

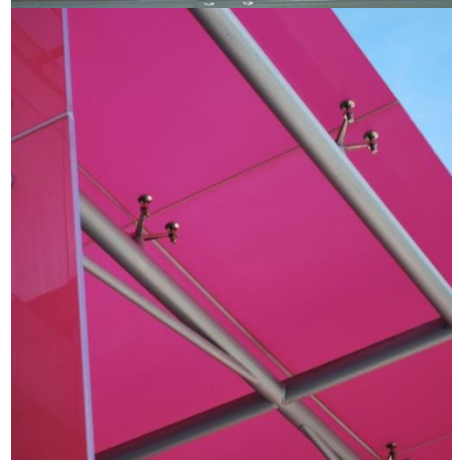
# Derby Retail Study

## Zone 13 – Mackworth Accessibility & Infrastructure Appraisal

Curtins Ref: TPNO66625-CUR-00-XX-RP-AIA-00013

Revision: P01

Issue Date: 13 May 2019




## Control Sheet

Rev	Description	Issued by	Checked	Date
00	Draft	SS	MP	01/10/2018
01	Final	SS	MP	13/05/2019

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## Plans

**Plan 066625-CUR-00-XX-DR-TP-06037-P01 – Pedestrian Catchment**

**Plan 066625-CUR-00-XX-DR-TP-06038-P01 – Cycling Catchment**

**Plan 066625-CUR-00-XX-DR-TP-06039-P01 – Public Transport Catchment**

## 1.0 Introduction

### 1.1 Purpose of This Report

- 1.1.1 This assessment has been undertaken to consider the Mackworth area in terms of infrastructure and accessibility by various travel modes. A number of variables and indicators have been evaluated including vehicular, pedestrian, cycle, public transport and parking facilities, and a general overview has also been taken of the retail area which includes aesthetics, street furniture and security provision.
- 1.1.2 These different aspects have been assessed to ascertain a level of accessibility based upon various criteria. Each category has been scored between 1 and 5 where 1 is poor and 5 is excellent resulting in a maximum possible score of 30 for the retail area. Scoring tables are provided in each category to highlight the criteria used.
- 1.1.3 It is intended that this report, alongside those prepared for the other main retail areas within the Derby Urban Area (DUA) is read alongside the overarching Derby Retail Study report which focusses on transport, accessibility and service provision. The individual retail centre assessment reports and main study area report have been prepared to support a wider review on the retail health and opportunities for centres within the DUA.
- 1.1.4 It is therefore intended that the findings derived from the individual site assessments and conclusions drawn from the main report will provide strategic policy and infrastructure recommendations to Derby City Council and wider partners to enhance and ensure the future delivery and viability of sustainable retail centres within the DUA.



## 2.0 Retail Centre

### 2.1 Introduction

- 2.1.1 Mackworth district centre is located along Prince Charles Avenue between the two junctions with Mornington Crescent, in Mackworth, Derby. Mackworth is located west of Derby City Centre, just beyond the boundary formed by the A38 Kingsway.



**Figure 2.1** Mackworth District Centre Location Map

- 2.1.2 Mackworth district centre serves the Oakwood community, in addition to neighbouring residential areas to the east of Mackworth.
- 2.1.3 The retail district consists mainly of a small retail precinct which also includes a library and a church within its vicinity. The linear retail precinct is fronted by two car parking areas. One being of short stay on street parking bays, and the other a longer stay car park. The retail precinct is surrounded by the residential properties to the east, south and west, whilst open grassed land lies to the north of the site, beyond this is a further area of residential dwellings.

## 3.0 Infrastructure Appraisal

### 3.1 Existing Access Arrangements

- 3.1.1 Vehicular, cycle and pedestrian access to the main retail area and car parks of the retail precinct is taken from Prince Charles Avenue and Mornington Crescent. Access to the rear of the retail units for employees, servicing, deliveries and residents of the apartments above is provided from Mornington Crescent.
- 3.1.2 Additional pedestrian access can also be taken directly from Prince Charles Avenue via a ramped access leading to the apartments above the various shops in the retail precinct.

### 3.2 Streets

#### *Speed Limits*

- 3.2.1 The local speed limit on surrounding roads is 30mph. However, speeds surrounding the retail precinct were much lower than the speed restriction limit due to the prominence of the retail precinct, vehicles turning into the car parking areas and the zebra crossing provision across Prince Charles Avenue.

#### *Design*

- 3.2.2 The surrounding road geometry is of a good design of modern standards with carriageways measuring between 6.5 and 7 metres in width and continues footways of between approximately 1.5 and 4 metres on either side of the surrounding roads. Internally along the precinct frontage outside the supermarket and library there is a wide pedestrianised area with seating and cycle parking stands in addition to footways of approximately 7 metres in width fronting the retail units on the south side of Prince Charles Avenue.
- 3.2.3 The car parking area outside the shops comprises on street parallel parking bays either side of the one-way street that diverges from Prince Charles Avenue adjacent to the smaller retail units and forms a loop which re-joins Prince Charles Avenue further west of the retail precinct.
- 3.2.4 The car parking area on the north side of Prince Charles Avenue also accommodates a one-way traffic flow system diverging from Prince Charles Avenue at the western extent of the retail precinct and re-joining further east opposite the supermarket. The northern car park has been recently constructed, the road geometry is adequate with good quality construction, the car park is clearly signed with appropriate provision of pedestrians, cyclists and motorcycles.
- 3.2.5 The zebra crossing is well located to accommodate the desire lines of pedestrians from vehicles using the northern car park and those using the bus stops. Observations recorded very few pedestrians avoiding the zebra crossing. Use of trees and planting between the southern on street parking area and Prince Charles Avenue encourages pedestrians to utilise the crossing point provided. Although the



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crossing over the one-way street of the southern car parking area is not marked clearly. There has been provision in the past but this is now obscured by the lack of road markings.

