TECHNICAL DESIGN NOTE

Hydrock

Project name	Land off Station Road, Crewkerne		
Design note title	Pre-App Note on Transportation and Accessibility		
Document reference	09984-HYD-XX-XX-RP-TP-1003		
Author	Mark Pearce MCIHT		
Approver	James McKechnie BA (Hons) PGDip FCIHT CMILT		
Revision	P03		
Date	11 November 2021	Approved	✓

1. INTRODUCTION AND BACKGROUND

1.1 Introduction

1.1.1 Hydrock has been commissioned by Place Land LLP to prepare a Technical Note in support of a pre-application submission in relation to the above site.

1.1.2 Due to the type and scale of the development, a Transport Assessment (TA) will be produced in support of an outline planning application in due course. The TA will serve to demonstrate how the above development is acceptable in terms of transportation, highway safety and access, and that it is compliant with relevant national and local planning policies.

1.1.3 The TA will set out the transport issues relating to the application site (existing conditions) and provide details of the development proposals; including its accessibility and connectivity, an assessment of the traffic predicted to be generated by the development and the corresponding effects on the surrounding highway network.

2. SITE LOCATION AND EXISTING CONDITIONS

2.1 Site Location

2.1.1 Crewkerne is a small town within Somerset in the South Somerset district, situated approximately 14km (9 miles) south-west of Yeovil and roughly 11km (7 miles) to the east of Chard. Crewkerne is well served by a number of transport routes including the A30 (west to north-east alignment), A356 (north to south-east alignment and B3165 (south to north alignment).

2.1.2 Amenities serving Crewkerne include a Lidl, Waitrose, Crewkerne Hospital / Pharmacy, Crewkerne Business Park, Crewkerne Football & Cricket Club, Crewkerne Aqua Centre, church, a post office, banks and shops within the town centre, public houses, schools, Crewkerne Railway Station, and Crewkerne Sports Centre that acts as a hub for local social and sports clubs.

2.1.3 The application site is bordered on its northern and eastern sides by the A356 and existing residential properties. To the south, the site is bordered by a railway line (the Waterloo main line) with Crewkerne Railway Station located to the south-east corner of the site. To the west are open fields beyond which are further existing residential properties.

