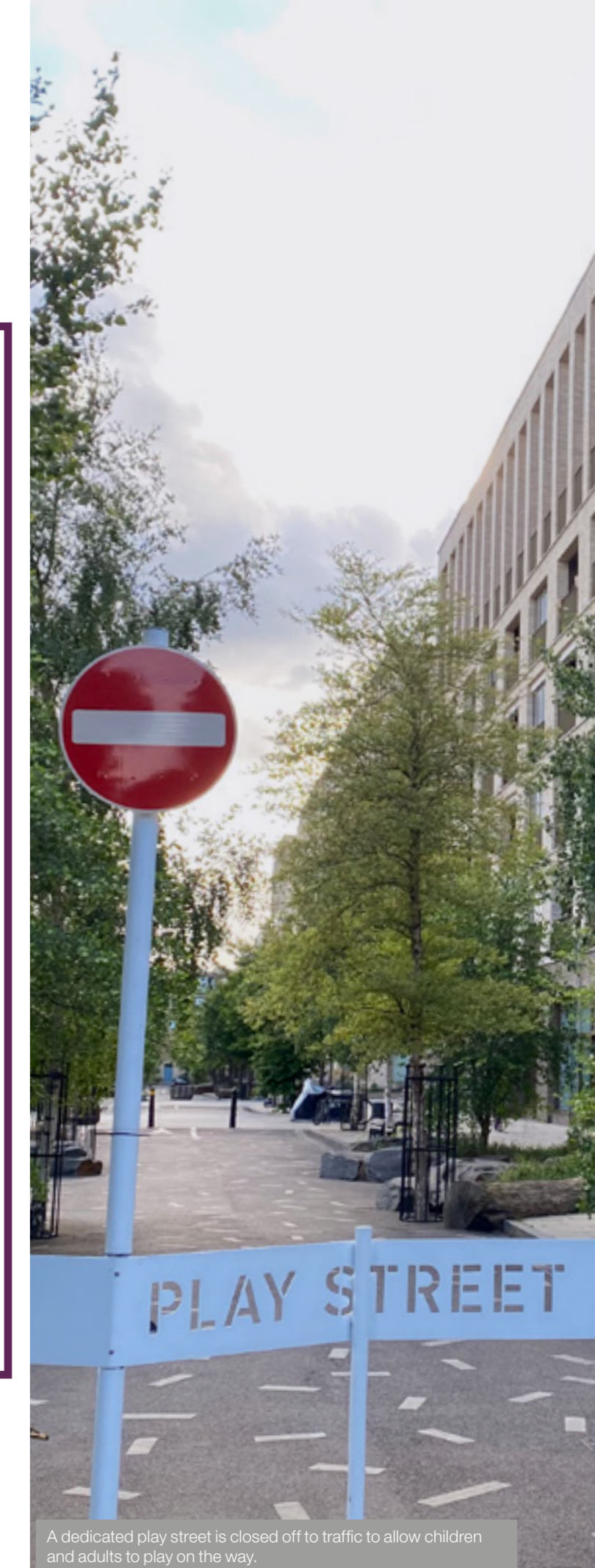
### Design Code Area types

In the NMDC “there is an option to use area types so that guidance can be adjusted to reflect local character”. Different population groups may experience the environment, infrastructure and services in an area type differently. Design coding can reflect the different characteristics within places to address the complex relationship between people’s experiences of different land uses and geographies, and their physical and mental health and wellbeing.

Examples of issues that may be pertinent to consider health are provided below, recognising that in reality, places will have a combination of area types. (Note that this is one way in which areas could be categorised (in line with the NMDC), and as explained in Section 7 new guidance and emerging best practice means that local authorities may choose to identify different area types).

### Design Code Area types

- 1. Town/ city centre:** Design approaches to achieve a safe and secure public realm, encouraging walking, cycling and public transport use, mixed use activities with a clear distinction between the public fronts and the private backs, with the right mix of healthy uses that optimises user experiences of day and night-time economies and protects vulnerable individuals’ wellbeing against harmful environmental risk factors.
- 2. High rise city and urban neighbourhood:** Using design to create places that encourage appropriate mix of uses and density of development. Higher density neighbourhoods must include green and public spaces for exercise, walking and cycling, and making social connections. This will enhance inter-generational physical and mental wellbeing as well as provide residents with private and communal outdoor spaces. Overshadowing, and access to sun and daylight are important considerations in higher density areas.
- 3. Inner and outer suburbs:** Design approaches should recognise people’s desire for an environment that is peaceful, quiet and safe, and free from air and noise pollution. And with convenient access to local services and facilities, e.g. green spaces, community and healthcare services without the need to own a car. In these areas access to public transport is an important factor for those less able, the elderly and children.
- 4. Business parks, industrial areas, and retail parks:** Design the internal and external environments as well as shared employee and customer spaces so that they support improved workplace health. They should create a positive environment for people, and balance this against the operational requirements such as traffic, servicing and security.
- 5. Local centres and high streets:** Using design to achieve the right mix of commercial, residential, recreational, leisure and healthcare facilities that can promote inclusive local economies and a positive user experience. Being able to access day-to-day local services through walking and cycling will promote physical health and can have positive impact on mental health, due to physical activity or reduced sense of loneliness.
- 6. Rural village:** In rural areas access to services, healthcare, education and leisure destinations should be an essential objective, including access via a range of transport modes including public transport, walking and cycling. Access to the countryside can also be challenging and retentions and connections to Public rights of Way are important.



A dedicated play street is closed off to traffic to allow children and adults to play on the way.



Tiered or stepped seating is a really popular way to encourage social interactions in public space.

### **Emerging ways to consider design code structure and scope**

Emerging legislation, and feedback from best practice examples are highlighting a shift in emphasis of design codes, to make them as useful and practical as possible. For example, the recent proposed changes to the NPPF clarify that localised design codes should focus on areas of change with the most potential, rather than district-wide codes covering all areas.

In Chapter 3, paragraph 12 proposed amendment reads: “Rather than district-wide design coding, we want to focus local planning authority efforts on the preparation of localised design codes, masterplans and guides for areas of most change and most potential – including regeneration sites, areas of intensification, urban extensions and the development of large new communities.”

This moves away from the district-wide codes identified within the Levelling Up and Regeneration Act. This will allow coding for localised areas to be more detailed and tailored to the unique characteristics and needs of a specific community. Combined with data on local health disparities and information from public health teams, design codes can start to target and tackle specific health inequalities in specific locations.

Identifying specific health inequalities and tackling these through focussed principles in a design code can help tackle wider health inequalities. For example, where certain health inequalities are prevalent amongst a certain development type, community, or area, a ‘theme-based’ code could seek to specifically improve this.

The most recent MHCLG Pathfinder programme has explored a focus on more specific ‘theme-based’ codes. Tackling health inequalities and creating healthy communities could be one of these topics tackled through ‘theme-based’ design codes in the future.

Like area-types, focussing design codes on priority topics allows Local Planning Authorities to focus on local challenges. Health disparities and inequalities can inform area as well as topic-based codes. For example, a code may focus on:

- Intensification and urban housing – Using design to ensure good living environments in denser urban neighbourhoods, good light and ventilation within homes, access to open space (and private/ communal outdoor amenity space) and to health and community facilities, including schools.
- Commercial development and workspace – Setting design requirements to ensure improved workplace health, public realm and active travel routes to enable healthy opportunities to travel to work as well as using design to manage potential negative impacts on and nearby homes and creating a positive interface between land uses.
- Streets and spaces – Promoting multifunctional streets that include active travel routes, provide safe and secure routes and spaces that are accessible for all promoting inter-generational physical and mental wellbeing.

### **Design Themes**

The following design themes directly relate to the ten characteristics of well-designed places from the National Design Guide. A multi-layered approach across several of these themes is required to successfully address health disparities.



Information stations can be engaging and colourful, and teach people about the local area.

# M. Movement

## Design code outcome for health:

A well-connected network of routes that allows shifts in people's travel behaviours to embrace active travel (including cycling, wheeling, walking and use of public transport), and supports independent movement by groups such as older people, children and young people. This can promote physical and mental health through increased physical activity. Reduced reliance on private motor vehicles (where alternative routes and modes are available) will significantly reduce CO2 emissions into the atmosphere. By-products of this include better air quality, more tolerable traffic noise levels and fewer road accidents.

## Further reading:

Throughout the design coding process, collaboration with statutory consultees and stakeholders is essential. As part of discussions around movement, street design, transport corridors and active travel, discussions with Council Highways Teams are essential. See other national guidance such as the Department for Transport [Manual for Streets](#) and [LTN1/20 Cycle Infrastructure Design](#), Streets for a Healthy Life (Homes England), and [Sport England's Active Design](#) (see [Annex](#)). Homes England are also developing a document that covers best practice approaches to parking, called 'Parking: What works where'.

The design code should consider:

### Connected places

- Safe, direct, and convenient active travel routes to nearby amenities and facilities (e.g., playgrounds) can encourage their use. Neighbourhoods should connect and be permeable, avoiding designs dominated by closed-off access routes or cul-de-sacs.
- Streets which are connected, manage traffic flows, and prioritise active travel make for physically healthier places, but also encourage social interactions for enhanced wellbeing.
- 20 mph zones can reduce accidents among children and young people. Lower speeds help reduce air pollution, and also allow the introduction of other uses such as incidental play features.
- A wayfinding strategy can support active travel, and those with specific mobility needs, e.g. the inclusion of accessible street signage for people with dementia. The arrangement of buildings and streets to locate marker buildings and considering views down streets can also help with this.

### Evidence example - Enabling mobility for all ages and abilities

Built environment strategies that promote physical activity can have a positive impact upon engagement in physical activity behaviours. For example, improving the availability of access to playgrounds and recreational facilities is associated with increased walking among adolescents, and undertaking active travel to school or work is positively associated with improved cardiovascular outcomes (PHE evidence review).

### Active travel

- Segregated walking and cycling routes can support certain groups in getting to and from schools and local essential shops and services, whilst still allowing car and freight movements to key destinations.
- Identifying short, direct routes that can be linked for 'caregiver' journeys. A high proportion of short journeys currently made by parents and caregivers in vehicles (e.g., dropping kids at school, running errands, and traveling to work) could be made via active modes of transport, if supported by appropriate infrastructure.
- All other street types (see NMDC) can be designed to support pedestrian and cycling routes, and other forms of active transport e.g. wheeling and scooting, with priority crossings through the site and the wider neighbourhood.
- Active travel routes should be high quality and appealing, and the surface must be usable in all weathers. Routes that are planted and provide some degree of shading from trees can be better used in hot summer months.



Well-designed active travel routes can make walking, cycling and wheeling the easiest ways to get around a neighbourhood.

### Cycle parking

- Secure and convenient cycle parking spaces within homes and buildings and as close as possible to travel destinations (with charging points, where appropriate) can help increase take-up of cycling.
- Ensuring parked bikes (and cars) stay secure and safe from theft influences people's feeling of security within their home and neighbourhood. Purpose-built, high-quality storage and security should be provided.



Safe, direct, overlooked cycle route through a neighbourhood.



A community 'bike bus' safely delivers kids to school via two wheels. Safe infrastructure, and secure storage makes this a fun and convenient way to get to school.

## Case study: A23 Great Street Design Code SPD, Reigate and Banstead Borough Council (2024)

Focused around a key arterial movement route - the A23 - the design code aims to make the route safer for pedestrians and cyclists, as well as a nicer place to be. As a busy connector, the road carries 20,000 vehicles per day, but it is also a street that passes through small towns and centres in which many people live. One of the prominent aims of the code is to rebalance the road in favour of people rather than traffic to make this a more successful place to live near.