- 3.2.6 Access and egress points to the opposing car parks are staggered and with the geometry designed so that the access of one car park is adjacent to the egress of another. This results in a lesser chance of confusion and therefore risk of collisions is reduced at these points.
- 3.2.7 The condition of the on street parking bays are poor with potholes, patching, and cracking and are not appropriate for those with mobility impairments who utilise the parking area. **Figure 6.2** shows the condition of the parking area.

### ***Vehicular Traffic Flow / Congestion***

- 3.2.8 The traffic flow within the shopping precinct and the surrounding roads at the time of the survey (weekday afternoon) was free flowing and light with slow vehicular speeds. No congestion was observed at any of the local junctions or access / egress points of either car parking area.
- 3.2.9 The geometry and layout of the car park meant that traffic flow was uninhibited with good visibility. No other congestion was observed at junctions or access / egress points of either car parking area.

### 3.3 Streets Scoring

Streets	
Score	Criteria
5	Good vehicular access positioning. Well-maintained streets of a good design. Light traffic flows with no congestion.
4	Good vehicular access positioning. Well-maintained streets of a good design. Light/moderate but controlled traffic flows with light congestion.
3	Satisfactory access positioning of adequate quality. Moderate traffic flows and light congestion.
2	Satisfactory access positioning of poor quality. Heavy traffic and moderate congestion.
1	Substandard access positioning of poor quality. Heavy traffic and heavy congestion.

**Table 3.1** Street Scoring

### 3.4 Cycle Facilities

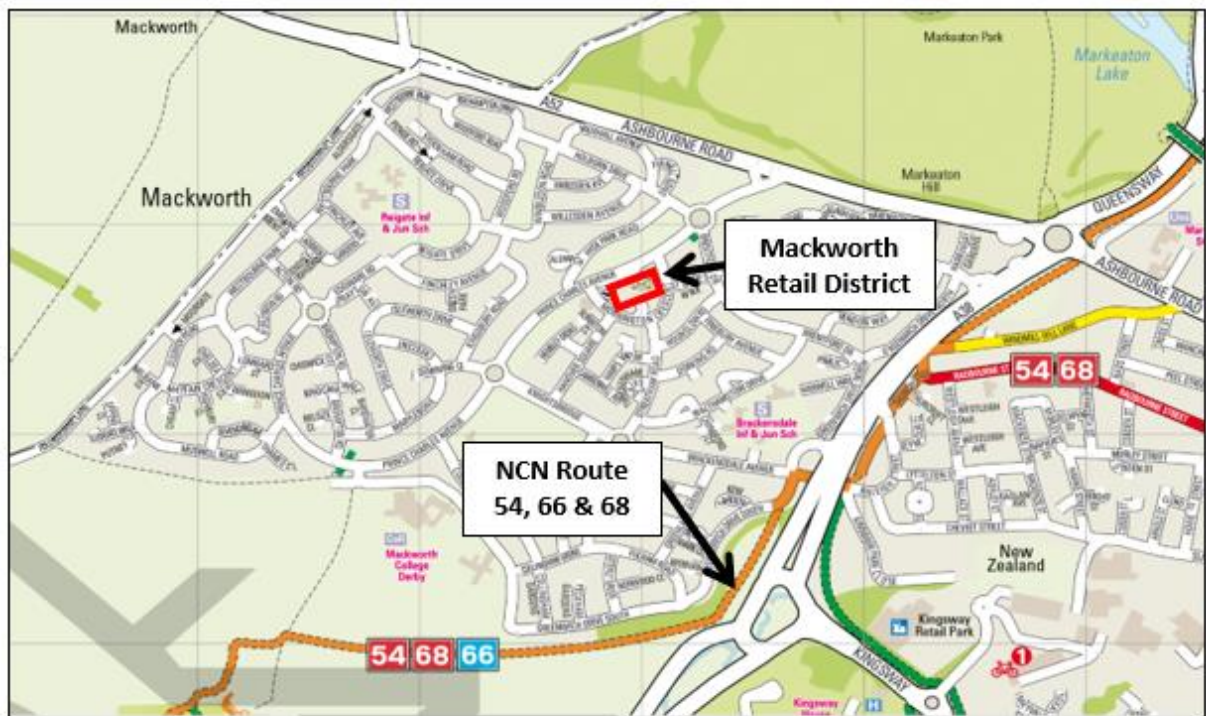
#### **Cycle Routes**

- 3.4.1 There are no marked or segregated cycle routes within the vicinity of the shopping precinct. However, the roads are suitable for cyclists to cycle within the carriageway. National Cycle Network (NCN) Route 54, 66 & 68 are approximately 640 metres south-east of the retail precinct.
- 3.4.2 According to the Department for Transport, 4km (2.4 miles) is an acceptable distance for cycling, therefore local cyclists could use the cycle route to access the shopping precinct.
- 3.4.3 **Figure 3.1** shows the NCN Route 54, 66 & 68 and its location in relation to Mackworth retail district.

#### **Cycle Storage / Parking**

- 3.4.4 There is cycle parking of up to 12 bikes on the pedestrian space outside the supermarket by way of modern design Sheffield stands and two further cycle parking areas are provided at the centre and to the western extent of the shopping precinct also provide Sheffield stands which accommodate 12 cycles in total, one of which is shown in **Figure 3.2**. The cycle parking location is in an appropriate position as it is both conveniently located and overlooked.