2.1.4 The application site location is shown in Figure 2.1.

Figure 2.1: Site Location

2.2 The Highway Network - Local / Primary

2.2.1 Figure 2.2 shows the road network in and around Crewkerne and in proximity to the site.

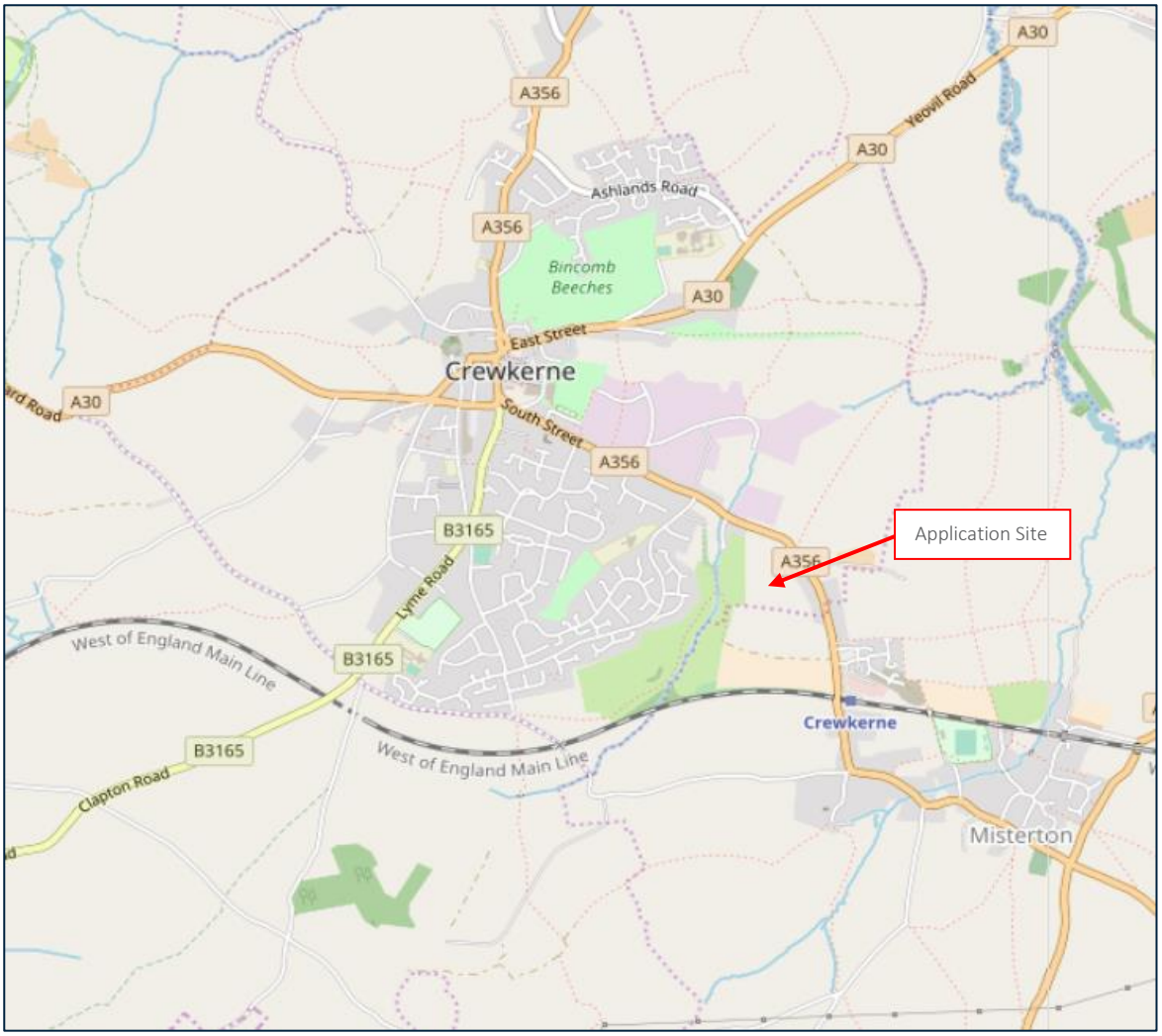


Figure 2.2: Summary of Surrounding Highway Network

2.2.2 A356 - North Street / South Street / Station Road

2.2.3 The A356 enters Crewkerne in two places, from the north via the A356 - North Street and to the south of the town centre via the A356 - South Street.

2.2.4 The A356 - North Street extends north from the town centre at a three-arm mini roundabout junction with Market Square and East Street. The road continues north for approximately 8.3km (5.2 miles) before reaching the A303.

2.2.5 The A356 South Street / Station Road extends east from a priority T-Junction with Market Street in the centre of Crewkerne, passing to the south of the Crewkerne Business Park and along the northern and eastern boundaries of the application site. At the south-eastern corner of the site, the A356 - Station Road provides access to Crewkerne Railway Station and bus stops. The road continues to head south / south-east through Misterton and South Perrott.

2.2.6 The majority of the A356 - South Street / Station Road is fronted by existing residential properties and on-street parking with a network of street lighting provided along the full extent within and footway

along the northern / eastern carriageway edges. The road averages 6.0m in width and is subject to a 30mph speed limit.

2.2.7 B3165

2.2.8 The B3165 enters Crewkerne from the south and terminates at a priority T-Junction with the A30 - West Street / Market Street to the immediate south of the town centre. The extent of the B3165 that routes through the southern extent of Crewkerne is fronted on either side by existing residential properties and narrowed by sections of on-street parking.

2.2.9 For the extent from the town centre to a four-arm mini-roundabout consisting of the B3165 - Hermitage Street, B3165 - Lyme Road, Severalls Park Avenue and Middle Path, footway is provided on the eastern carriageway edge and, sporadically, on the western carriageway edge. The extent of B3165 in Crewkerne is subject to a 30mph speed limit and has street lighting.

2.2.10 A30

2.2.11 The A30 also adjoins Crewkerne in two places, the A30 - Chard Road from the west and the A30 - Yeovil Road to the north-east.

2.2.12 The A30 - Chard Road extends from Chard situated approximately 12.0km (7.5 miles) to the west of Crewkerne, before reaching the town centre with Market Square. The A30 - Yeovil Road routes north-east from Crewkerne town centre and extends approximately 11.0km (7.0 miles) towards the south-western extent of Yeovil. The section of the A30 to the immediate south of the town centre from Market Street, operates a one-way system forming a loop with Gouldsbrook Terrace, Court Barton and Church Street.

2.2.13 Market Street / Market Square

2.2.14 Market Street / Market Square is the main route through the town centre and provide access to a number of the high-street stores as well as Lidl, the post office and Crewkerne Library. The southern extent of Market Street, south of the priority T-Junction with the A356 - South Street operates as a one-way system with traffic able to either route south along the B3165 or west along the A30.

2.2.15 The section of Market Square to the west of the three-arm mini roundabout with the A356 - North Street / A30 - East Street is also restricted to one-way traffic only. The remainder of the extent of Market Street / Market Square routing through the town centre allows two-way traffic operation.

2.2.16 Gouldsbrook Terrace / Court Barton / Church Street

2.2.17 Gouldsbrook Terrace / Court Barton / Church Street are all subject to a one-way traffic system, located to the west and north of the town centre.

2.3 Public Rights of Way (PRoW)

2.3.1 Public Rights of Way (PRoW) are Highways over which the public have linear rights of access and are protected and maintainable at public expense by SCC, the Highway Authority (Highways Act 1980). The Definitive Map & Statement of Public Rights of Way (DMS) provides the legal a record of all recorded Public Rights of Way and is conclusive evidence that public rights exist over land (Section 56 Wildlife & Countryside Act 1981).

2.3.2 The Definitive map of Public Rights of Way (online version) shows that there are a number of Footpaths as well as a Permissive Path routing in an east-west alignment though the application site. Footpath No. CH20/1 extends from the A356 - Station Road towards the western boundary of the site before joining further Footpaths (CH33/64/65/66) that route north and south. The Permissive Path that routes though the site also heads west from Station Road through the site, before continuing south along a stream.

2.4 Highway Safety

2.4.1 The extent of recorded road traffic collisions in the vicinity of the application site has been established from CrashMap. Information has been obtained covering the most recent five-year period available. Current guidance suggests that PIA data should be assessed for a period of three years, so the analysis presented below is very robust. The extents cover the immediate highway network adjoining the site.