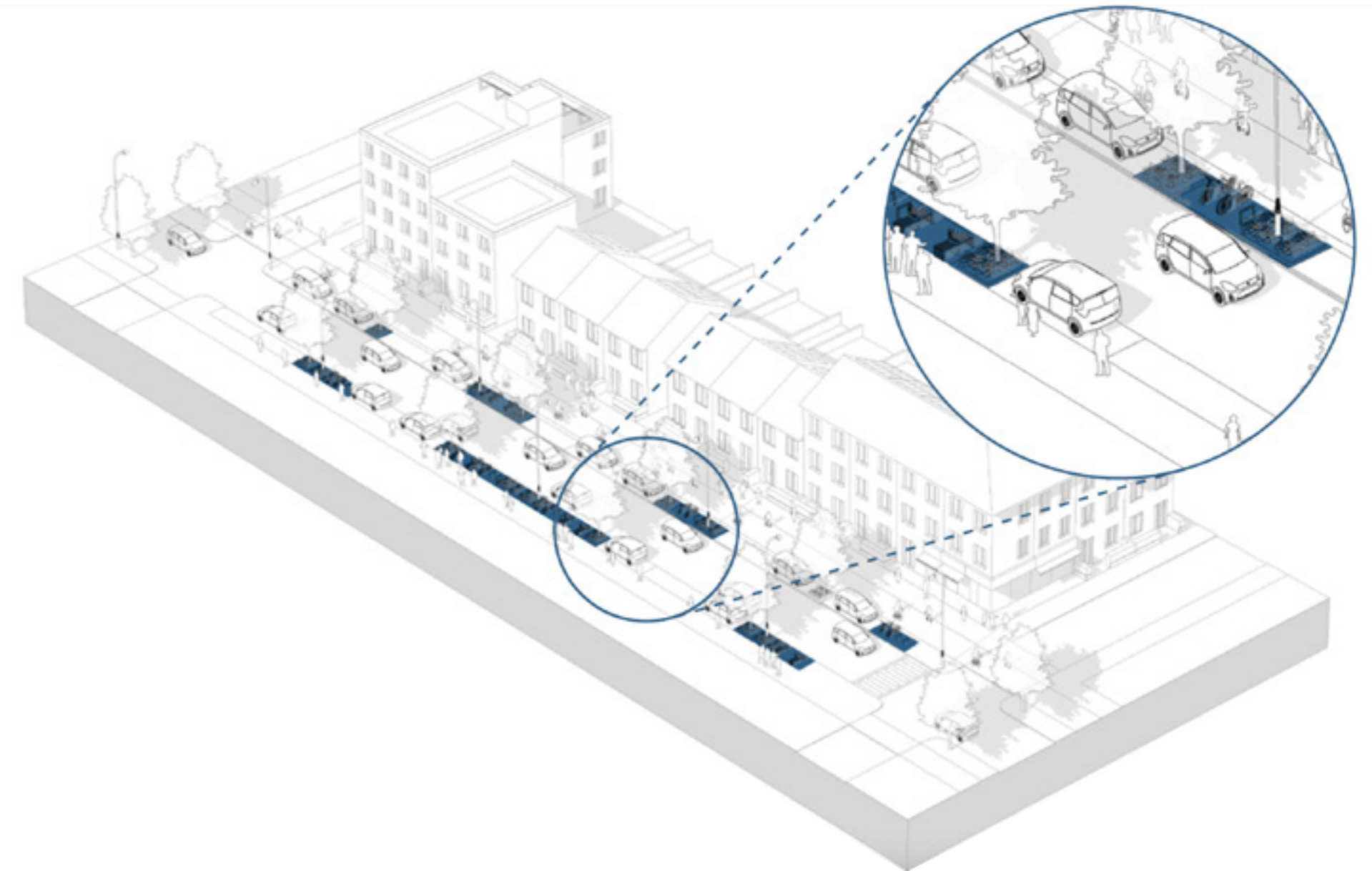
Enhancing connectivity across the street is a key priority, with new pedestrian and cycling crossing points to ensure safe access to local facilities and amenities. These improvements have been highlighted on a map, and specifications for formal and informal pedestrian crossings have been provided (for example, formal pedestrian crossings must be provided every 400m in built up areas). On the road itself, a bi-directional cycle track is to be installed along the length of the street, between the footway and carriageway. The cycle track design must use a colour and tonal contrast, along with a different surface material.

A pedestrian zone will host new street furniture, such as benches to provide refuge for people wanting a break, or waiting. Detailed coding elements relating to signage, road widths and road markings aim to reduce visual clutter along the street, and reduce vehicle speeds in certain locations.

Finally, the code covers car parking and electric vehicle charging. On-street car parking spaces must be broken up into groups of no more than three spaces, separated by trees, greenery, and EV charging points to reduce the visual dominance.

This code manages to communicate important (and complex) street design principles using one main diagram and a map, together with supporting explanatory text. The code intersperses precedent images, and provides links to further reading and other technical documents. Re-balancing the priority from vehicles to people will take time, but the document lays the foundations for this to happen.

[https://www.reigate-banstead.gov.uk/downloads/file/7352/adopted\\_a23\\_great\\_street\\_design\\_code\\_spd\\_june\\_2024](https://www.reigate-banstead.gov.uk/downloads/file/7352/adopted_a23_great_street_design_code_spd_june_2024)



A 'furniture zone' illustrated in the document.

# C+I. Context and Identity

## Design code outcome for health:

Characterful development that integrates sensitively into a place. Places that are embedded in their heritage, landscape character, topography and local identity. Where appropriate, large new developments should create their own character and identity, encouraging people to develop a sense of attachment and belonging to their area, and creating a place people are proud to live in.

## Further reading:

Building for a Healthy Life (particularly the 'Distinctive Places' considerations).

The design code should consider:

### Context and integration:

- Development layout and arrangement should respond to local constraints and characteristics. For example, the path of the sun in relation to the orientation of streets, consideration of flood risk, and proximity to any sources of noise or air pollution.
- A consideration of the topography can prevent streets that are too steep or the need of steps, thereby making the environment more accessible. Concurrently, steps and hills, can encourage physical activity, if they are coupled with appropriate resting places.
- Social and physical links should be made to existing communities. The location of a new park or facilities on the edge of a new development can help integrate new and old as well as proving direct walking and cycling connections.

### Sense of community and belonging

- Existing landscape features, such as waterways, a river or trees, can help create identity and give a sense of permanency. Where possible, direct visual and physical connections can enhance this.
- Consideration of the topography can help people orientate themselves and add to the sense of belonging. For example long distance views across valleys to local landmarks or vistas.
- It is important to understand a site's history, how the area has evolved, and who it may be important to. New development can reflect, accommodate, or even bring to light this history and heritage. Physical and non-physical heritage can create important links to the past and shared histories, and enable people to feel connected to a place and its communities.
- An understanding of the local demographics and community engagement may show that certain cultural nodes (for example a local market, religious centre, or public space) are important and need to be incorporated into the design.
- A positive and coherent language can be created through the architecture, materials, and public spaces. Combined with proactive community management, this can instil a sense of pride and belonging in residents.

## Case study: Chatham Design Code, Medway Council (2024)

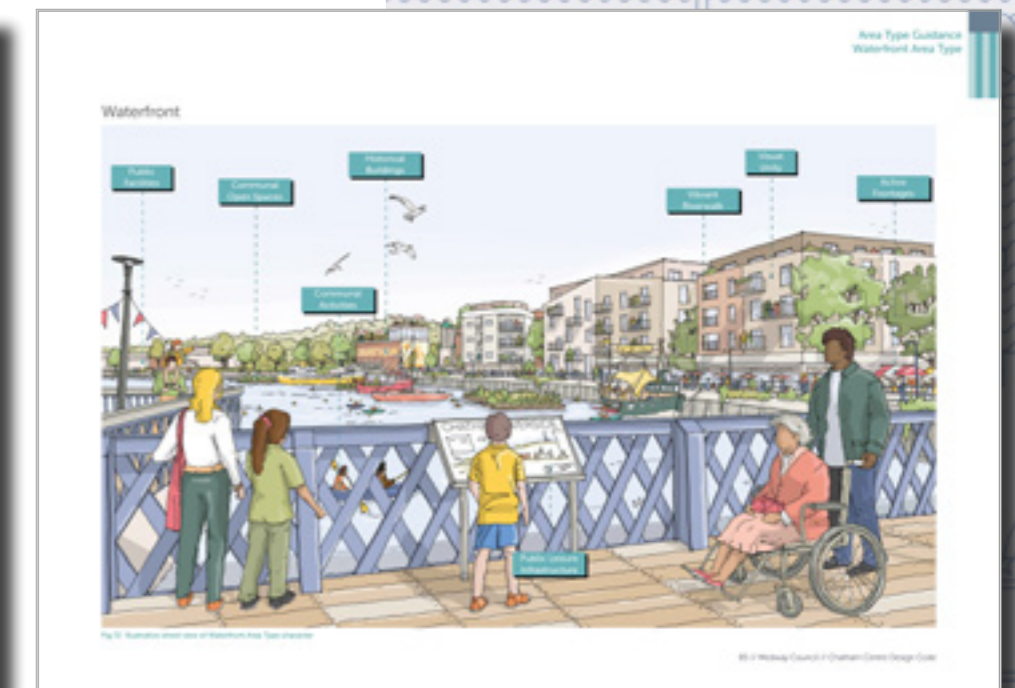
The Chatham Design Code is focussed in the urban centre of the town, aiming to help deliver high quality sustainable development. Following extensive community engagement, the code identifies a series of principles that apply across the whole area, for example bringing in nature and biodiversity, and an integrated Medway-wide public transport network.

The document then identifies guidance across area-types, including Chatham Cross (the central commercial area), the Waterfront, and the Green Edge, as examples. For each area-type, coding principles are then applied under the ten NDG characteristics, including context and identity. Those specifically relating to healthy placemaking include:

- In Chatham Cross, enhancing streets and spaces to create more social spaces for people to gather and play
- New local landmarks will be introduced to strengthen the identity of Chatham, and complement existing landmarks such as The Brook Theatre, and Church of St John the Divine, which are important to the local community.

- At the Waterfront, this involves strengthening existing routes, and creating new pedestrian routes with an engaging wayfinding system, helping encourage people to get active and enjoy the riverside location.
- At the peripheries of the urban centre, it is about creating new and enhanced connections to area destinations by creating desirable and direct pedestrian routes. Walking and cycling should be the easiest, safest and most convenient way to reach local services and community facilities.
- On residential streets, improvements to public realm and planting can improve local identity and enhance the visual streetscene, reducing the dominance of vehicles.

The code is structured around the NDG characteristics, which makes it easy to navigate, and see how each area type is responding to these design issues. The document is very well illustrated, and easily navigated through a colour-coded system.



# N. Nature

## Design code outcome for health:

A range of inclusive green spaces (quality, quantity and accessibility) integrated into designs for all relevant new developments, especially close to homes and where people socialise. These should serve various functions to accommodate local food security and wider climate change adaptation initiatives, such as urban cooling, and surface water management.

## Further reading:

See other national guidance, such as Natural England's Green Infrastructure (GI) Framework including the GI Planning and Design Guide and GI Standards, Canal and River Trust advice (see Annex) and any locally identified needs for sport and recreational facilities. Design code considerations can complement local initiatives to improve use of nature for health and physical activity such as green social prescribing, green gyms and community running events.

## Evidence example - Provision and access to greenspaces

Well-designed greenspace will appeal to different groups. It is inclusive and accommodates people with a range of needs, offering opportunities for play, relaxation, social connections, and meeting a range of physical and mental wellbeing outcomes. (10)

The design code should consider:

### Green infrastructure

- Integrating green infrastructure with streets can encourage active travel and create recreational networks. Maximising use of existing underutilised connections can increase accessibility of greenspaces and lead to physical activity and improved mental wellbeing. For example, by setting a requirement that all households should be within 15-minute walking distance of safe, secure and tranquil greenspaces one can maximise frequency of use subject to Natural England's assessment of Accessible Greenspace Standards. If these spaces are conveniently located and accessible by active travel modes then health improvements are further amplified.
- Unequal access to local green space exists (as highlighted during the pandemic). Often deprived areas have poorer access to local parks and amenity spaces compared with more affluent areas. Amenity spaces and recreational areas should be easily and equitably accessible by all housing tenures.