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SOURCE: Derby City Council

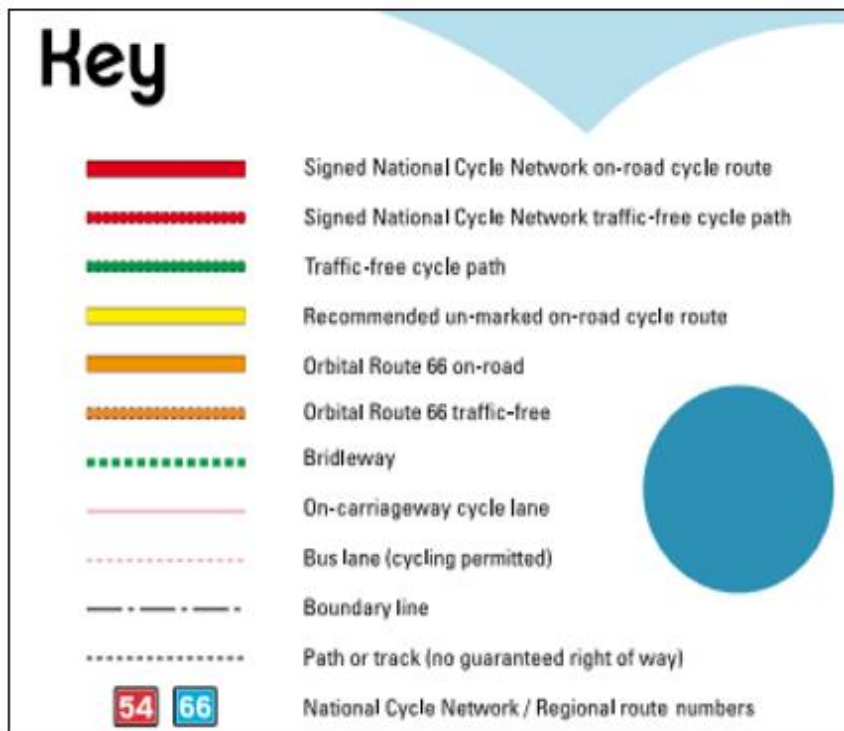


Figure 3.1 NCN Route 54, 66 & 68 in relation to Mackworth Retail District

***Cycle Storage / Parking***



**Figure 3.2** Cycle Parking Facilities in Mackworth District Centre

### 3.5 Cycle Scoring

Cycle Facilities	
Score	Criteria
5	Off road cycle provision of excellent quality. Ample space for cycle flows with controlled crossing provision. Convenient and generous cycle parking facilities.
4	Segregated / off road cycle provision of good quality with crossing facilities. Convenient and sufficient parking facilities.
3	On / off road cycle provision of adequate quality with convenient cycle parking.
2	No cycle routes / cycleways provided, some cycle parking present.
1	No provision for cyclists.

Table 3.2 Cycle Scoring

### 3.6 Pedestrian Facilities

#### *Pedestrianised Streets*

- 3.6.1 Whilst the main retail precinct provides suitable pedestrian spaces, cyclists are prohibited from using the footway adjacent to the shop frontage, there are no formalised pedestrianised areas within or surrounding the retail area.

#### *Crossing Facility*

- 3.6.2 There is a zebra crossing facility with dropped kerbs and tactile paving, linking the bus stop central reservation to the north with the on street parking area adjacent to the shopping precinct frontage. The crossing facility over the on street parking area is noticeable by having different surfacing to the carriageway and has drop kerb provision with tactile paving. The crossing facility is shown in **Figure 3.2**. Surrounding the site there are appropriately located dropped kerbs which also enable pedestrian crossing of local roads and provide access to surrounding bus stops.





**Figure 3.3** Pedestrian Crossing Facility on Prince Charles Avenue

### **Accessibility**

- 3.6.3 The streets surrounding the retail precinct provide good levels of pedestrian accessibility with dropped kerbs and tactile paving provided in appropriate locations. There is a zebra crossing on Prince Charles Avenue to the north of the shopping precinct which provides a safe crossing point linking the on street car parking area to the bus stop and car park on the north side of the carriageway. There is also a pedestrian crossing provided to connect the retail area to the zebra crossing to the north of the on street parking area. This pedestrian crossing is poorly marked with no signage to warn vehicles of the presence of pedestrians crossing. **Figure 3.3** shows the zebra and pedestrian crossing facilities.
- 3.6.4 Traffic flows were observed to be low with speeds of approximately 20mph along Prince Charles Avenue, vehicle speeds were much slower through the on street parking area and car park. Pedestrians were seen to cross the zebra crossing without delay or safety concerns however pedestrians using the pedestrian crossing across the on street parking area were seen to use this crossing as an extension to the zebra crossing and expected vehicles to give way to them. This could be seen to be a safety hazard.



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- 3.6.5 Internally there are steps which connect the smaller shops to the supermarket and library at the eastern extent of the precinct as there is a significant level difference at this location. Provision is available for those with mobility impairments by way of footpath that runs adjacent to the Prince Charles Avenue carriageway and connects the smaller shops on the upper section of the precinct to the pedestrian space to the front of the supermarket on the lower section.



**Figure 3.4** Stepped Access Between Upper and Lower Retail Areas.

### ***Ped / Cycle Flow***

- 3.6.6 At the time of the survey (weekday afternoon), there were steady pedestrian and minimal cycle flows, which was primarily made up of movements from the car park and bus stop to the shopping precinct. Surrounding the shopping precinct there were low levels of pedestrian flows from the surrounding area.

### ***Conflict Areas***

- 3.6.7 There is provision for a pedestrian priority route over Prince Charles Avenue by way of a zebra crossing from the car park to the on street parking area. However, provision over the on street parking area is not pedestrian priority. This is a crossing facility but uncontrolled and poorly marked and signed. This could cause confusion and pedestrians may think they have right of way to cross the on street parking area. This along with manoeuvring vehicles parking in the on street parking bays could potentially pose

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a danger for pedestrians and those with a mobility impairment. Observations confirmed pedestrian and vehicular confusion over priorities at this location.