2.4.2 The extent of PIA data obtained (blue hatched outline) and the locations of the incidents are shown in Figure 2.3.

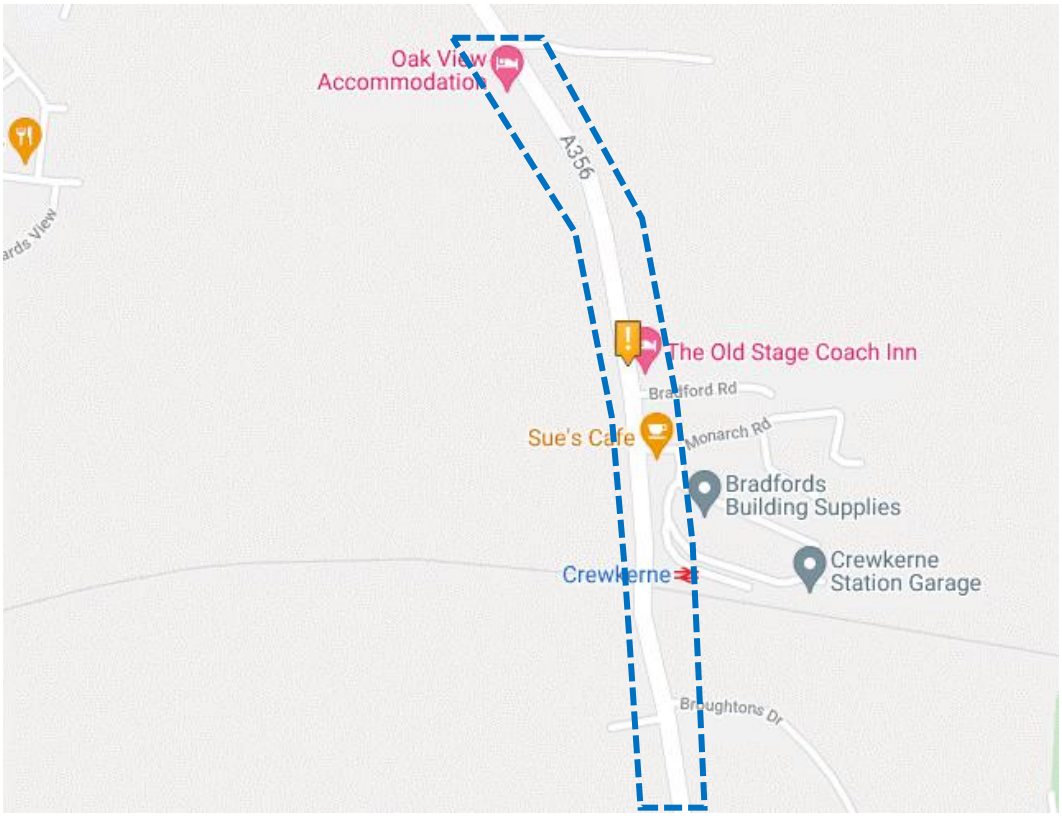


Figure 2.3: PIA Extents

2.4.3 Table 2.1 shows the number of PIA that occurred within the analysis period.

Table 2.1: PIA Records

	Slight	Serious	Fatal	Total
2016	0	0	0	0
2017	0	0	0	0
2018	0	0	0	0
2019	1	0	0	1
2020	0	0	0	0
Total	1	0	0	1

2.4.4 As indicated in Table 2.1, there is no significant pattern of incidents on the local highway network recorded in the latest five-year period within the study area.

2.4.5 Whilst there is a single incident which occurred within the study area, this is not untypical of a highway network of this nature, and there is no evidence of a highway safety issue.

3. SUSTAINABLE TRANSPORT ACCESS

3.1 Local Services, Facilities and Amenities

3.1.1 The following section summarises the existing services and facilities in the surrounding area of the application site, including retail, recreation and leisure, education and community facilities, healthcare, employment, open space, and sustainable transport links.

3.1.2 In addition, it should be noted that the proposed development would incorporate further landuses which would provide for the needs of residents and visitors, adding to its sustainability.

3.2 Retail (Shopping, Food & Drink)

3.2.1 Crewkerne has town centre stores along Market Street / Market Square and East Street. The town centre retail offer includes a number of public houses, restaurants, coffee shops, banks, pharmacy, veterinary practice and Lidl and Waitrose supermarkets.

3.2.2 Yeovil, located approximately 14km (9 miles) north-east of the application site, is significantly larger and provides an extensive range of day to day services / facilities including Yeovil College, Yeovil District Hospital, supermarkets including Tesco and Asda, schools, theatre, cinema, high street shops, restaurants, Huish Park Stadium, Lufton Trading Estate, Lynx Trading Estate, Pen Mill Trading Estate and Yeovil Pen Mill Station.

3.3 Healthcare

3.3.1 Crewkerne Hospital is situated to the south of the town centre and has 14 in-patient beds and one ward. Crewkerne Health Centre and Crewkerne Pharmacy are also located to the immediate south of the Hospital with all three accessed via Middle Path.

3.3.2 In regards to GP surgeries, in addition to Crewkerne Health Centre there is also West One Surgery situated off the A30. There are also a number of dental surgeries available within Crewkerne, situated within the town centre and on the A356 - North Street.

3.4 Educational Facilities

3.4.1 School within the Crewkerne area include Ashlands C of E First School, Haselbury Plucknett C of E First School, Hinton St George C of E First School, Maiden Beach Middle School, Merriott First School, Misterton C of E First School, St Bartholomew's C of E First School, Wadham C of E Community School and West Chinnock C of E Primary School.