Meadows and natural habitats provides access to nature and enhances the unique characteristics of the site at Brookleigh, Burgess Hill. © Homes England, photo credit Scott Ramsey

- Spaces designated as public open spaces or communal amenity spaces can be co-designed to create immediate mental-health benefits through meaningful engagement and community interaction.
- Many spaces provide the opportunity for orchards, allotments or community gardens and can thereby improve access to healthier food.
- The range of green spaces should include tranquil spaces and those more appropriate for children or adults who are disabled/neurodivergent.
- Other open spaces should be convivial, exciting, and encourage social interactions.
- Open space should be attractive and comfortable, with sunlight and daylight throughout the year. Intentional tree-shaded (and tree-cooled) areas should be included to mitigate extreme high summer temperatures. Failure to address extreme urban temperatures in summer months will continue to cause adverse health outcomes and fatalities.

### Water and drainage

- Water features and SuDS can have several functions. Ponds, rivers, waterways and other drainage features can be made accessible to local residents. They can be used to cool the immediate environment as well as promote biodiversity.

### Flood risk management

- Consider the impacts of flooding on vulnerable groups, including people who are less mobile or who have a physical impairment (using MHCLG flood risk and coastal change guidance where appropriate). Safe evacuation routes, and clear warning systems should be designed into all development at risk of flooding.
- Allocate accommodation for vulnerable population groups away from flood plains. Evacuation and safety procedures must protect these groups during future extreme weather events.

### Trees

- Street trees and planting mitigate urban heat islands and create healthy microclimates. Certain species of trees do this better, and broad canopied trees can help with urban cooling.
- Specifying and positioning appropriate species of trees can maximise the capture and dispersal of traffic pollutants, improving air quality. (9)
- Positioning street trees and planting can contribute to positive and safe experiences of active travel (for example reducing noise pollution from vehicles)
- The provision of street trees should be discussed with the Council's Highway Team early on in the design process. The forthcoming Manual for Streets update will provide guidance on combining street trees and utilities.



Natural spaces should be accessible, safe, and fun. They should encourage exploration and learning, alongside tranquil spaces for rest and contemplation.





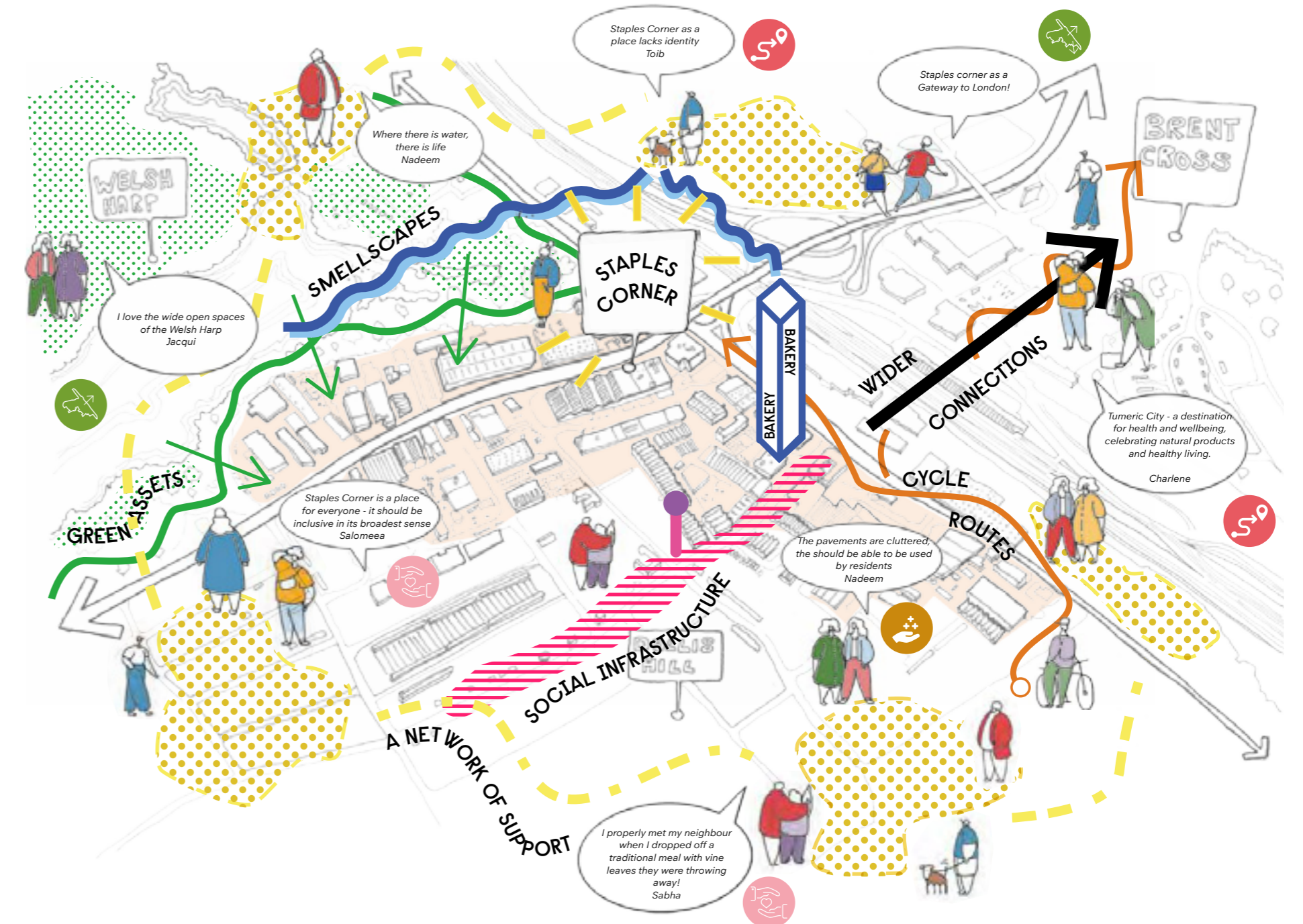
# Case study: Staples Corner Growth Area, Masterplan and Design Code, Brent Council (2024)

Staples Corner is an industrial area of Brent in North London, and has a rich legacy of manufacturing and logistics employment throughout the 20th Century. However, while the area has high accessibility by public transport, several major roads surround it, severing pedestrian and cyclist movement. There are also nearby assets, such as the Brent Reservoir (which is directly adjacent to Staples Corner), but these are largely inaccessible and the area generally has low ecological value.

As part of the vision for the code, the goal is to transform the neighbourhood through development into a high-quality mixed-use area that creates a healthy place to live, while retaining its important employment function. The strategic ambition for the code focuses on creating a 'socially orientated, wellbeing-focused place that allows businesses and communities to thrive' by addressing local health determinants, loneliness, and maximising the benefits of green infrastructure

The code focusses on bringing nature into the area, and maximising opportunities for connections to existing areas of green space, through:

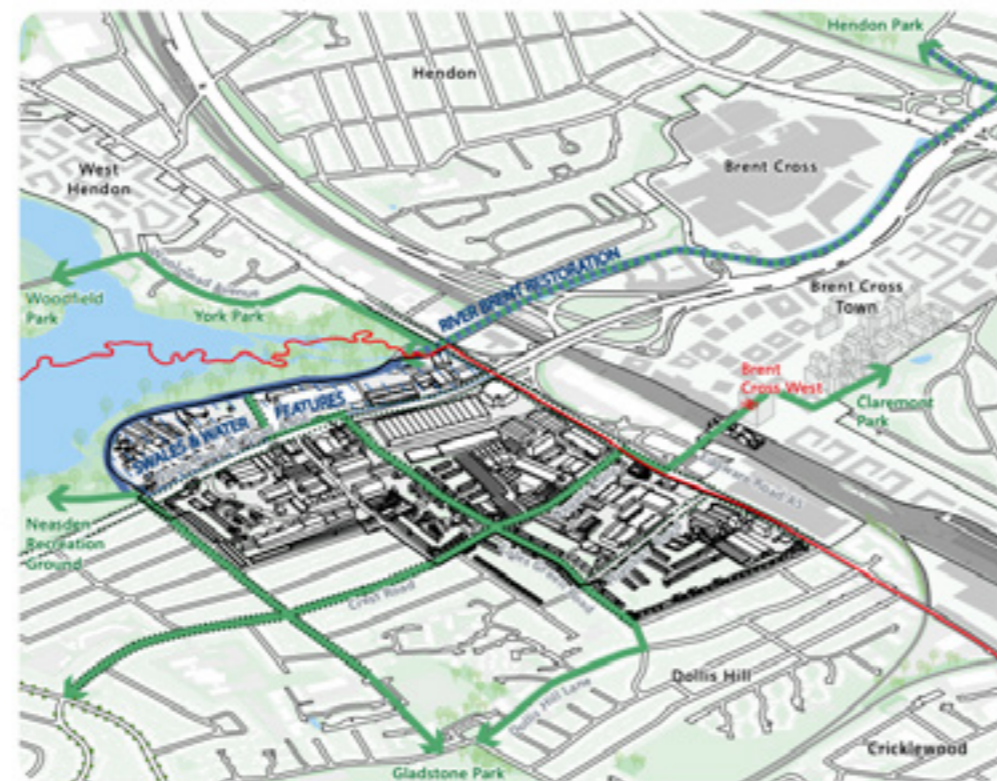
- An area-wide approach to street tree planting, requiring all new and existing streets to be tree lined, with specifications for tree pits.
- A comprehensive area-wide approach to SuDS, mitigating the risk of surface and fluvial flooding in the area. These must enhance biodiversity and local habitats.
- Artificial grass and other planting must not be used anywhere
- An opportunity to explore the re-naturalisation of the River Brent (which currently runs through a culvert)
- Creating new direct pedestrian and cycle connections to nearby green spaces, including Neasden Recreation Ground and the Brent Reservoir.



'Lifespan principles' illustrated in the document.

Images produced by 5th Studio, RCKa and London Borough of Brent.

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- Key
- Green links with street planting
  - Visual amenity corridor preserving wild life nesting
  - River Brent restoration route
  - Swales and water features location
  - Indicative SuDS locations with tree planting
  - Potential for tree-lined streets
  - Borough boundary
  - Design Code area

'Green and blue infrastructure principles' illustrated within the document

Fruit growing and community orchards are a great way to encourage healthy food choices, and also provide opportunities for social interactions.

# B. Built form

## Design code outcome for health:

Well-designed, appropriate densities and configurations of spaces and buildings that promote wellbeing and enable positive and comfortable experiences for social connections and safe and secure homes that provide ample light, good air quality and privacy. At higher densities, unintended consequences such as overshadowing and loss of natural daylight must be avoided.

## Evidence example - Complete and compact neighbourhoods.

Building neighbourhoods with higher street connectivity, diverse land use mixes and greater residential densities can lead to increases in physical activity for all. In particular, appropriate proximity can improve the mobility and social participation of older adults. In turn, this can improve mental health and wellbeing and lower the risk of developing many long term diseases (e.g. cardiovascular disease, type 2 diabetes, musculoskeletal problems, some cancers) (PHE evidence review).