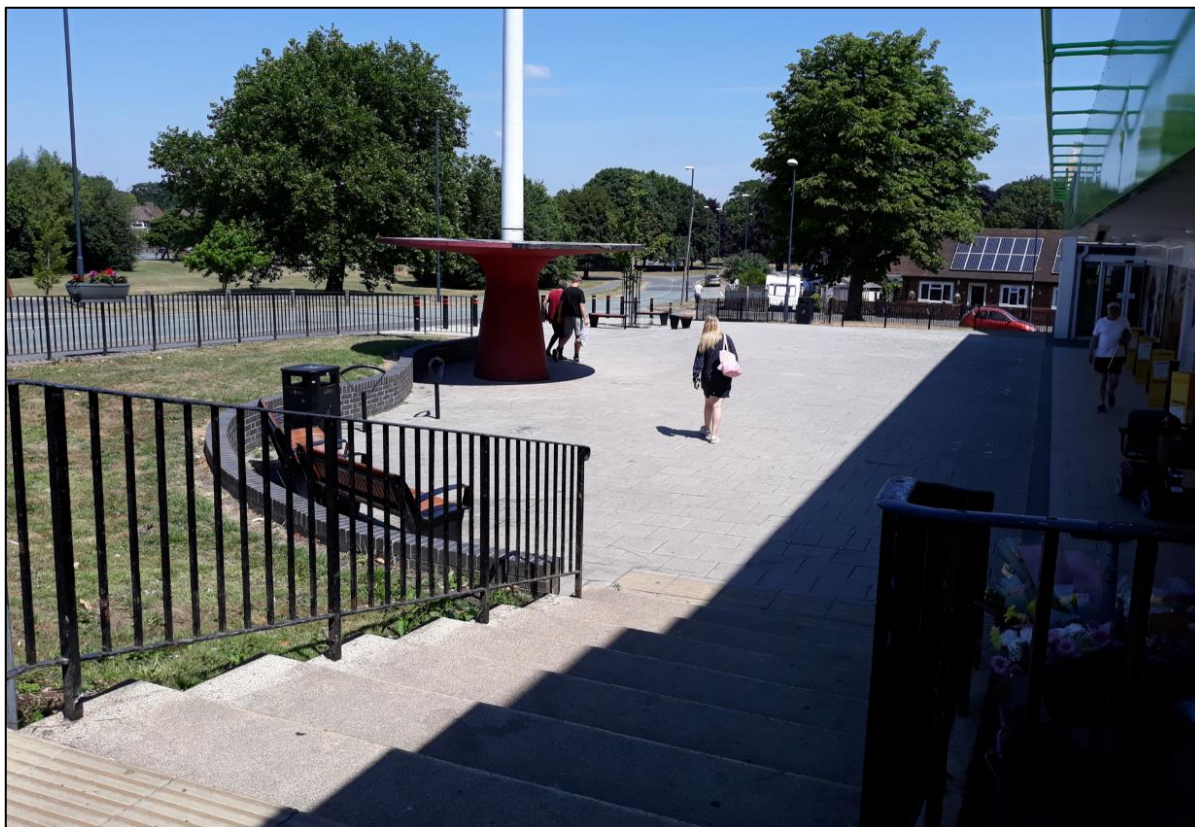
### ***Footways /Cycleways***

- 3.6.8 Footways have been provided as described above and they are in good condition, with dropped kerbs provided at appropriate locations. **Figure 3.4** details the footways at the shopping precinct frontage and **Figure 3.5** shows the pedestrian area at the front of the supermarket. No cycleways are provided.



**Figure 3.5** Footway Facilities in Mackworth District Centre





**Figure 3.6** Pedestrian Area – Mackworth District Centre

### 3.7 Pedestrian Scoring

Pedestrian Facilities	
Score	Criteria
5	Pedestrianised streets in excellent condition with ample open space and well-located controlled crossing facilities where vehicular carriageways are present.
4	Ample and wide footway provision of good quality. Well positioned controlled / uncontrolled crossings and no vehicular conflict areas.
3	Adequate footways in reasonable condition with controlled and uncontrolled crossing points with no vehicular conflict areas.
2	Narrow footways in reasonable / poor condition with uncontrolled crossing points and potential conflict areas.
1	No / insufficient footways in poor condition with limited crossing provision and potential conflict areas.

**Table 3.3** Pedestrian Scoring

## 4.0 Public Transport Assessment

### 4.1 Buses

#### *Bus Stops*

- 4.1.1 There is one bus stop on Prince Charles Avenue (opposite the shopping area) for east-bound services which has a shelter, lighting, real time information, seating, timetable, raised kerb and bus cage within the carriageway.
- 4.1.2 There are two westbound bus laybys on Prince Charles Road which are located 130m and 180m to the east and west of the shopping precinct which appear to be disused as there are not flags or timetable information provided.



**Figure 4.1** Eastbound bus Stop on Prince Charles Avenue.

#### *Services*

- 4.1.3 The bus service provider in this area is Arriva, with service number operating every 12 minutes in the daytime. These services provide connections between Mackworth, Knightsbridge and Derby City Centre.

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### **Accessibility**

- 4.1.4 The bus stop on Prince Charles Avenue is suitable for all users as there is level access provided to the retail precinct, leading from the bus stop to the shopping precinct.

## **4.2 Rail**

### **Rail Station**

- 4.2.1 There is no rail station near the shopping precinct. The nearest rail station is Derby Midland Rail Station, located approximately 6km south-east from the site. This is above the 2000m maximum walking distance for commuters, it is therefore considered excessive for a shopping trip.

## **4.3 Taxis**

### **Taxi Ranks**

- 4.3.1 There is no taxi rank provided at the shopping precinct.

## **4.4 Public Transport Scoring**

Public Transport	
Score	Criteria
5	Well positioned and accessible bus stops with excellent facilities in good condition. Access available to frequent services which serve various destinations.
4	Accessible bus stops with good facilities in good condition, providing access to frequent bus services.
3	Accessible bus stops with adequate facilities and provision of regular services.
2	Bus stops with limited facilities / of poor quality and access to regular services.
1	No / insufficient bus stops in poor condition with limited level of service.

**Table 4.1** Public Transport Scoring



## 5.0 Parking Provision

### 5.1 Location & Capacity

#### *On-Street Parking*

- 5.1.1 There is an on-street parking area across the shop frontages to the southern boundary of Prince Charles Avenue. The parking area is accessed off the southern kerb line of Prince Charles Avenue to the east of the smaller shops in the shopping precinct and egress onto Prince Charles Avenue is to the western extent of the shopping precinct.
- 5.1.2 The parking area comprises parking bays on either side of a carriageway and operates a one way system. The parking bays to the southern side of the road extend for a length of 97m and to the north extend for 59m. Within this area there is provision for four disabled parking spaces although markings are barely visible, and therefore all vehicles were observed using these bays. A pedestrian crossing point is also located in the centre of the parking bays to assist in crossing of the one way on street parking area.
- 5.1.3 The on street parking area had a high turnover rate and was observed to average approximately 70% capacity at the time of survey (weekday afternoon).