3.4.2 Further educational facilities are available in Yeovil, including Yeovil College.

3.5 Recreation / Leisure

3.5.1 Crewkerne Sports Centre is situated to the north-east of the town centre from the A30 Yeovil Road and provided a number of activities including badminton, netball, 5-A-Side football, tennis, cricket and

gymnastics. The Centre is open 16:00 - 21:00 hrs Monday, Tuesday, Thursday and Friday, 13:00 - 22:00 hrs Wednesday, 9:00 - 12:00 Saturday and 9:30 - 16:30 Sunday.

3.5.2 Crewkerne Aqua Centre, situated immediately to the east of the town centre, provides swimming, gym, and health treatment facilities and is open 6:30 - 22:00 Monday, Wednesday, Thursday and Friday, 06:30 - 20:30 Tuesday and 08:00 - 18:00 over the weekend.

3.5.3 The Henhayes Community Centre and the George Reynolds Centre are situated to the immediate north of the Crewkerne Aqua Centre. The Henhayes Community Centre provides a number of events ranging from computer club, bingo, coffee mornings and weight watchers, and the George Reynolds Centre holds a number of clubs including Crewkerne Rugby and Football Club, Crewkerne Cricket Club, Crewkerne Running Club and the Crewkerne Royal British Legion.

3.5.4 There are a number of recreational areas located within / around Crewkerne, which are mostly associated with the schools or sports facilities.

3.6 Employment

3.6.1 The application site is well located to enable sustainable access to the employment opportunities available within Crewkerne town centre.

3.6.2 Significant employment opportunities within Crewkerne are provided by Crewkerne Business Park / Cropmead Trading Estate. The business park / industrial estate is well established with occupiers including Rotalink Ltd, Creasefield, Kingcombe Aquacare, All Glass and Glazing Ltd, VES Precision Engineers, Euroquartz and Parker Hannafin.

3.6.3 Bus services that operate from stops along the eastern boundary of the application site onto the A356 - Station Road and within the town centre provide regular services to a number of employment destinations including Yeovil.

3.6.4 In addition, services from Crewkerne Railway Station are provided to a number of employment destinations with the preceding station being Yeovil Junction and the following station being Axminster.

3.7 Accessibility by Walking

3.7.1 Although now superseded by CD143, TA91/05 Provision for Non-Motorised Users (NMU) provides useful guidance on likely walking and cycling distances. Paragraph 2.3 of TA91/05 states that 'Walking is used to access a wide variety of destinations including educational facilities, shops, and places of work, normally within a range of up to 2 miles' (3.2km). Paragraph 2.2 of TA91/05 states that 2 miles is 'a distance that could easily be walked by the majority of people' and (at paragraph 2.3) that 'Walking and rambling can also be undertaken as a leisure activity, often over longer distances'.

3.7.2 Based on the above, all of the facilities within Crewkerne discussed above are available via walking from the application site. An online isochrone generator has been utilised to provide an indicative isochrone plan showing the areas within Crewkerne that are accessible via walking within a 30-minute time period, based on an average walking speed of 4km/h.

3.7.3 Figure 3.1 indicates the 30-minute walking isochrone encompasses all of the services / facilities within Crewkerne including the bus stops, schools, town centre, sports facilities, hospital / pharmacy and Crewkerne Railway Station.

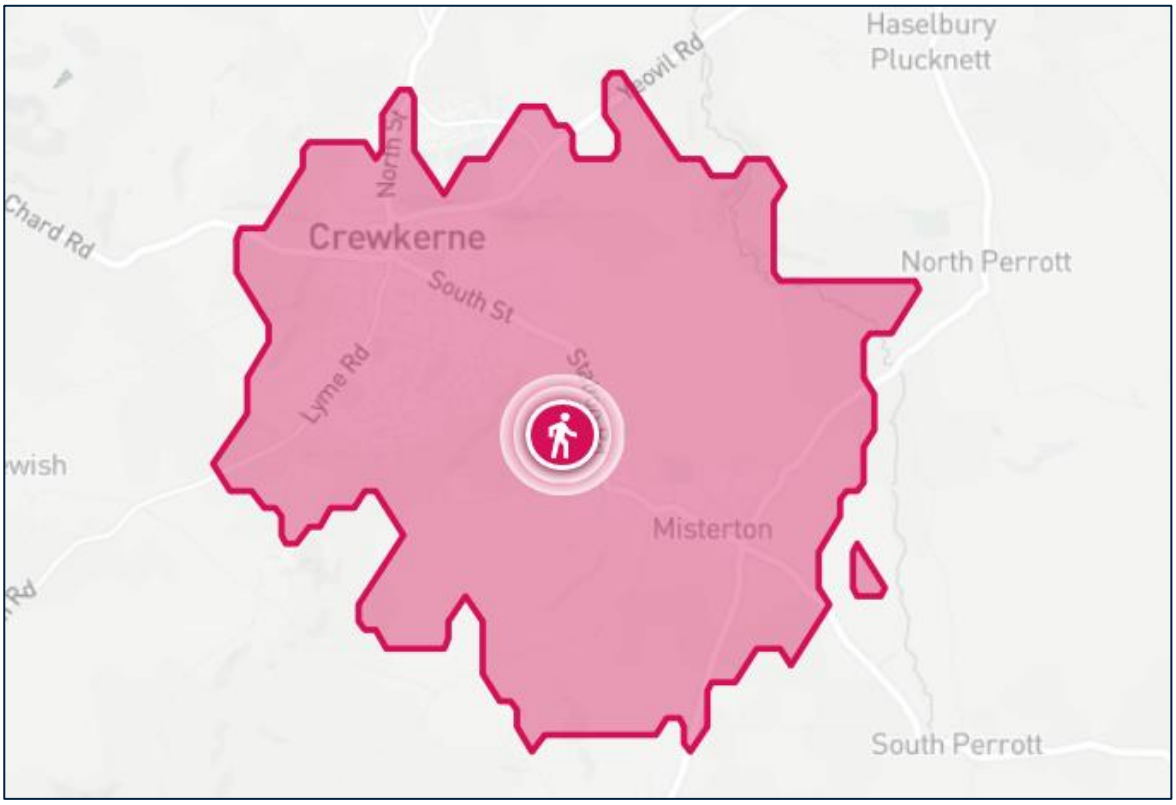


Figure 3.1: Walking Isochrone (30 Minute Distance)