The design code should consider:

### Compact form

- Setting an appropriate density of residential and non-residential developments can support local services and enhance local public transport services.
- Compact neighbourhoods, when supported by essential local community facilities and services can help strengthen social cohesion and reduce loneliness.
- Compact neighbourhoods also reduce urban sprawl, and can encourage more active journeys, thereby reducing reliance on private motor vehicles.
- Appropriate density of development can seek to prevent and minimise loss of amenity such as lack of daylight - for example, applying the “agent of change principle” (NPPF). Avoiding over-densification ensures that people, and especially the vulnerable, are not unnecessarily exposed to effects of adverse quality of living conditions.
- The sense of enclosure across a street can be varied through separation distances and building position. For example, a tighter ‘front-to-front’ distance can help create a sense of ‘urban’ form, which also naturally slows down vehicle speeds.

### Building types

- An increased density of buildings can be achieved by using a range of building typologies, as long as they create (and respond to) a positive sense of character.
- In areas where tall buildings are appropriate, buildings should consider occupant wellbeing, as well as that of people within surrounding streets and spaces. Buildings can be placed and oriented to maximise user comfort of internal and external spaces and mitigate the demonstrable health impact of:
  - negative wind microclimates, including the wind-tunnel effect;
  - overshadowing of public and private spaces and lack of appropriate sun and day-light;
  - overheating of internal living space, and appropriate sun and day-light; and
  - noise and light pollution from day or night-time activities.

## Case study: Bradford Design Code: for new homes and streets in Bradford District, City of Bradford Metropolitan District Council (2023)

The focus of the code is to support the delivery of new good quality urban housing development within the main urban areas of the District – the regional city of Bradford and the principal towns of Shipley, Bingley, Keighley and Ilkley – to help regenerate some of the most deprived wards in the UK.

The design code will be applied to all new housing and residential streets within Bradford’s settlement boundaries to help deliver sustainable development and better streets that will improve health and wellbeing, air quality, safety and biodiversity.

The Code builds on the ‘Homes and Neighbourhoods: a guide to designing in Bradford’ which was also led by Tibbalds and adopted in early 2020. The code requirements are the result of community and stakeholder consultation and address issues that concern residents.


Coding requirements include the design of:

- streets and space to create a high-quality urban living environment;
- the threshold to homes, ensuring that they are safe as well as encourage social interaction and community cohesion;
- homes (internal and external) to ensure they are fit for purpose.


In addition to providing activity and passive surveillance onto streets and surrounding spaces, a building’s entrance must feel safe for its user/s at all times.

### REQUIREMENTS


- Front doors and building entrances must be visible with a clear line of sight from the street/public realm and be clearly identifiable as entrances.
- Communal entrances (e.g. for flats) must provide two-stage entry for security - for example, initial entry to mailbox/delivery area and secondary entry to access building circulation.
- Communal circulation within flats (including the entrance lobby) must provide some amenity for residents, e.g. seating, planting, shared outdoor terraces, child-friendly spaces, etc.
  - Providing circulation via covered outdoor decks can be a healthier, safer, and more convivial solution whilst also allowing dwellings to be dual-aspect (refer E.1).
- Ground floor flats must have their front door accessible from the street.
- In mixed-use buildings, the entrance to apartments must be separate to those for commercial uses, so that they are still highly visible and secure. Access via service yards and the back of buildings is not acceptable.



A well-defined entrance with canopy to provide shelter and a contemporary interpretation of a low stone wall boundary with planting.



A simple bench provides basic amenity within the entrance lobby of flats.



(left) Colourful doorways and a playful treatment to entrances creates a pleasant feel within the generous circulation space for flats at Park Hill Estate, Sheffield.

Defensible space in front gardens can provide privacy, but also a space to grow plants and chat with neighbours.

# P. Public space

## Design code outcome for health:

Inclusive, mixed-use, vibrant and welcoming environments for everyone to experience a local sense of place. Good public space is critical to building strong healthy communities and enhancing individual mental health and wellbeing. Reducing environmental impacts such as noise and poor air quality further enhance the health benefits.

## Further reading:

Transport for London's Healthy Streets, Streets for Healthy Life (Homes England) and Sport England's Active Design (see Annex) can complement community activation, cultural and outreach initiatives.

## Evidence example - Spaces and places for community wellbeing

Having spaces that provide a focal point or a range of activities for targeted social activities can help boost mental wellbeing and promote social cohesion between social and age groups. A physical node of activity can also overcome barriers that may prevent some people (in marginalised groups) from taking part. (12)

The design code should consider:

### Creating Healthy Streets

- New development (where adequately sized) should provide a network of connected pavements of appropriate width, designed to accommodate walking, cycling and wheeling for users of all abilities. This network can encourage activity, provided it remains sufficiently wide, well-maintained, and free from any barriers.
- Temporary or permanent opportunities for Home Zones, Play Streets or Low Traffic Neighbourhoods can be provided on local and secondary streets, particular in areas with high populations of people with disabilities, children and older people.
- Regular opportunities for seating can enable those who are less mobile (for example the elderly) to participate in public life.
- Consider involving urban design, highways, local civic societies and business improvement districts, to support the creation of inclusive public realm strategies for all users. Strategies can incorporate the use of digital technology (such as the NHS Healthy New Town BetterPoints app and the Get Active in Ebbsfleet challenge), (11) to make it easy and fun to use and enjoy public spaces.

### Promoting Social interaction

- Design places with a network of multi-functional public spaces for: community activities; play; social seating; picnics and relaxation; and informal spaces for 'incidental' social connections.
- Think beyond the standard response of providing playing fields for sport and recreation and consider the whole population and broad range of abilities. This can be met by including outdoor gyms, table tennis and play for children and adults alike.
- Prioritise inclusive play elements for all children and young people that can encourage them to stay active. This can include space for girls, as well as quiet zones for neurodiverse members of the community.
- When designing shared public or private spaces, consider whether 'defensible' spaces will physically or visually discriminate against their inclusive use and enjoyment by all groups.

### Secure public spaces

- Designing for crime prevention in all settings can align with the main objective of meeting the health and wellbeing needs of users. Emphasis should focus on people disproportionately affected, such as women and girls. Design principles should promote enjoyment of public spaces, for example the right selection and placement of lighting and suitable seating.



Free public toilets, benches and water fountains make it easier for many people to engage in public life



Attractive public space should provide space for a range of activities, and feel well overlooked.



# Case study: Northstowe Healthy Living and Youth & Play Strategy, Homes England (2018)

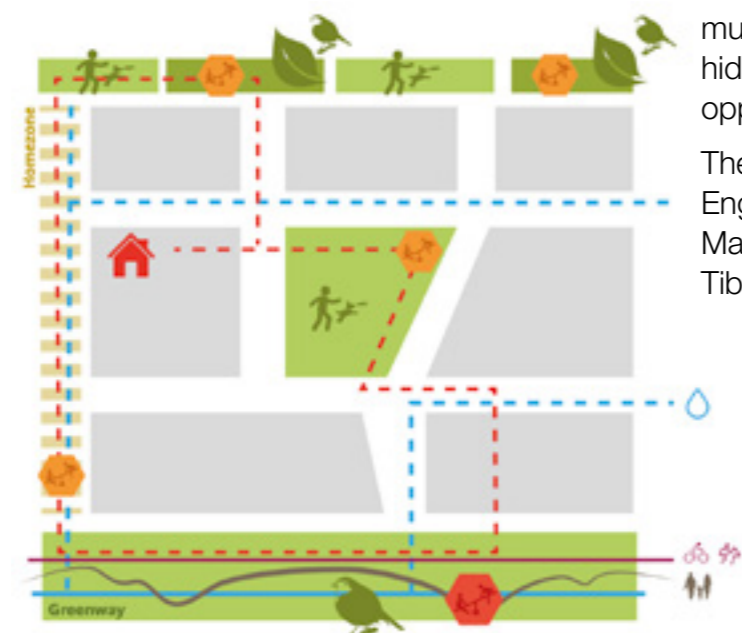
Northstowe is one of the NHS England's Healthy New Towns, which aim to help shape the health and wellbeing of new communities by radically rethinking how we live and can improve health through design of the built environment.

The Healthy Living and Youth & Play Strategy for Northstowe Phase 2 combines a strategy to address the needs of children and young people with a healthy living strategy for the whole community. It is based on evidence about local health and planning contexts and includes an implementation plan. Its objectives include ensuring that outdoor play and recreation, and contact with nature, are part of everyday life through the seasons. It takes an imaginative, inspiring and nature-focused approach to encouraging physical activity, independence, social interaction, access to nature and community identity. Cycling and pedestrian pathways are included, as well as skateboard and scooter paths, landscaped with sensory and seasonal plants.

The first section of the document highlights a Youth and Play Strategy, and highlights the importance of play. It establishes ten principles to create successful play spaces, and covers the need to provide play for kids, teenagers, adults and older people. Play should be outdoor, unsupervised where possible, include sequential and incidental play elements, and provide a safe, memorable and social experience for everyone with a diverse range of needs. The diagram below highlights a theoretical route around the neighbourhood, explaining a range of opportunities available to residents in Northstowe, incorporating water, nature, and art trails.

The second part of the document covers a Healthy Living Strategy, which provides a definition of 'healthy living', and outlines the measure to increase physical activity and promote a vibrant and sociable urban experience. The layout, routes, and amenity spaces within the masterplan facilitate and encourage a wide range of activities, including art trails, a skateboarding track, and various walking loops. Designers have also prioritised measures to enhance contact with nature for mental wellbeing, through the introduction of multi-sensory gardens, access to water, bird hides and feeding stations, and food growing opportunities.

The Strategy was prepared on behalf of Homes England by CBA in collaboration with Catherine Max Consulting, Rethinking Childhood and Tibbalds Planning & Design.



A theoretical walk in a Northstowe neighbourhood illustrating 'play on the way' principles. Credit: © CBA



- KEY
- Neighbourhood Equipped Area for Play (NEAP)
  - Local Equipped Area for Play (LEAP)
  - Space for Imaginative Play (SIP)
  - Local Area for Play (LAP)
  - Destination Play Catchment Zone (NEAP 1000m, LEAP/SIP 400m, LAP 100m)
  - Existing Play Area (Rampton Drift)
  - Existing Play Area (Outside Northstowe Phase 2)
  - Northstowe Phase 1 Play Area
  - Doorstep Play/Streets Designed to Homezone Principles (indicative locations)
  - Incidental play, social gathering and senior play within Formal Greenway, Town Park and Linear Urban Park
  - Social gathering and informal play within Education Campus and School Thresholds
  - Informal play and sport provision between Education Campus and Eastern Sports Hub
  - Play within formal open space
  - Nature themed play/ informal incidental play
  - Informal water and nature themed play within Water Park
  - Informal heritage and nature themed play within Paddocks Parkland
  - Play provision within Education Campus and School Ground Orchard
  - Allotment/Community Garden
  - Playful interaction with nature
  - Food, productive landscape and orchard themed play
  - Water themed play
  - History and heritage themed play
  - Outdoor gym
  - Informal ball sports provision

The play strategy for Northstowe Phase 2 illustrating a range of interventions

Credit: © CBA

# U. Use

## Design code outcome for health:

A complementary mix of health promoting land uses and community infrastructure and commercial centres that positively shapes people's day-to-day decisions and enabling their healthier behaviours and different sensory experiences.

## Further reading:

Consider locally identified needs for community infrastructure such as health and social care, community and faith facilities.

## Evidence example - Access to community infrastructure

Mixed use developments that provide local amenities can promote active travel, improve mobility and social engagement among older adults. Prioritised access to schools, recreational and social amenities can increase physical activity among children, adolescents and older adults (PHE evidence review).

The design code should consider:

### Mix of uses

- A mix of uses can meet local needs and support social and economic activity. This can further encourage healthy behaviours, such as physical activity, by walking or cycling to local services and employment or healthy eating through convenient access to allotments or community gardens .
- The careful combination of compatible land uses can mitigate negative environmental impacts, such as noise, light and air pollution, through the orientation of buildings, screening and additional noise insulation where required (for example between commercial and residential floors).
- Promote land uses that support health improvements, including preventing proliferation of particular uses where evidence demonstrates their impact and harm on public health, such as:
  - lack of open space;
  - lack access to food stores that provide healthy eating opportunities or the overprovision of fast food outlets next to schools;
  - isolated employment areas; or
  - poorly designed industrial uses adjacent to housing.