**Figure 5.1** On Street Parking Area off Prince Charles Avenue

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### ***Off-Street Parking (within the Shopping Precinct)***

- 5.1.4 A car park is located off the northern boundary of Prince Charles Avenue opposite the shopping precinct. The car park operates a one way system and is accessed from the west and egress is to the east. There are 40 standard parking bays and two motorcycle parking bays provided within the car park. The car park is well maintained with clear parking bays demarcated. The parking area was observed to have an approximate 30% occupancy level at time of survey (weekday afternoon).



**Figure 5.2** Car Park off Prince Charles Avenue.

## **5.2 Charge**

### ***On-Street Parking***

- 5.2.1 The on street parking area does not have monetary restrictions although parking is limited to 30 minutes between 8am and 6pm from Monday to Saturday with no return within one hour.

### ***Off-Street Parking (within the Shopping Precinct)***

- 5.2.2 The car park does not have monetary restrictions however parking is limited to two hours between the hours of 8am until 6pm from Monday through to Saturday, with no return within one hour.

### 5.3 Parking Scoring

Parking	
Score	Criteria
5	Ample and well located on/off street parking of good design with accessible links and disabled provision. In excellent condition with CCTV surveillance.
4	Well located on/off street parking with accessible links and disabled provision. In good condition with natural / CCTV surveillance.
3	Adequate provision of good design with accessible links in good / fair condition with some surveillance.
2	Sufficient parking of poor design, in fair / poor condition with limited/no surveillance.
1	No / insufficient provision of poor quality with no surveillance.

**Table 5.1** Parking Scoring



## 6.0 General Overview

### 6.1 Aesthetics

- 6.1.1 The shopping precinct is generally tidy, orderly and functional. Planting and trees make the appearance of the retail area pleasant as shown in **Figure 6.1**.



**Figure 6.1** Mackworth District Centre – Shopping Precinct

### 6.2 Facilities

- 6.2.1 There is a reasonable variety of shops including a convenience store, library, Post Office, pharmacy, bakery, hardware store and takeaway food stores which provide access to typical daily food and service requirements.

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### 6.3 Street Furniture

- 6.3.1 Street furniture is located within the footways and pedestrian area which includes seating, post box, clock feature, telephone box, fencing, litter bins, notice boards, bollards, bus shelter, lamp posts, street signs and advertising boards. They have been suitably positioned to avoid conflict with other users and are well maintained.

### 6.4 Quality

- 6.4.1 The design of the precinct and surrounding streets is quite typical for local retail centres developed to provide local amenities to new housing developments and largely meets modern highway design standards. The car park area is much more recently constructed with more generous geometries which improve visibility, manoeuvrability and safety for all users.

### 6.5 Disabled Provision

- 6.5.1 Disabled users using public transport are catered for by the provision of a level access leading to the shopping precinct from the Prince Charles Avenue bus stop. Disabled users driving to the site have disabled parking bays allocated within the on street car parking area though these are poorly demarcated and do not meet modern design standards and lack dropped kerb links to the shops themselves.

### 6.6 Vehicular Accessibility

- 6.6.1 No manoeuvring problems were observed, and the traffic generally flowed freely with minimal congestion. The slight congestion observed occurred while vehicles were manoeuvring within the on street parking area, which cleared quickly once vehicles had parked.

### 6.7 Security

- 6.7.1 Lighting has been suitably provided around the shopping precinct and also provides lighting for both car parking areas. It would appear that an appropriate level of lighting is provided.
- 6.7.2 The frontages of the shops within the precinct are monitored by CCTV positioned at the centre of the shopping precinct. The nature of the site is open and over-looked during the daytime. In the evenings there would be limited natural surveillance as the only residential properties directly overlooking the shopping area are the apartments above the shops.

### 6.8 General Condition

- 6.8.1 The general condition and maintenance of the car park and shopping precinct is good. The condition of the on street parking is poor and is not appropriate for those with mobility impairments who utilise the parking area. **Figure 6.2** shows the condition of the parking area.

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- 6.8.2 Appropriate levels of lighting and CCTV surveillance is provided, and the area provides the impression of a generally well-maintained retail centre.



**Figure 6.2** On Street Parking Area Road Condition



## 6.9 General Scoring

General	
Score	Criteria
5	Well positioned street furniture, ample lighting with CCTV/natural surveillance. Clean, tidy and pleasant appearance with many varied facilities. In excellent condition with natural light and open spaces.
4	Ample street furniture with good level of street lighting and varied facilities. CCTV/natural surveillance with a clean and tidy appearance and good condition with open spaces.
3	Adequate street furniture with sufficient street lighting, good facilities with CCTV/natural surveillance. Good condition with a clean and tidy appearance.
2	Tired looking street furniture with street lighting, some surveillance and adequate facilities. In need of some maintenance with an untidy appearance.
1	No / ill positioned street furniture with street lighting and some surveillance. Untidy appearance with a limited range of facilities and in poor condition.

**Table 6.1** General Scoring

## 6.10 Total Scoring Summary

Total Accessibility Score		
Category	Actual Score	Possible Score
Streets	3	5
Cycle Facilities	2	5
Pedestrian Facilities	3	5
Public Transport	3	5
Parking	3	5
General	3	5
<b>Total</b>	<b>17</b>	<b>30</b>

**Table 6.2** Total Scoring Summary



## 7.0 Accessibility by Sustainable Modes of Travel

### 7.1 Introduction

- 7.1.1 A key element of national, regional and local policy is to ensure that developments are located in areas where alternative modes of travel are available. It is important to ensure that developments are not isolated but are located close to complementary land uses. This supports the aims of integrating planning and transport, providing more sustainable transport choices, and reducing overall travel and car use.
- 7.1.2 The accessibility of the proposed development is considered in this context for the following modes of travel:
- (i) Pedestrian Accessibility;
  - (ii) Accessibility by Cycle; and
  - (iii) Accessibility by Public Transport.