3.8 Accessibility by Cycling

3.8.1 With regard to cycling, TA91/05 goes on to state (paragraph 2.11) that 'Cycling is used for accessing a variety of different destinations, including educational facilities shops and places of work, up to a range of around 5 miles (8km). Cycling is also undertaken as a leisure activity, often over much longer distances.' At paragraph 2.9, TA91/05 states that 5 miles (8km) is a distance 'that could easily be cycled by the majority of people'.

3.8.2 This is consistent with the statement in the former LTN02/08 Cycle Infrastructure Design (paragraph 1.5.1) that 'for commuter journeys, a trip distance of over five miles is not uncommon', and that 'Novice and occasional leisure cyclists will cycle longer distances where the cycle ride is the primary purpose of their journey. A round trip on a waymarked leisure route could easily involve distances of 20 to 30 miles. Experienced cyclists will often be prepared to cycle longer distances for whatever journey purpose.' The same principle is reiterated in the current LTN01/20.

3.8.3 All of the facilities within Crewkerne are available via cycling from the application site and the highway network within Crewkerne is considered to be largely conducive for cyclists.

3.8.4 Figure 3.2 highlights an indicative isochrone plan showing the areas accessible from the application site within a 30-minute cycling time distance.

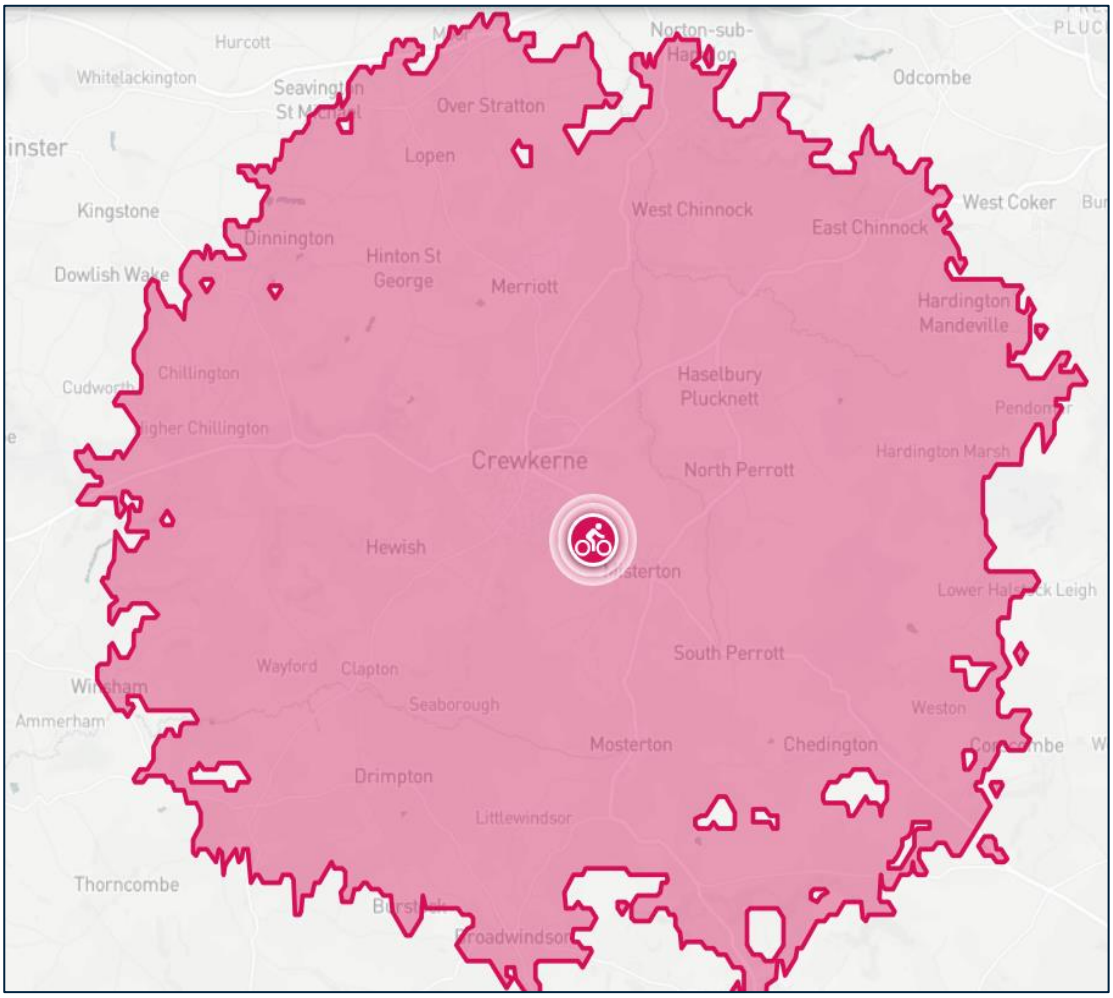


Figure 3.2: Cycling Isochrone (30 Minute Distance)

3.9 Public Transport

Bus Services

3.9.1 There are a number of bus stops within walking / cycling distance of the application site, most notably onto the A356 - Station Road along the eastern boundary of the site, known as the Crewkerne Railway Station stops. Further stops are available along the A356 - South Street (1.2km / 0.8 miles) and within the town centre along Church Street, Market Square and East Street (1.7km / 1.1 miles).