### Housing for all

- A variety of housing types and tenures in line with local plan policy requirements provide for housing needs for priority and vulnerable groups. This should include accessible and adaptable housing in all housing types and tenures, specialist and supported housing for older people, the homeless, those with specific needs, and key workers.
- Tenure-blind housing can be conducive to all occupants within the same block or building having equitable access to amenity spaces and any associated entrances and facilities.

### Local services

- On larger developments, a mix of community facilities should be provided, including healthcare facilities such as GPs, dentists, chemists (where appropriate).
- Integrating safe and free public toilet infrastructure, and public drinking-water fountains in accessible locations. This can support community health, including providing confidence for the elderly, and hydration for those who have medical conditions.

The interface between buildings and streets can be carefully designed to improve health outcomes. In this case, the local library has external seating ledges to encourage conversation and interaction.

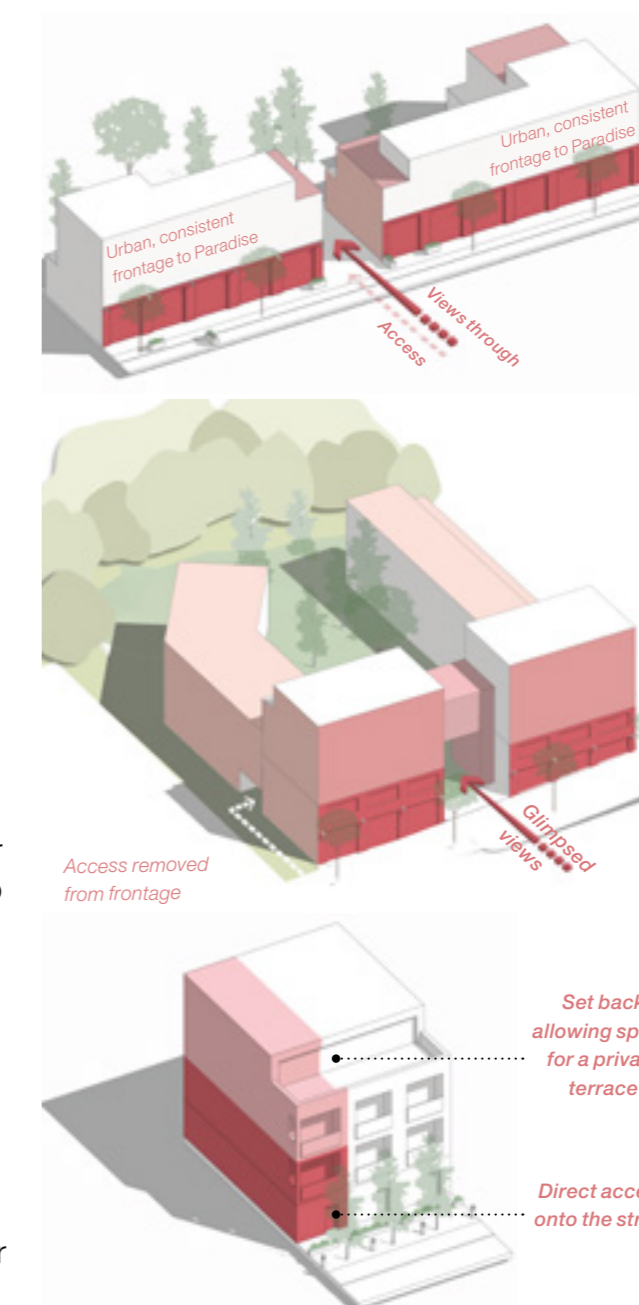


## Case study: Paradise Design Code, Dacorum Borough Council (2022)

As part of the Pathfinder Design Code programme, the code sets parameters and coding principles to enable the transformation of an industrial area of Hemel Hempstead into a mixed-use neighbourhood. This document covers important aspects of the development, including identity, movement, and built form, but also cleverly establishes the strategy and configuration of a variety of residential and non-residential uses.

The document establishes a strategy to mix uses together, while using the code to identify areas on the ground and first floors where developers can apply flexibility between residential and non-residential uses to respond to market demand. Non-residential uses at ground floor complement residential spaces above, and the code carefully considers the entrances, configuration, and privacy and interaction of these uses. The design of the spaces is also inherently flexible as to be able to accommodate a range of uses/occupiers (for example orthogonal floorplates, specific floor to ceiling heights).

Whilst the design team created the use plan to instil flexibility, some locations lend themselves to certain uses— for example, a café or community space on the main thoroughfare, which would create spill-out space into the public realm. Similarly, industrial floorspace is indicated close to vehicular access, and commercial courtyards create space for smaller businesses. In all, this means that employment opportunities exist within the development, as well as leisure and community uses, all within the curtilage of a new neighbourhood. The code also identifies direct linkages to other nearby uses such as schools and the town centre, and pedestrian links to nearby open space.



Illustrations within the document show how different typologies and built forms can be accommodated into the new neighbourhood.

Credit © Tibbalds



# H. Homes and Buildings

## Design code outcome for health:

Providing affordable, suitable, secure and energy-efficient building environments with appropriate low to zero carbon technologies. The building's external and internal design have significant effect on people's physical and mental health and wellbeing.

## Further reading:

Consider appropriate standards for accessibility, energy efficiency and space standards that can improve occupant health and quality of life. Design requirements can incorporate local strategies on retrofitting and/or initiatives tackling fuel poverty, homelessness, and outreach activities led by healthy homes champions/officers.

National Institute for Health and Care Excellence (NICE) guidance on health in specific settings can provide direction on requirements for specialist housing and receiving social care in the home (see Annex); Healthy Homes Guide (TCPA); HAPPI standard.

The design code should consider:

### Whole home and building approach

- Coherent place-based approaches can leverage opportunities from developer contributions to align investment in initiatives for redeveloping or retrofitting existing homes and neighbourhoods to help vulnerable people stay healthy at home.
- Consider the adaptability of homes and buildings across the resident's life course and their specific needs.
- Developing a lighting masterplan for large public or open spaces, in collaboration with communities, lighting designers, and engineers. This can ensure perceived and actual security for all users, particularly women and night economy workers, while protecting against light nuisance and adverse ecological effects from levels of inappropriate lighting (Royal Commission on Environmental Pollution).

### Building outlook

- Direct physical and visual access to private or semi-private space can support physical and mental wellbeing.
- Designing development layouts to separate noise-sensitive areas from noise-generating areas can minimise the impacts of noise, such as enhanced sound insulation for high density housing, or areas of mixed use.
- Consider locating housing for older or vulnerable people away from land uses that may cause unacceptable risks of harm, and designing windows to open away from sources of outdoor pollution.
- Appropriate separation distances, and defensible space, can allow occupants to feel safe and private in their homes.

### Indoor environment

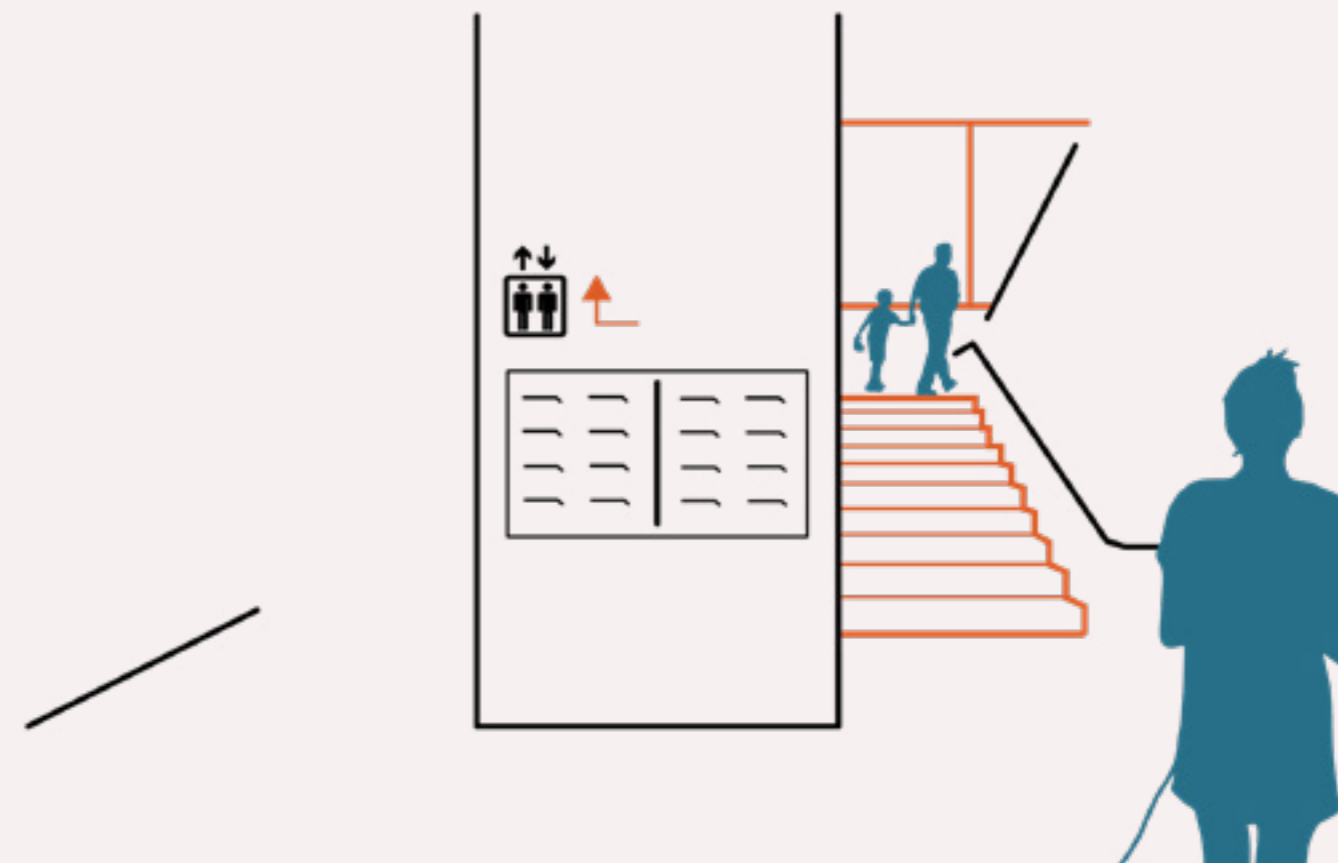
- Adopting a whole-building approach to zero-carbon heating and ventilation technologies can ensure indoor air quality and climate remain maintained while achieving energy efficiency.
- Designs for homes can take a needs-based approach to meeting space requirements by ensuring there is reasonable allocation of space for residents to for example:
  - undertake physical activity in the home and / or communal areas and have storage for equipment to support an active lifestyle, e.g. bicycles.
  - cook and have enough space for the entire family to dine at home.
- For multi-family homes and other taller buildings, designing safe and secure stairs in a visible area with equal or greater prominence than lifts, can encourage active behaviour.
- Homes that are dual aspect wherever possible can bring natural light and ventilation to make homes healthier. Mechanical Ventilation with Heat Recovery (MVHR) systems reduce the chances of damp and mould.
- Ensuring appropriate levels of glazing in combination with sun shading can balance sufficient natural internal lighting and risk of overheating (particularly for elderly and more vulnerable occupants).
- Access to external private spaces, such as gardens or balconies, is key to people's physical and mental wellbeing. Private outdoor amenity space should also be provided for ground floor flats too. External amenity space should have enough space to dry clothes, which reduces the risk of damp inside homes. Consider setting minimum standards for provision and the size of these amenity spaces.