### 7.2 Pedestrian Accessibility

- 7.2.1 Pedestrian accessibility infrastructure within the vicinity of the site is considered to be of a good standard, comprising of footways measuring at least three metres in width, in line with current design guidance, maintained footways on either side of the carriageway and links directly to the surrounding pedestrian network. Existing pedestrian crossing facilities are also available within the vicinity of the site.
- 7.2.2 The results of the GIS model indicate that the site is well located in respect of achieving connectivity to local residential areas which form part of Mackworth retail district's local catchment area. The GIS model also indicates that existing public transport facilities such as the local bus stop on Prince Charles Avenue is within walking distance of the retail district.
- 7.2.3 On this basis, it is considered that the geographical proximity of the retail district facilitates sustainable travel to amenities and destinations that are most likely to be visited, in line with current policy provided in the Chartered Institution for Highways and Transportation (CIHT) document entitled 'Providing for Journeys on Foot'. The guidance contains suggested acceptable walking distances, for pedestrians without a mobility impairment, which have been reproduced in **Table 7.1**.

CIHT Category	Town Centres (m)	Commuting/School/ Sightseeing (m)	Elsewhere (m)
Desirable	200	500	400
Acceptable	400	1,000	800
Preferred Maximum	800	2,000	1,200

**Figure 7.1** CIHT Suggested Acceptable Walking Distances



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- 7.2.4 To assist in summarising the accessibility of the site by foot, an indicative pedestrian catchment plan has been produced. **Plan 066625-CUR-00-XX-DR-TP-06037-P01** shows distances of 200m, 400m, and 800m which reflect the '*Preferred Maximum*' for retail trips, by the CIHT.
- 7.2.5 The pedestrian catchment plan confirms that the site is situated within walking distance of a number of existing residential areas. The pedestrian catchment plan demonstrates that the much of the retail district's existing catchment area is within 200 metres walking distance of the site. The catchment area also demonstrates that existing public transport opportunities such as the local bus stop on Prince Charles Avenue is within 800 metres of the retail precinct, which reflect the '*Preferred Maximum*' for commuting trips, by the CIHT. The pedestrian catchment plan confirms that local residents, employees and visitors could access sustainable transport opportunities within the area which could help to reduce future private car use.
- 7.2.6 The 800m pedestrian catchment plan shows that Mackworth retail district is accessible by the majority of Mackworth residents, within the preferred maximum walking distance for trips on foot.

### 7.3 Accessibility by Cycle

- 7.3.1 In order to assist in assessing the accessibility of the site by cycle, **Plan 066625-CUR-00-XX-DR-TP-06038-P01** presents an eight-kilometre cycle catchment for the site. The eight-kilometre cycling distance refers to a recommendation by Cycling England in the document 'Integrating Cycling into Development Proposals' (2009).
- 7.3.2 The catchment extends as far as Weston Underwood in the north, Chaddesden to the east, Normanton in the south and Thurmaston to the west.
- 7.3.3 National Cycle Network (NCN) Route 54, 66 & 68 is approximately 640 metres south-east of the retail precinct. Local roads within the surrounding area are relatively flat and are therefore considered to be suitable for cycling.

### 7.4 Accessibility by Public Transport

- 7.4.1 **Plan 066625-CUR-00-XX-DR-TP-06039-P01** demonstrates those areas accessible via public transport within 15, 30, 45 and 60 minutes journey from the site. Accessibility by bus and rail are considered in further detail within the subsections below.
- 7.4.2 There is one bus stop on Prince Charles Avenue (opposite the shopping area) for east-bound services which has a shelter, lighting, real time information, seating, timetable, raised kerb and bus cage within the carriageway.
- 7.4.3 Guidance from the Chartered Institution of Highways and Transportation (CIHT) document 'Guidelines for Planning for Public Transport in Development' indicates that ideally, a bus stop should be located within 400m from a retail precinct.

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- 7.4.4 The bus stop is located within 100m from the centre of the retail district.
- 7.4.5 The bus service provider in this area is Arriva, with service number operating every 12 minutes in the daytime. These services provide connections between Mackworth, Knightsbridge and Derby City Centre.
- 7.4.6 There is no rail station near the shopping precinct. The nearest rail station is Derby Midland Rail Station, located approximately 6km south-east from the site. This is above the 2000m maximum walking distance for commuters, it is therefore considered excessive for a shopping trip.

### 7.5 Public Transport Summary

- 7.5.1 It is considered the site is accessible by sustainable modes of transport. The surrounding area exhibits good levels of pedestrian infrastructure, and there is an acceptable level number of public transport opportunities within close walking distance of the site.

## Plans



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Project:  
DERBY RETAIL STUDY - MACKWORTH