3.9.2 Regular services from these stops are provided by First in Wessex Dorset & South Somerset, Dorset County Council, South West Coaches and Beaminster Town Council and include services no. 6, 40, 96, 96A, B5 and CB3 to destinations including Yeovil, Beaminster, Bridport, Chard and Misterton. Service no. B5 operates as a school service bus commissioned by First in Wessex Dorset & South Somerset, providing one bus in the morning and afternoon designated for school drop off and pick up.

3.9.3 Further information on bus routes and frequency can be obtained from www.traveline.info.

3.9.4 A summary of the available bus services is shown in Table 3.1.

Table 3.1: Summary of Available Bus Services

Service No.	Operator	Days of Operation	Route	Weekday Frequency
6	First in Wessex Dorset & South Somerset	Mon - Fri	Bridport - Beaminster - Yeovil	Two Services Daily
40	Dorset County Council	Mon - Fri	Bridport - Beaminster - Yeovil	Hourly
96 / 96A	South West Coaches	Mon - Sat	Yeovil - Chard	Hourly
B5	First in Wessex Dorset & South Somerset	Mon - Fri	Beaminster School - Drimpton - Mosterton	Two Services Daily

3.9.5 As part of the access proposals, the existing Station Road northbound bus stop is proposed to be relocated to the north, with upgraded facilities including a footway link into the site. This is shown on drawing 09984-HYD-XX-XX-DR-TP-0113 attached to the rear of this report as Appendix A.

Rail Services

3.9.6 Crewkerne Railway Station is located to the immediate east of the application site, on the opposite side of the A356 - Station Road and is managed by South Western Railway (SWR). Crewkerne's ticket hall leads directly onto the single platform and there is a ticket machine and a side entrance in the car park. There are public toilets on the platform, as well as some bench seating and two small bike racks. The station has no refreshment facilities but there is a cafe and a pub nearby.

3.9.7 Trains to Crewkerne travel on the West of England Main Line, and the station offers regular services to London Waterloo and Exeter St David's, with the preceding station being Yeovil Junction and the following station being Axminster.

3.9.8 As part of the development proposals, it is intended to seek to provide a direct access between the site and the platform to the south, in liaison with the Train Operating Company and Network Rail.

3.10 Car Sharing

3.10.1 Car Sharing provides a sustainable modal choice and a potential door to door option for residents. It reduces costs and provides an opportunity for discussion, both personal and work based; personal security is also much less of an issue if you are well acquainted with your travel partner(s).

3.10.2 For reference, residents can sign up to car share schemes in Somerset via the following websites www.liftshare.com and www.blablacar.co.uk.

4. DEVELOPMENT PROPOSALS

4.1 The Planning Application

4.1.1 An Illustrative Site Layout Plan is shown on Drawing No. 210510 SK013 Framework Plan and is attached to the rear of this report as Appendix B. Please note this does not include the latest access General Arrangement plans by Hydrock.

4.2 Access / Egress Strategy

4.2.1 The application site will be served via a compact roundabout, with an over-runnable strip easing the passage of HGVs.

4.2.2 The principle of a roundabout access has previously been scoped with Somerset County Council as the Local Highway Authority.

4.2.3 A secondary access in the form of a priority junction is proposed to the north of the new roundabout as shown on the site access general arrangement drawing (09984-HYD-XX-XX-DR-TP-0113 - Appendix A).

4.2.4 Emergency vehicle access will be achieved via the secondary access, with emergency vehicles able to travel between the two sections of the site via 3m connections with collapsible bollards to prevent public vehicular use. These can also be used to encourage pedestrian permeability within the site.

4.2.5 Clear intervisibility will be provided between the roundabout and secondary access, and at the junctions.

4.3 Pedestrian/Cycle Access

4.3.1 Pedestrian and cycle accessibility are key elements of the emerging development proposal. The internal road layout will be designed to reduce vehicle speeds and provide a high-quality environment for all users. It is proposed a combination of geometric designs to keep vehicle speeds to a minimum, i.e. vertical deflection, shared surface treatment, and use of landscaping will create an area that is conducive to safe walking and cycling.

4.3.2 In terms of sustainability, footway for pedestrian access will be available throughout the application site enabling pedestrians to safely and conveniently access all areas of the site.

4.3.3 Pedestrian crossing points are proposed at the site accesses (drawing 09984-HYD-XX-XX-DR-TP-0113 - Appendix A), and the applicant will explore with the Train Operating Company and Network Rail the potential to provide a direct pedestrian access onto the railway station platform to the south.

4.4 Internal Layout

4.4.1 The internal street design will be developed in accordance with the principles set out in the MfS and MfS 2. A network of footways is proposed and dropped kerbing and tactile pavements will be provided where necessary. The alignment of the proposed internal road will ensure that vehicle speeds do not exceed 20mph, thus providing a safe environment for pedestrians, cyclists and other vehicles.