### The detail

- The design of buildings can encourage social interaction and neighbourliness by for example:
  - Creating attractive threshold spaces, where some defensible space is created to include e.g. a table and chairs to chat with neighbours.
  - Creating deeper windowsills on groundfloor windows to invite sitting (inside or outside) or providing benches in front gardens for the same reason.
  - For public buildings to have inviting entrances and large windows to lower the threshold that some people may feel about entering and ensure the building is inclusive and accessible.
  - Not creating second tier entrances for those that are less well-off and providing an inclusive environment inside and outside the building.

### Evidence example - Warm Homes

Well-designed, energy efficient and adaptable housing to support people to live in warm comfortable homes can improve health outcomes (including mental health and respiratory conditions) and reduce mortality. These benefits may be particularly important for those in low-income groups, older or vulnerable people, and in areas with high prevalence of fuel poverty (PHE evidence review).



Carefully designed lobbies and vestibule areas can encourage gentle activity. In this case, the stairs are the convenient light-filled alternative to the lift.



Deep window ledges provide a space to perch, to sit with a coffee, or chat with neighbours.

# Case study: Healthy Homes Principles, Town and Country Planning Association and Lewes District Council

To improve best practice, the Town and Country Planning Association launched their Healthy Homes campaign, which establishes a set of principles that can be used as a framework to radically improve the quality of new homes. The principles have been established to help LPAs instil these into policy, which is supported by a larger overarching national campaign to develop the 'Healthy Homes Bill', which would amend proposed legislation to help end the creation of unhealthy homes.

One of the Councils that have placed healthy house building at the centre of their housing delivery programme is Lewes District Council. In 2021, the Council approved a motion to become the first Council to adopt the TCPA's Healthy Homes Principles. The principles now form part of the Council's Housing Delivery Programme 2024-2028, and in time will be integrated into the Local Plan review, and wider Council policies and strategies. Similarly, the Healthy Homes Principles will also be encouraged to be used through local design codes to form a core part of the Council's decision making on housing and planning.

Within Principle 2: Building Quality and healthy homes, the Council will:

- Strive to deliver the Healthy Homes principles
- Develop new build homes to Nationally Described Space Standards, ensuring homes are spacious, naturally lit, comfortable, fit for purpose, and include adequate space for storage.
- Ensure new homes have exemplary levels of fire safety
- Design homes for both current and future generations, encouraging multigenerational and co-living, exploring 'non-traditional' housing types.
- Deliver open spaces and external amenity spaces, alongside new growing spaces and community gardening initiatives, where possible.
- Deliver a net biodiversity gain in excess of planning requirements, where possible



Pictures © Lewes District and Eastbourne Borough Councils



# L+R. Lifespan and Resources

## Design code outcome for health:

Places and homes that grow and mature and withstand environmental changes. Buildings that endure over time and can become part of the future heritage of the area. Adaptable homes that suit individual needs as these change throughout a lifetime. People have a stake in their neighbourhood, and feel engaged in their locality.

The design code should consider:

### Stewardship and management

- Robust community management systems and stewardship programmes can give residents an opportunity to be involved in local decisions, and strengthen community ties.
- Places and building that are well looked after create a sense of pride. Good maintenance can reduce negative and stressful situation as a result of broken lifts, delayed repairs and uncared for open space.
- The long term management of a community asset – for example a public hall and open space – can be much more successful if the future community is involved in the design process from the start.
- Practical maintenance and management of shared communal facilities, for example shared gardens, can provide opportunities for residents to meet their neighbours as well as keep active.

Homes that can adapt to the changing health or age of residents, can mean that people can stay in their homes longer, and remain connected to their community and support network.

### Energy usage and resources

- Homes are thermally comfortable, and designed to reduce overheating in summer months. Various design measures, including planting trees, installation of internal and external blinds, louvres on a façade, and ventilation systems can help create comfortable internal and external spaces.
- Where possible, the retention and re-use of existing buildings can save resources and link the residents to the heritage of the place. This can instil a sense of local pride and belonging.



Passivhaus development at Goldsmith Street in Norwich (credit: David Edleston).

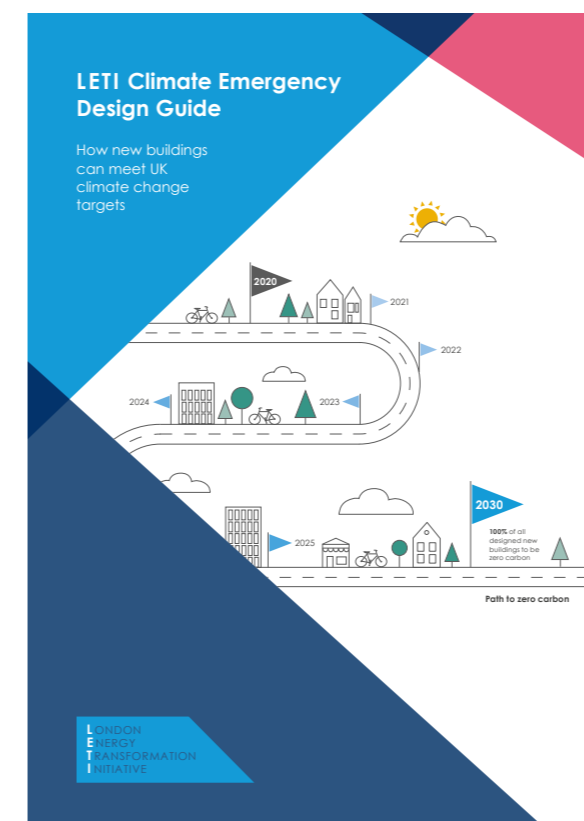
## Case study: LETI Climate Emergency Design Guide, London Energy Transformation Initiative (2020)

Buildings are responsible for 49% of the UK's annual carbon emissions. The LETI Climate Emergency Design Guide provides best practice guidance to ensure all new buildings achieve net zero carbon standards, while fostering environments that enhance public health. It is specifically aimed at urban designers, architects, designers, developers, as well as policy makers. The Climate Emergency Design Guide covers 5 key areas: operational energy, embodied carbon, the future of heat, demand response and data disclosure.

Buildings that consider a whole lifecycle approach, are sustainable and low-energy, can also be much better for public health. The guide outlines the following ways to make healthy climate resilient places and buildings:

- Indoor Air Quality: Ventilation systems such as mechanical ventilation with heat recovery (MVHR) with 90% efficiency can maintain clean, fresh air indoors while minimizing energy loss.

- Thermal Comfort and Overheating Prevention: Using high-performance building envelopes, external shading, and optimised glazing can reduce overheating risks.
- Access to Daylight: Designing spaces that balance natural light while mitigating glare can enhance psychological well-being and productivity.
- Adaptable to future challenges: Incorporating flexible design approaches can accommodate emerging technologies and support future decarbonisation of national energy systems.
- Long-term management and monitoring: Continuous energy monitoring and post-occupancy evaluations are highlighted as essential for closing the performance gap and ensuring buildings meet their net zero targets.



### Heating and hot water

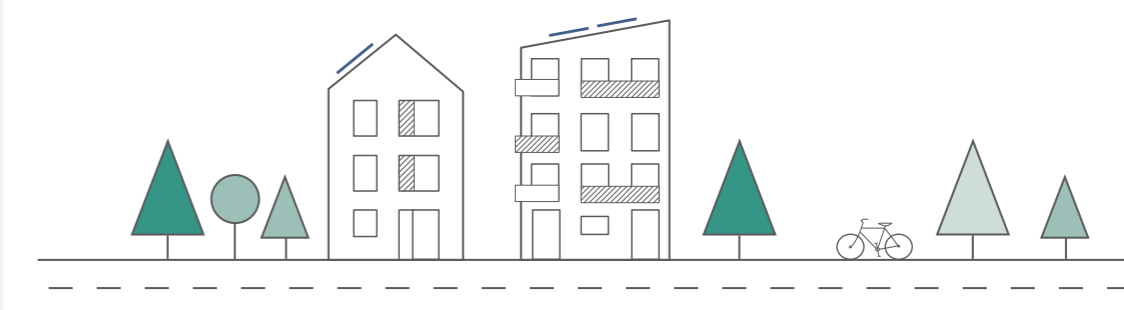
Implement the following measures:

- Fuel**  
Ensure heating and hot water generation is fossil fuel free
- Heat**  
The average carbon content of heat supplied (gCO<sub>2</sub>/kWh.yr) should be reported in-use
- Heating**  
Maximum 10 W/m<sup>2</sup> peak heat loss (including ventilation)
- Hot water**  
Maximum dead leg of 1 litre for hot water pipework  
\*Green\* Euro Water Label should be used for hot water outlets (e.g.: certified 6 L/min shower head – not using flow restrictors).

### Demand response

Implement the following measures to smooth energy demand and consumption:

- Peak reduction**  
Reduce heating and hot water peak energy demand
- Active demand response measures**  
Install heating set point control and thermal storage
- Electricity generation and storage**  
Consider battery storage
- Electric vehicle (EV) charging**  
Electric vehicle turn down
- Behaviour change**  
Incentives to reduce power consumption and peak grid constraints.



Measures to help buildings meet climate targets.



# 8 Design at scales

The design themes set out in Section 7 can be applied at a range of design scales. A design code may be focussing on a specific site, with known context and boundaries, or it may be a code which focusses on a wider area-type such as a residential neighbourhood or commercial area.

The design themes therefore should be applied at an appropriate level of detail dependent on the scale. To illustrate this, three scales are identified:

- a local authority scale
- a neighbourhood scale;
- and a plot or site scale.

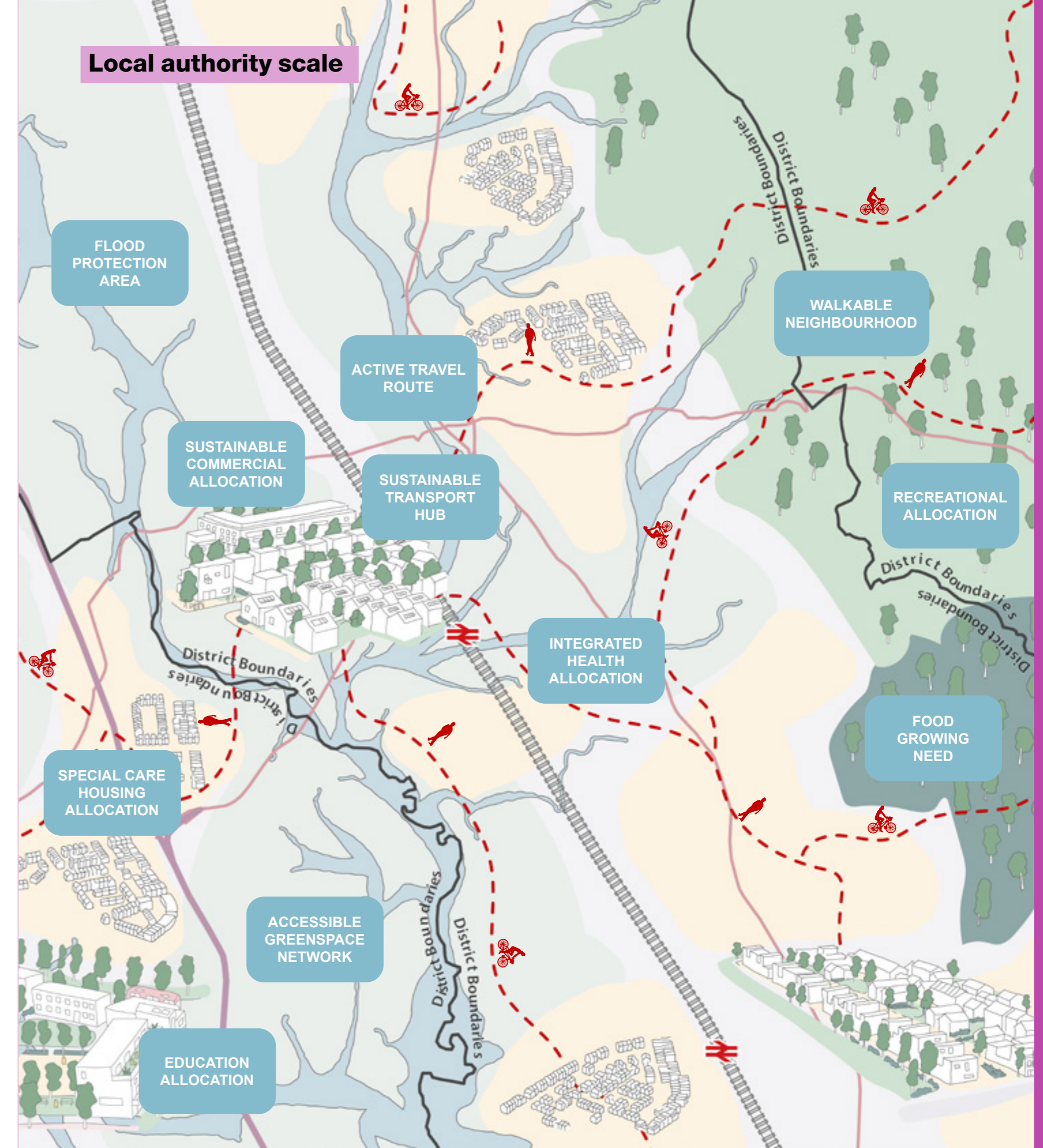
## Design considerations at the local authority scale