Drg Title:  
ACCESSIBILITY  
WALKING CATCHMENT

Status:  
PRELIMINARY

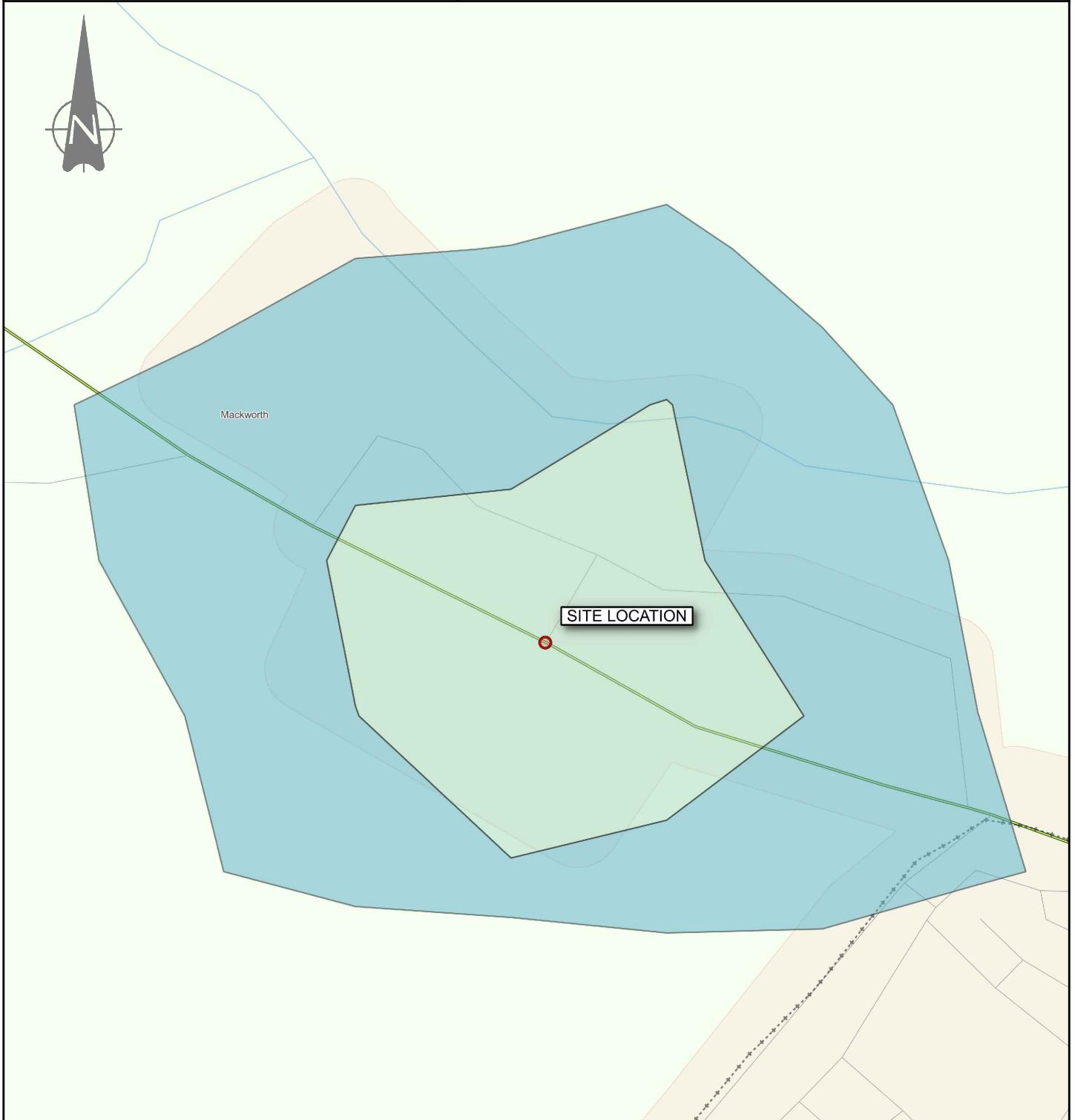
Drawn By: NA Checked By: MP

Designed By: NA Date: 07/08/18

Scale: NTS

Project No: Originator: Volume: Level: Type: Role: Category / Number: Rev:

66625 - CUR - 00 - XX - DR - TP - 06037 - P01



#### Legend

- Site Location
- Mackworth Walking Catchment (metres):-
  - 200m
  - 400m
  - 800m





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Project:  
DERBY RETAIL STUDY - MACKWORTH

