Walkable Neighbourhoods Analysis Methodology

July 2024

Exeter City Council
Civic Centre
Paris Street
Exeter
EX1 1JN



Contents

1.0	INTRODUCTION	3
2.0	IDENTIFYING AND MAPPING KEY FACILITIES	4
3.0	GENERATING AND COMBINING FACILITY CATCHMENT AREAS	6
4.0	POTENTIAL BENEFITS AND USES	7
5.0	FUTURE UPDATES	8

1.0 Introduction

- 1.1 In recent years, there has been an increasing focus on promoting walkable neighborhoods as a key component of sustainable urban development. Providing a good range services and facilities near to where people live provide numerous benefits, including improved public health outcomes, reduced environmental impacts, increased social cohesion, and economic vibrancy. The city of Exeter has recognised the importance of walkability and has undertaken work in assessing the current state of its neighborhoods. This will help us and our communities plan more effectively in the future when considering investment in new services and facilities.
- 1.2 This document outlines the methodology that has been employed to conduct a comprehensive walkable neighborhoods analysis for the city of Exeter.
- 1.3 To complete this analysis, we have undertaken the following stages of work.
 - Identifying the series of key facilities to use in the study.
 - Ensuring up-to-date mapping of all of these key facilities across the city.
 - Assigning values to each facility depending on their importance and frequency of use.
 - Generating actual walking catchment areas to each facility.
 - To combine facility catchment areas into a single mapped layer that visualises the accessibility of services and facilities across the city utilising a rainbow-coloured scale.
- 1.4 By undertaking this comprehensive analysis, the city of Exeter aims to promote active transportation, reduce car dependency, and foster vibrant, connected neighborhoods that prioritize the well-being of residents and the environment.
- 1.5 It should be noted that this study has been produced to better understand how the city operates. It is not related to, or a precursor to, any changes made to the transport network and should not be interpreted as such.

2.0 Identifying and mapping key facilities

- 2.1 The TCPA have published guidance which identifies a number of key features which could be considered to be essential to meet the everyday needs of people. These have been cross-referenced against the National Planning Policy Framework, Planning Practice Guidance, the National Design Guide and draft National Model Design Code.
- 2.2 The document also reviews and signposts to similar studies undertaken on the topic such as in Edinburgh, which have also been reviewed as part of this work.
- 2.3 We have undertaken a review of the literature and distilled what we consider to be the key measurable facilities that constitute a walkable neighbourhood, with particular reference to the features identified in work done by the TCPA and Sustrans. We have restricted the list to quantitative physical infrastructure which can be measured and mapped.
- 2.4 In addition to this we have utilised a three tier system, with tier 1 facilities considered to be the most essential and/or frequently used, with tier 3 being the least essential and/or less frequently used.
 - Tier 1- Facilities assigned a value of 3
 - Tier 2- Facilities assigned a value of 2
 - Tier 3- Facilities assigned a value of 1
- 2.5 Whilst we feel this provides a good basis for consideration, limitations on existing available data and resources to both map and subsequently update the datasets have restricted the range of information included in the study.
- 2.6 The list is as follows:

Tier 1 - 12 facilities

- Supermarkets
- State Primary school
- State Secondary school
- Exeter college main campus
- GP
- Parks and Gardens
- City centre has an entertainment function.
- Local retail centre
- Play area
- Pharmacy
- Nursery
- National cycle network

Tier 2 – 12 facilities

- Natural and Semi-Natural Green Space
- Convenience store
- Acute hospitals
- Bus stops

- Train station
- Community centre
- Major employment area
- Playing pitch
- Community hospitals
- Library
- Special Needs Schools
- Strategic Cycle Routes

Tier 3 - 10 facilities

- Amenity Green Space
- Post office
- Bank
- Leisure centre
- Allotment space
- Other community venue
- Residential home
- Sheltered accommodation
- Mental health institutions
- Dentist -NHS
- 2.7 A process of reviewing the existing local and national datasets available was then undertaken for each of these facilities. Deficiencies in the data were then identified and updated as required.

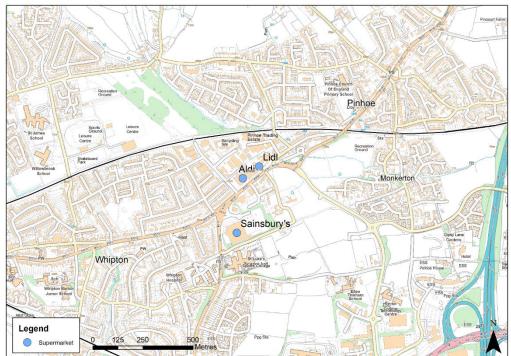


Figure 1: Example of mapped facilities.