At the local authority scale, the aim of the design code should be to optimise land use allocations, provide essential infrastructure and connectivity and manage the relationship between new and existing neighbourhoods. This will support a healthy population and identify opportunities to address geographical disparities between communities and areas. This means, for example:

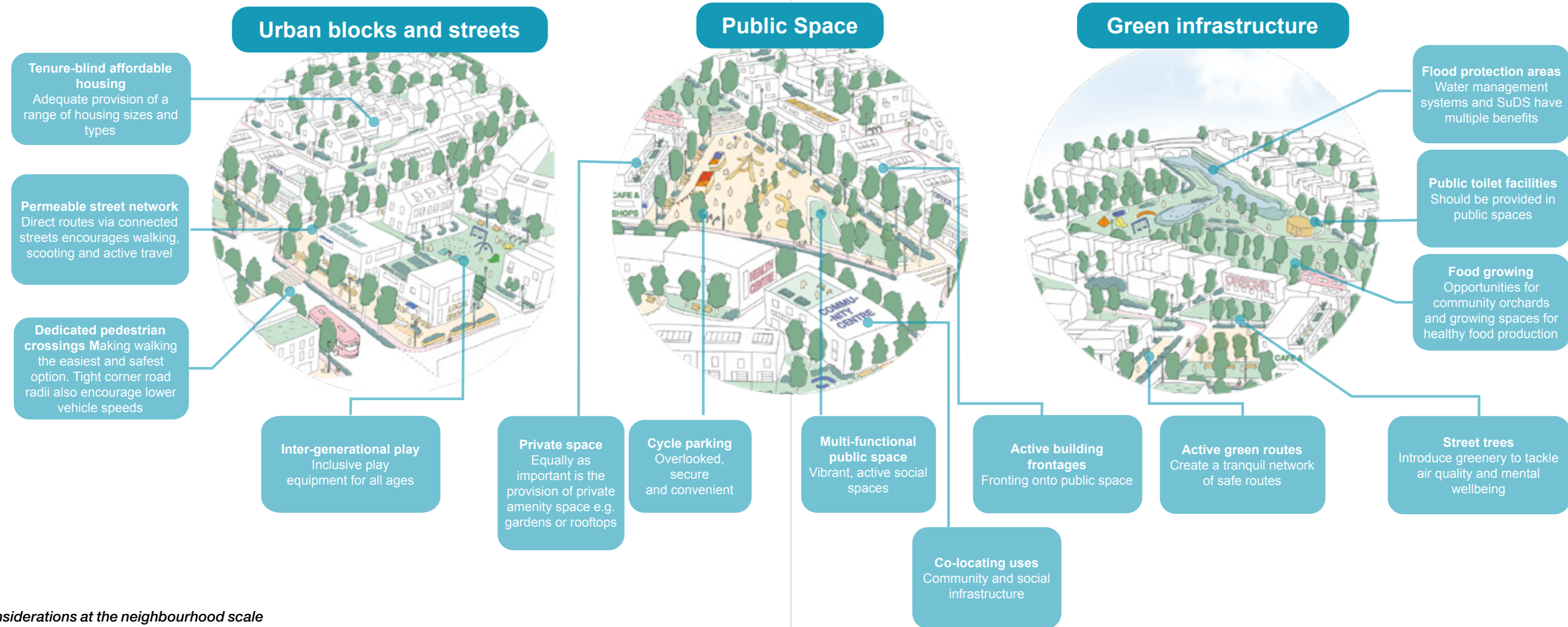
Strategic land use and infrastructure planning to go hand in hand. Map and integrate across the local authority health and wellbeing centres; community health; social care and emergency services; nature recovery networks; land for food growing, recreation, water catchment, and leisure. Where necessary this needs to be done across two or more local authority areas.

Compact and walkable neighbourhoods designed to meet the specific and everyday needs of people.

Map and identify active travel routes and public transport routes to make walking and cycling and public transport convenient and easy option for travel to services and destinations.



## Neighbourhood scale



### Design considerations at the neighbourhood scale

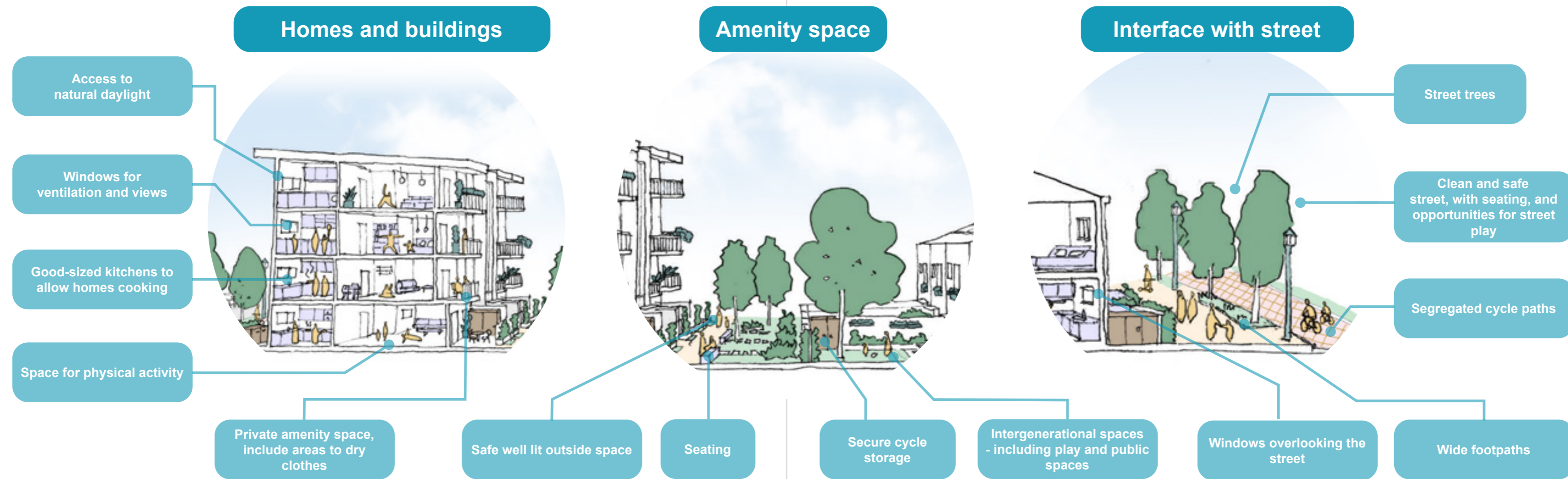
At the neighbourhood scale, the aim of the design code should be to better understand and manage local health and wellbeing needs so everyone and every land use in the community can live, work, and play in harmony over the lifecourse. This means, for example:

Essential and leisure services and facilities are designed coherently, and accessible within reasonable walking distance (5-10 minutes). Or, are accessible through other active travel means (for example cycling), to increase levels of physical activity.

Accommodate the way different groups and individuals across all abilities and needs can have a positive and safe experience of the public realm and the natural environment.

Address existing shortfalls, such as access to play and nature. Ensure spaces are well designed and have the ability to minimise health impact from changing future needs (such as adapting to climate change).

## Plot or site scale



### Design considerations at the site and plot scale

At the site and plot scale, the aim of the design code should be to optimise the physical and mental health benefits from the streets, spaces and buildings for occupants as well as the surrounding community. This means, for example:

- Meeting people's housing needs in terms of the size, tenure and layout of homes, including multi-generational and mixed use living to support social cohesion.
- Development densities that can support services and facilities and layouts that ensure residents safety, security and protection from environmental hazards.
- Design solutions for building structure and internal environments to provide comfort for occupants and meet their everyday and any specific needs.

# 9 Implementation



Taking a systems approach to designing healthy places can secure the quality of spaces and places as intended in a health-focused design code, while ensuring health outcomes and expectations can be met through a considered approach to public health involvement.

## Tools and processes

Paragraph 133 of the NPPF (2023) encourages LPAs to have access to tools and processes needed to assess and improve the design of development. Some of these tools and processes can be particularly useful for enabling and securing public health involvement and highlighting key health considerations in adopted design codes (See Table 3).

**Table 3. Examples of implementation tools supporting a health-focused design code**

<b>Design review</b>	Provide expert public health feedback. Many local authorities or regions have established multi-disciplinary design review panels. See Design processes and tools under “Design Review”.
<b>Health impact assessment</b>	Inform stages of design concepts and post-completion evaluation by undertaking a systematic and participatory assessment with relevant experts and affected population groups. Follow OHID guidance on HIA in planning and refer to, for example, use of HIA in the Essex Livewell Accreditation Scheme process. (13)
<b>Assessment Frameworks</b>	Allow developments to measure performance. For example, Building for a Healthy Life assessment.
<b>Place or walking audits</b>	Conduct an objective evaluation of the condition and performance of completed neighbourhoods and homes based on first-hand experience with relevant experts and affected population groups. For example, the NHS Health Scotland’s Place Standard Tool. (14)
<b>Public involvement tools</b>	Use tried and tested tools for public involvement such as from the voluntary, community and social enterprise sectors or specific user groups in the planning and design process. For example, Voice Opportunity Power, a toolkit to involve young people in the making and managing of neighbourhoods. (15)
<b>Measuring impact</b>	<p>Further work needs to be undertaken to help develop metrics and indicators to measure the impact of these design principles. Understanding the value (monetary, or social, or economic) of these design principles and interventions will help:</p> <ul style="list-style-type: none"> <li>■ Local Authorities (to focus resources in the most efficient areas)</li> <li>■ LPA planners (with strategic plans and spatial policies)</li> <li>■ Architects and developers (in creating healthy places, and in viability calculations)</li> </ul> <p>TRUUD (Tackling Root Causes Upstream of Unhealthy Urban Development) are developing one such metric ‘HAUS’. The ‘Health Appraisal of Urban Systems Model’ (HAUS) will quantify and value the health impacts of different characteristics of the urban environment. As this is developed, and other tools come forward, measuring the health value of these design code interventions should become easier and more practical.</p>

A collaborative and systems approach to designing healthy places should be taken

## Digital readiness

Many implementation tools take the form of digital platforms and frameworks. Creators should ensure that the data provided can be easily accessed and used to aid the health-promoting design process by local authorities, the general public and public health stakeholders.

While design codes are technical documents, they also need to be used to inform and engage with the wider community and non-experts so they must be easy to find, use, understand and trust.