Status:  
PRELIMINARY

Drg Title:  
ACCESSIBILITY  
CYCLE CATCHMENT

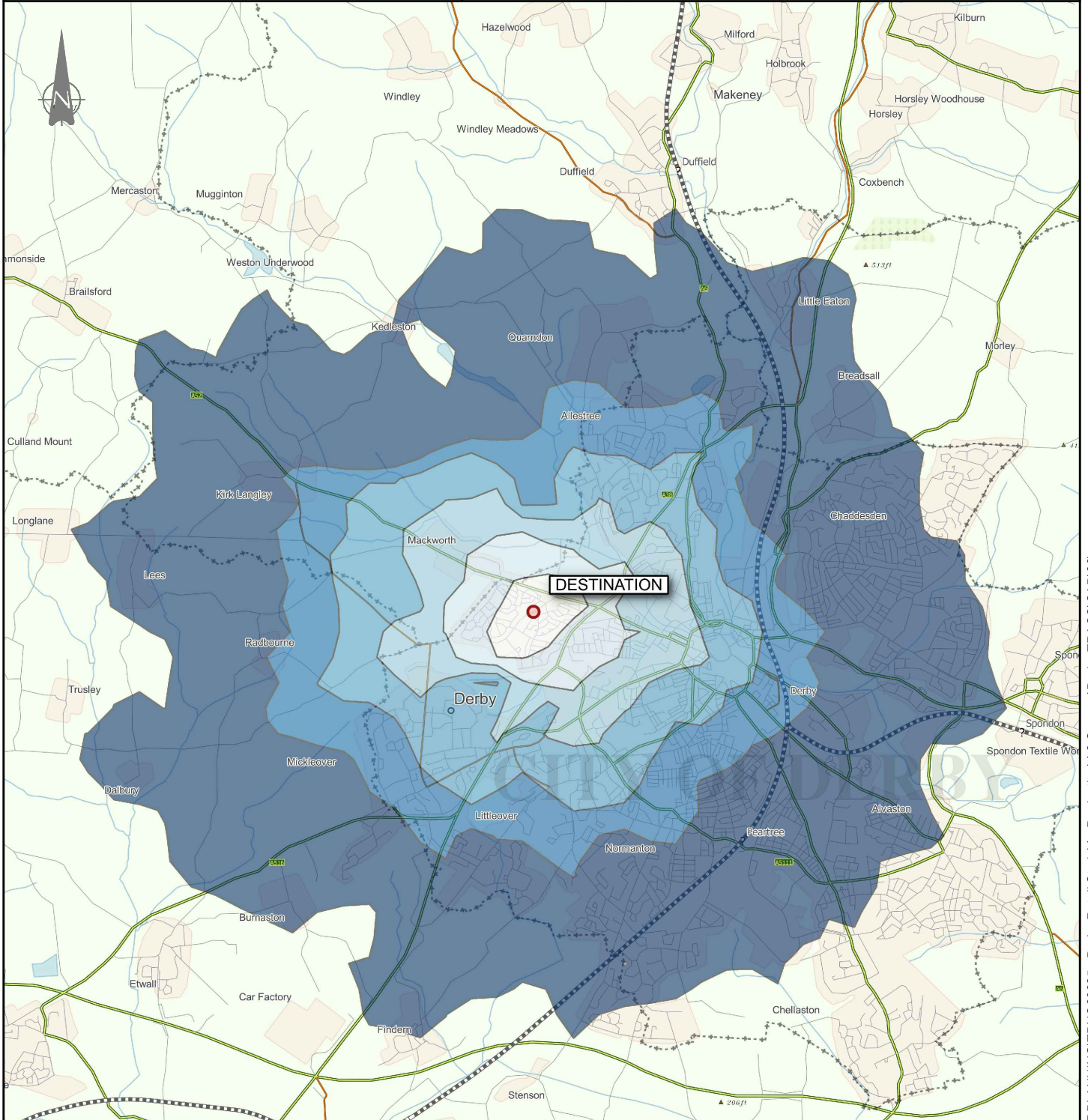
Drawn By: NA Checked By: MP

Designed By: NA Date: 07/08/18

Scale: NTS

Project No: Originator: Volume: Level: Type: Role: Category / Number: Rev:

66625 - CUR - 00 - XX - DR - TP - 06038 - P01



#### Legend

○ DESTINATION

Mackworth Cycle Catchment (metres):-

1000m  
2000m  
3000m  
4000m  
5000m  
8000m





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Project: DERBY RETAIL STUDY - MACKWORTH

Status: PRELIMINARY

Drg Title: ACCESSIBILITY  
PUBLIC TRANSPORT  
CATCHMENT

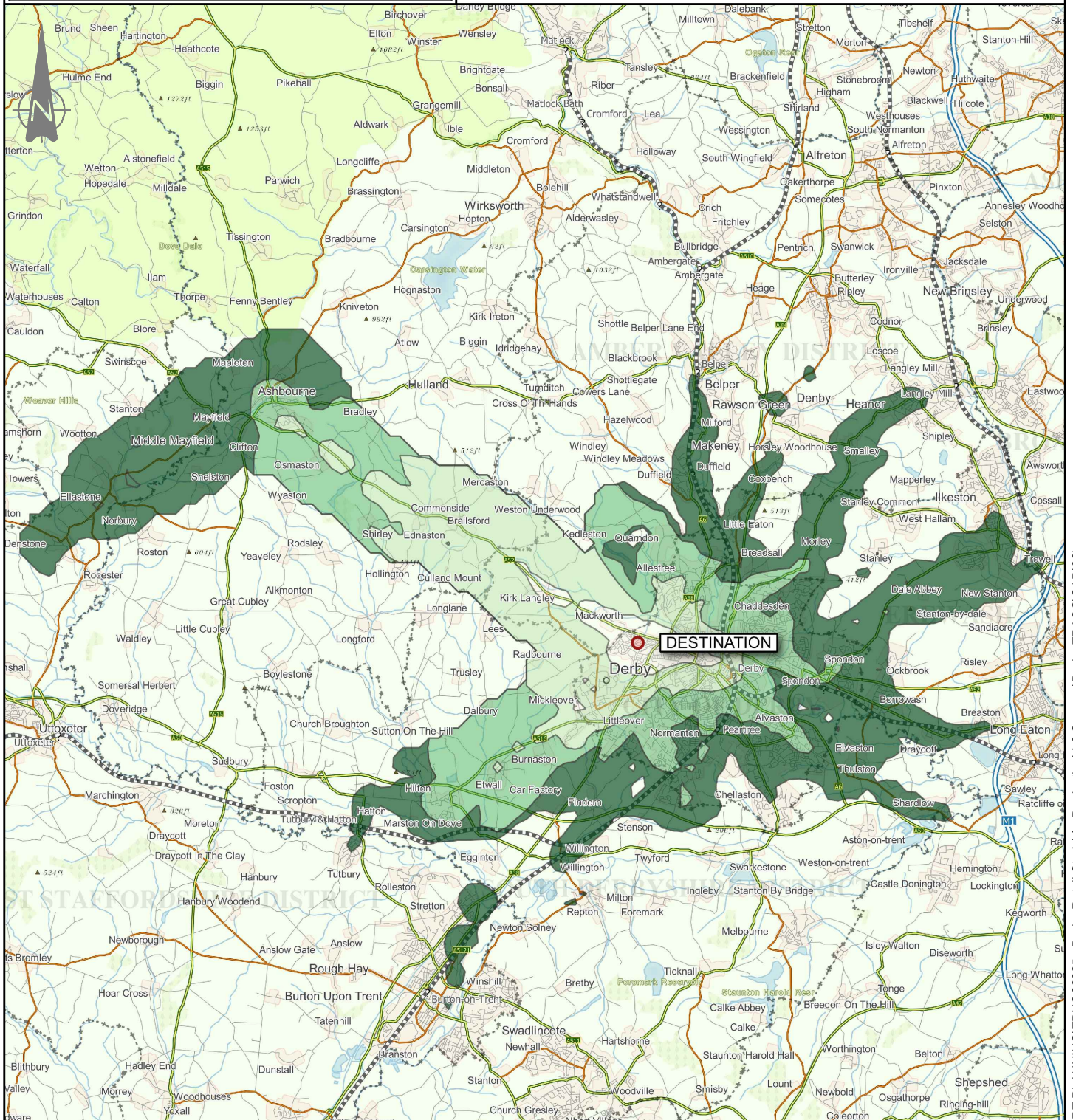
Drawn By: NA Checked By: MP

Designed By: NA Date: 01/08/2018

Scale: NTS

Project No: Originator: Volume: Level: Type: Role: Category / Number: Rev:

66625 - CUR - 00 - XX - DR - TP - 06039 - P01



#### Legend

● DESTINATION

Mackworth Public Transport Catchment (minutes):-

15

30

45

60

## Zone 13 – Mackworth Accessibility & Infrastructure Appraisal

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