4.4.2 Pedestrian and cycle movements will take precedence within the scheme wherever possible as the preferred form of movement to encourage sustainable transport. The pedestrian and cycle network are indicated on the development Masterplan, which highlights linkages both within in the scheme and out of the scheme.

4.5 Parking Strategy

4.5.1 The proposed parking strategy will be assessed against the SCC's 'Parking Strategy March 2012' to determine the suitability for each of the element of the site. This will include both motorcycle, car and cycle parking. In the absence of any guidance for a particular land use, the context of the land use and local context will be taken into consideration.

4.5.2 An important element of the scheme is the provision of a 100-space railway station car park in the south east corner of the site, forming part of a mobility hub as described subsequently. This facility has been developed in liaison with the Train Operating Company and has been designed in accordance with Network Rail guidance. It is intended to address the existing demand for parking which cannot be met at the current station car park, and which results in on-street parking around the station. It also provides for future growth in rail travel at Crewkerne, which is on the mainline connecting the south west with London Waterloo and provides for a significant catchment.

4.6 Cycle Parking

4.6.1 Safe & secure cycle parking facilities will be provided as part of the scheme, located as close as possible to buildings. Where communal cycle facilities are to be provided, Sheffield Racks will be integrated into the landscape scheme and close to the main buildings.

4.6.2 Cycle parking, including parking for e-scooters and e-bikes, will be a key aspect of the proposed mobility hub.

4.7 Mobility Hub

4.7.1 The south east corner of the site will include a 100-space station carpark, adjacent to which will be Mobility Hub facilities including:

- Secure and covered cycle parking
- Bicycle repair point (public pump and tools)
- Electric Vehicle charge points
- Car Club parking
- Footway links to the Station Road bus stop
- Footway links to the rail station
- Walking, cycling and public transport information / wayfinding
- Links with associated uses within the masterplan, with the Mobility Hub comprising a central part of the non-residential uses proposed near to the station

4.7.2 The car park will be designed to accommodate coaches and, if deemed appropriate in future, access by service buses.

4.7.3 An indicative image showing typical Mobility Hub provision is shown below for illustration.

Fig 4.1: Indicative mobility hub provision

5. TRIP GENERATION AND TRAFFIC IMPACT ANALYSIS

5.1 Preface

5.1.1 To establish the estimated trip generation to and from the application site, the Trip Rate Information Computer System (TRICS) database will be used. TRICS is used to derive the predicted arrival and departure trips likely to be generated by a development proposal. The TRICS database predicts the likely number of trips from a proposed development by comparing the site with existing developments of similar size and characteristics across the UK.

5.2 Trip Assignment / Distribution

5.2.1 The distribution of vehicular trips uses a first principles approach, utilising the existing traffic movements within the assessed network, obtained from traffic surveys that will be collected for the modelling assessment. The wider traffic distribution will be based on the Travel to Work 2011 Census data for area South Somerset 006.

5.3 Modelling Tools

5.3.1 In order to assess the impact of the proposed development on the local highway network, it is proposed to assess the impact of the proposed vehicular traffic using the industry standard tool Junctions 10.

5.3.2 To assess the impact of the development traffic it is proposed to use the latest industry standard modelling software, Junctions 10, ARCADY module for roundabout capacity analysis and the Junctions 10, PICADY module for priority junction capacity analysis.

5.4 Impact Assessment Extents

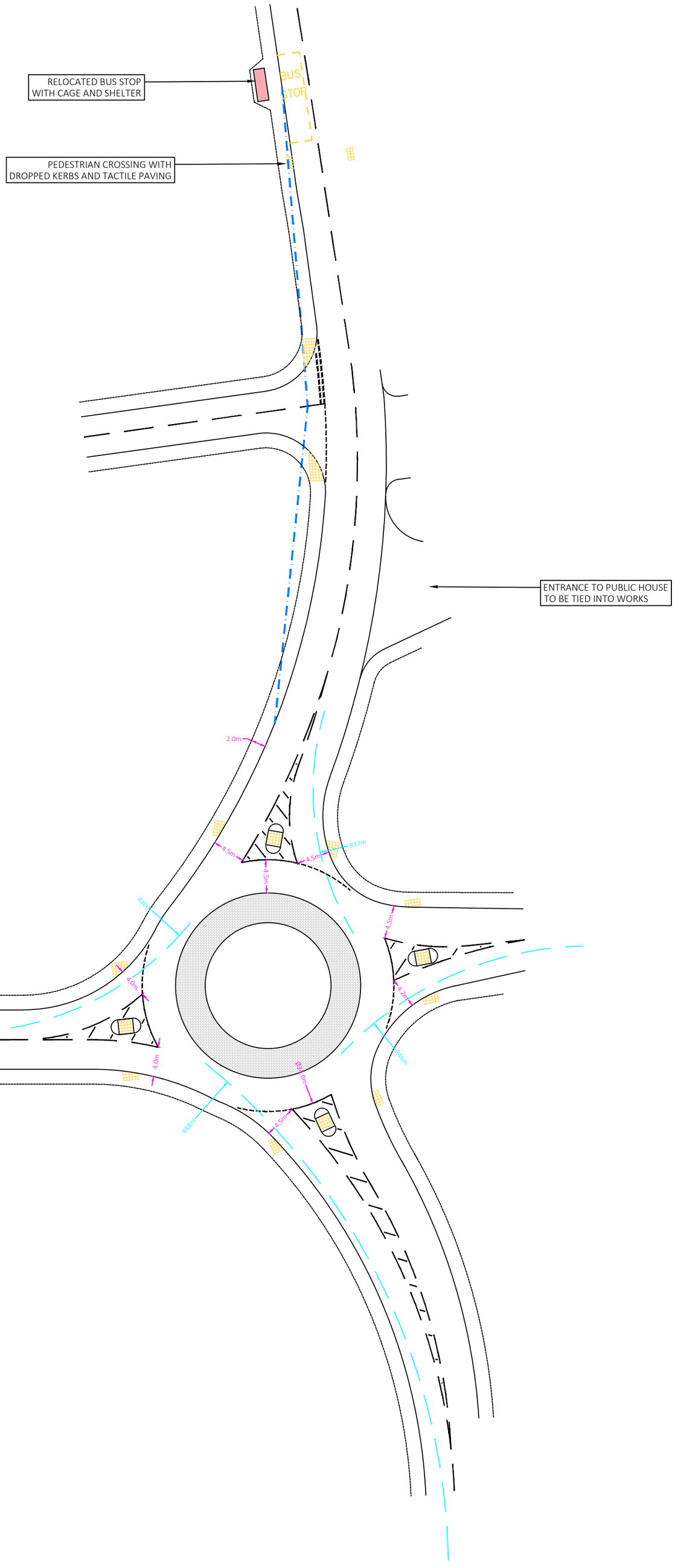
5.4.1 As part of the TA, it is proposed to assess the site access junctions to demonstrate the suitability of their design. This document seeks confirmation from the approving authorities as to whether any additional junctions would need to be assessed as part of this application.