3.0 Generating and combining facility catchment areas

- 3.1 Building Sustainable Transport into New Developments (DfT, 2008) gives the following advice on pedestrian catchment areas: "Walking neighbourhoods are typically characterised as having a range of facilities within 10 minutes' walking distance (around 800 metres)". This was utilised as the basis for calculating walkable catchment areas.
- 3.2 Rather than generating crow flies' catchments, to increase the accuracy of the assessment, 800m walking catchments were calculated for all identified facilities utilising the OS Detailed Path Network. Each catchment was assigned a value corresponding to the tier of the facility.

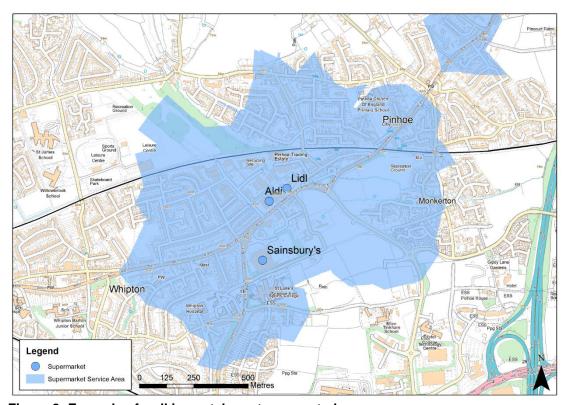


Figure 2: Example of walking catchments generated.

3.3 Following the generation of catchment areas, these were combined using their assigned values into a single layer as shown below. A colour palette was applied to show the varying levels of provision throughout the city, with a maximum attainable score of 70.

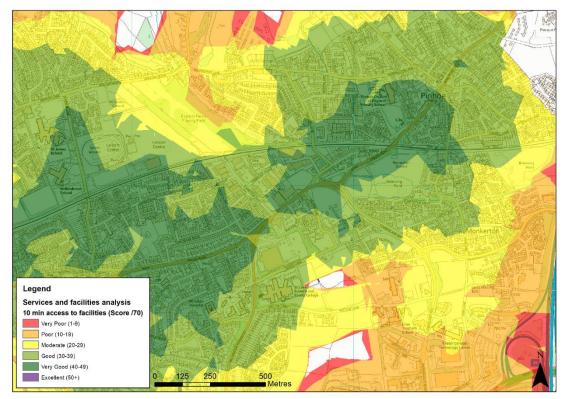


Figure 3: Map showing catchment areas combined.

3.4 It should be noted that these categories should only be viewed in context of the varying levels of provision in Exeter. They are not used elsewhere and are only relevant to the city. Areas identified as having "poor" or "very poor" provision will likely still have a greater access of facilities than most rural areas or towns.

4.0 Potential benefits and uses

- 4.1 The work undertaken provides a unique and fascinating insight into the provision of services and facilities across the city that will no doubt be of wide interest to communities and professionals. In particular, the map has a number of potential benefits.
 - Clear visual representation: The use of contrasting colours allows for a
 quick and intuitive understanding of the distribution of resources or
 services within the city. This makes the information more accessible to a
 wider audience.
 - Identification of disparities: The map can highlight areas with higher or lower levels of provision, making it easier to identify disparities and potential inequalities within the city. This information will be valuable for policymakers, planners, and community leaders.
 - Evidence-based decision-making: By providing a clear picture of the current state of provision, the map can serve as a tool to guide decisionmaking processes. It can help prioritize areas that require more attention and resources, ensuring a more targeted and efficient approach to urban planning and resource allocation.
 - Community engagement: Maps like these can be used to engage community members in discussions about the distribution of resources

- and services in their city. This can lead to increased public participation and more inclusive decision-making processes.
- Monitoring progress: If the map is updated regularly, it can be used to track changes in provision levels over time. This allows for monitoring the effectiveness of policies and interventions aimed at improving the distribution of resources and services within the city.
- Comparative analysis: If similar maps are created for different cities or regions, they can be used for comparative analysis, helping to identify best practices and areas for improvement.

Building on these benefits, a series of potential practical uses have been identified:

- Identifying suitable locations for no car/low car developments.
- Site analysis to support Housing and Economic Land Availability Assessments and other Local Plan site analysis.
- General evidence related to community facilities and policy development.
- Supporting decisions regarding CIL spending for services/facilities.
- Neighbourhood Plan policy development and decision making.

5.0 Future updates

5.1 If this map is to remain relevant, it will be crucial for the data underpinning it to go through regular updates. It is recognised that given the number of facilities assessed, a full review of this data will be a resource intensive and time consuming exercise. To reduce officer resources required for any future updates, the ability for users to provide feedback to the policy team will be added on the website where they see an error or change in the data. A review every 2-3 years is advised.