## Monitoring

Establishing a framework of monitoring and compliance at the start of preparing a health-focused design code can enable the comparison of development outcomes to the design code. Consider who is best placed to prepare this and through what methods.

Most design codes will need to evolve throughout their lifespan in response to changing local needs and demands, and as a result may require review and revision (see NMDC).

## Evaluation

Evaluation can help to assess whether the design code has achieved its health improvement goals. When done well, the evaluation itself and the data gathered can help solve problems, inform future decision making and build knowledge. Given that the development process can take years for larger sites, the evaluation process should include post-occupancy evaluation of individual buildings or phases to ensure lessons are learned throughout the implementation process.

There are different types of evaluation, including process evaluation, outcome evaluation and economic evaluation. The most appropriate approach will depend on the local circumstances and goals. A formal evaluation process may be appropriate for a more complex multi-phase developments that stretch over many years. Whereas for others, an iterative process may be best. Frameworks need to be tailored to specific circumstances, however general steps include:

- a. defining your evaluation questions. What health goals and wider co-benefits do you want to achieve, what outcomes will you assess, for whom, and over what time frame?
- b. identifying the availability of qualitative or quantitative data and opportunities for data collection, which may include national public health metrics (e.g. on use of outdoor space, loneliness) and data generated at the post completion stage.
- c. analysing the data collected in stage (b). to answer the questions defined in stage (a).
- d. clarifying the implications of the findings and producing recommendations.

Defining appropriate indicator metrics in advance will help ensure the intended health benefits and wider co-benefits are achieved. Broadly, examples could include both process and outcome indicators linked to community satisfaction, public health outcomes and service level outcomes.

Considering evaluation from the outset is important to maximizing its usefulness. Exploring who is best placed to conduct evaluation early in the process is key. A variety of options should be considered, including local academic partners who may be willing to support.

# 10 Action checklist

This checklist can be used as a reference for actions relevant for different audiences (marked with a ●) who wish to develop a health-focused local design code.

## Design coding process

	Local Politicians/Councillors	Urban design expert	Neighbourhood planning group	Local planning authority	Local public health team
Initiate and secure cross departmental collaboration and meaningful involvement across the local authority, including public health team.	●			●	●
Inform the local authority public health team on the process and objectives of the project		●	●	●	
Identify health challenges and disparities within the area.				●	●
<b>Design code</b>					
Align the design code vision to local commitments to improving population health and wellbeing	●	●	●	●	●
Ensure meaningful and representative community outreach and involvement in the process	●	●	●	●	
Demonstrate health considerations are based on relevant and up to date evidence			●	●	●
Ensure design considerations address health inequalities		●	●	●	●
Demonstrate how identified local health and well-being needs have been addressed through design considerations for different localities and area types			●	●	
Review whether any other design requirements have the potential to undermine and contradict those that address local health and wellbeing		●	●	●	●
Consider and signpost to relevant guidance and good practices (see Annex)		●	●	●	
<b>Implementation, monitoring and evaluation</b>					
Assess whether the local plan can support and validate relevant design code requirements for health				●	●
Establish implementation of the design code in support of local strategies to improve health and well-being	●			●	●
Determine how the implementation of the design code can be supported through existing mechanisms such as design review panels or use of health impact assessment				●	
Scope a supporting programme of monitoring and evaluation with the right level of resources, governance and accountability	●		●	●	●
Secure involvement of local authority public health teams in implementing the design code through the development process	●			●	●

Good definition between public and private areas is created by this landscaping.

# 11 Glossary

**Design code** - A set of illustrated design requirements that provide specific, detailed parameters for the physical development of a site or area. The graphic and written components of the code should build upon a design vision, such as a masterplan or other design and development framework for a site or area.

**Health disparities or health inequalities** - Avoidable and unfair differences in physical and mental health between different groups of people or communities. Factors associated with such disparities include socio-economic status and deprivation; vulnerable groups (such as homeless people, Gypsy, Roma and Irish Travellers); protected characteristics (such as age, sex, ethnicity, sexual orientation, disability, pregnancy and maternity, religion; or area differences.

**Healthy places** - The Planning Practice Guidance describes a healthy place as one which supports and promotes healthy behaviours and environments and a reduction in health inequalities for people of all ages. It will provide the community with opportunities to improve their physical and mental health, and support community engagement and wellbeing.

**Masterplanning** - Masterplanning is a collaborative design process to create high standards for places. It provides a structure for how to plan and implement a vision for a place. A masterplan can range from strategic sites to small neighbourhoods. Masterplans show how places can work better in the future and what needs to be coordinated and controlled to achieve this over time.

**National Planning Policy Framework** - The Government's planning policies for England and how these are expected to be applied in plan-making and planning decision-making.

**Urban design** - Urban design is a collaborative process of shaping where we live and our lived experience. The Urban Design Group defines urban design to involve "the design of buildings, groups of buildings, spaces and landscapes, and establishing frameworks and procedures that will deliver successful development by different people over time."

**Wider determinants of health** - The "causes of the causes" of health, such as the social, economic and environmental conditions that influence the physical and mental health and wellbeing of individuals and populations such as good quality housing, access to jobs and equal opportunities in access to nature.

Play features should be imaginative, and respond to the character of the environment a development sits within.

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16. *Health disparities and health inequalities: applying All Our Health*. Office for Health Improvement and Disparities (2022).
17. *The Health Consequences of Urban Planning: The Presage*. Johns, A. (2024). Cambridge Scholars Publishing.
18. The Health Foundation. *What builds good health? (2024)*. Available from: <https://www.health.org.uk/news-and-comment/charts-and-infographics/what-builds-good-health>.
19. [Diagram]. *From transition to transformation in public health*. Local Government Association and the Department for Health. Available from: <https://www.local.gov.uk/sites/default/files/documents/resource-sheet-2-understa-b9d.pdf>
20. *Social Capital and Health Outcomes*. Kawachi, I., & Berkman, L. F. (2000). *Social cohesion, social capital, and health*. *Social Epidemiology*, 174(7), 51-73.
21. *What 'health' means and why it matters*. Black, D., Coggon, J., and Hatchard, J. TRUUD. (2024). Available from: <https://truud.ac.uk/wp-content/uploads/2024/07/What-health-means-and-why-that-matters-July-2024.pdf>

# 13 Annex

## Summary of supporting evidence and other relevant guidance

This advice note draws on a range of evidence-based guidance, government guidance and stakeholder expertise. It builds upon and can be reviewed alongside previous summaries of systematic reviews and other academic literature notably Spatial Planning for Health: An evidence resource for planning and designing healthier places. The following table outlines additional key documents.

British Standards Institute, PAS 6463. Design for the mind. Neurodiversity and the built environment, 2022
Campaign to End Loneliness. Tackling Loneliness through the Built Environment, 2022
Canal and River Trust. Waterways & Wellbeing. Valuing Our Waterways Aggregate Benefits to Society and the Economy, 2022
Carmona M, Clarke W, Quinn B and Giordano V. National Model Design Code (NMDC) Pilot Programme Phase One, Monitoring & Evaluation, 2022
Chartered Institution of Building Services Engineers. TM40. Health and wellbeing in building services, 2020
Commission on Creating Healthy Cities. What Creates Healthy Cities, 2022
Design Council: <a href="https://www.designcouncil.org.uk/our-work/projects-partnerships/design-codes">https://www.designcouncil.org.uk/our-work/projects-partnerships/design-codes</a>
Department for Transport, Cycle Infrastructure Design, 2020
Department for Transport. Inclusive Mobility. A Guide to Best Practice on Access to Pedestrian and Transport Infrastructure, 2021
Department for Transport. Manual for Streets, 2022*
Environment Agency. The social benefits of Blue Space: a systematic review, 2020
Environmental Protection UK and Institute of Air Quality Management. Land-Use Planning & Development Control: Planning For Air Quality, 2017
Homes England. Streets for a Healthy Life: A companion guide to Building for a Healthy Life, 2022
Institute of Acoustics, Chartered Institute of Environmental Health and Association of Noise Consultants. Professional Practice Guidance on Planning & Noise, 2017
Institute of Health Equity. Evidence Review: Housing and Health inequalities in London, 2022
International WELL Building Institute, WELL Building Standard v2, 2022
Make Space for Girls. What Does Better Look Like, 2022
Marmot M, Allen J, Boyce T, Goldblatt P and Morrison J. Health equity in England: The Marmot Review 10 years on. London: Institute of Health Equity, 2020

Private amenity space should be big enough to sit comfortably

Natural England. A rapid scoping review of health and wellbeing evidence for the Framework of Green Infrastructure Standards, 2020
Natural England. Green Infrastructure Design Guide, 2023
Natural England. Green Infrastructure Framework, 2023
NHS England, Various Health Building Notes (HBN) on designing health and care facilities
NICE CG43 Obesity prevention, 2006
NICE NG70 Air pollution: outdoor air quality and health, 2017
NICE NG90 Physical activity and the environment, 2018
NICE NG149 Indoor air quality at home, 2020
NICE NG105 Preventing suicide in community and custodial settings, 2018
NICE PH17 Physical activity for children and young people, 2009
NICE PH31 Unintentional injuries on the road: interventions for under 15s, 2010
NICE PH41 Physical activity: walking and cycling, 2012
OHID. Health disparities and health inequalities: applying All Our Health, 2022
PAS Design Code Practitioner Network: <a href="https://www.local.gov.uk/pas/topics/design-codes/design-code-practitioners-network">https://www.local.gov.uk/pas/topics/design-codes/design-code-practitioners-network</a>
PHE. Community-centred public health: taking a whole system approach, 2020
PHE. Cycling and walking for individual and population health benefits A rapid evidence review for health and care system decision-makers, 2018
PHE. Health Impact Assessment in spatial planning: A guide for local authority public health and planning teams, 2020
PHE. Healthy High Street: Good place making in an urban setting, 2018
PHE. Improving access to greenspace, 2020
PHE. Place-based approaches for reducing health inequalities: main report, 2021
PHE. Preventing suicides in public places A practice resource, 2015
PHE. Review of interventions to improve outdoor air quality and public health, 2019
PHE. Spatial Planning for Health: An evidence resource for planning and designing healthier places, 2017
PHE. Getting research into practice - A resource for local authorities on planning healthier places, 2021
Place Value and the ladder of place quality from the Place Alliance and UCL/Bartlett School of Planning. <a href="https://placealliance.org.uk/research/place-value/">https://placealliance.org.uk/research/place-value/</a>
Royal Commission on Environmental Pollution. Artificial light in the environment, 2009
RTPI. Dementia and Town Planning, 2020
RTPI. Housing for Older People, 2022
RTPI. Mental Health and Town Planning, 2020
Secured by Design. Homes 2019

Play features should be imaginative, and respond to the character of the environment a development sits within.



Public space can be playful and interesting, and bring colour and joy to places.

Sport England. Active Design. Planning for health and wellbeing through sport and physical activity, 2023
Sport England. Planning for Sport Guidance. Guidance on how the planning system can help to provide opportunities for all to take part in sport and be physically active, 2019
Sustain. Transform Food Planning in your area. 2022
Sustrans. A guide to the evidence around low traffic neighbourhoods, 2021
The Lancet, Urban design, transport and health, 2022
The Town and Country Planning Association (TCPA). Best practice organisation with a focus on putting health into place. <a href="https://www.tcpa.org.uk/areas-of-work/healthy-place-making/">https://www.tcpa.org.uk/areas-of-work/healthy-place-making/</a>
Transport for London. Healthy Streets Approach, 2017
UDL Code School: <a href="https://www.urbandesignlearning.com/code-school">https://www.urbandesignlearning.com/code-school</a>
UK Climate Change Risk Assessment, 2022
What Works Wellbeing. Places, spaces, people and wellbeing: full review, 2018



Safe doorstep play space in front of new homes.