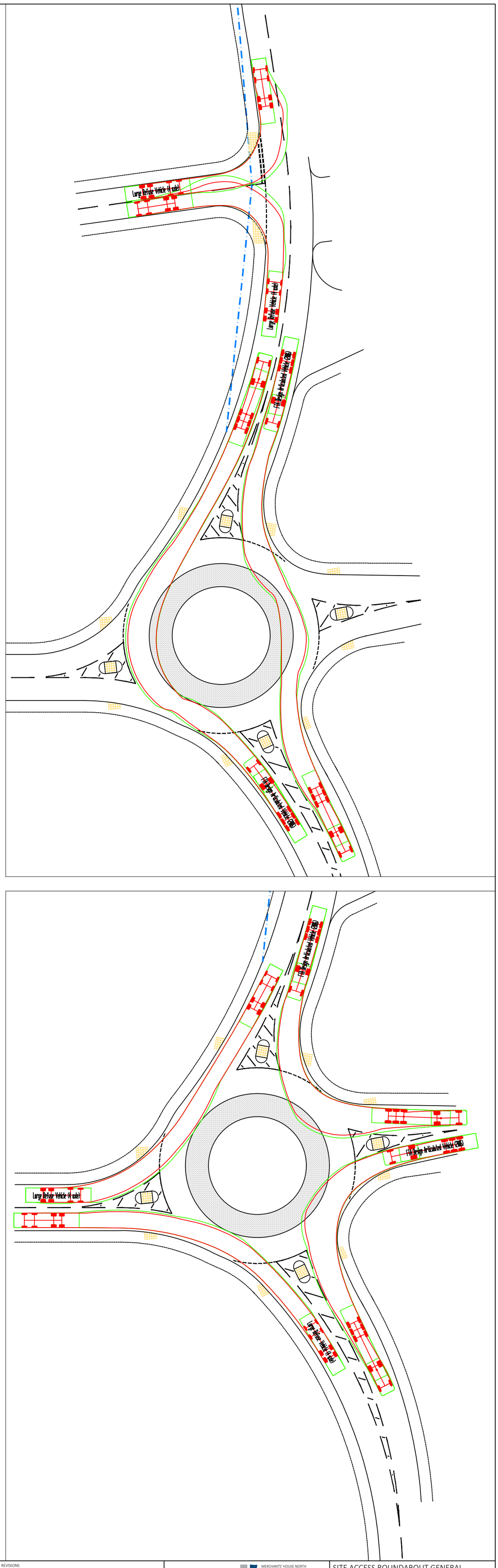
6. SUMMARY

6.1.1 Hydrock has been commissioned by Place Land LLP to prepare a Technical Note in support of a pre-planning application for a proposed residential development on land off Station Road, Crewkerne, Somerset.

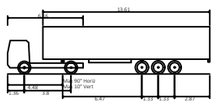
6.1.2 The information provided in this TN aims to provide the LPA and LHA with information to inform their pre-application advice. The information provided from the pre-application advice will then be used to compile a Transport Assessment (TA) to support the outline planning application.

Appendix A Site Access General Arrangement (Drawing no 09984-HYD-XX-XX-DR-TP-0113)

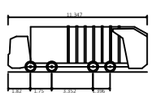




VEHICLE MODELS USED IN SWEPT PATH ANALYSIS



FTA Design Articulated Vehicle (2006)	
Overall Length	16.480m
Overall Width	2.550m
Overall Body Height	3.870m
Min Body Ground Clearance	0.515m
Max Track Width	2.470m
Lock to lock time	3.00s
Kerb to Kerb Turning Radius	6.600m



Large Refuse Vehicle (4 axle)	
Overall Length	11.347m
Overall Width	2.500m
Overall Body Height	3.751m
Min Body Ground Clearance	0.304m
Track Width	2.500m
Lock to lock time	6.00s
Wall to Wall Turning Radius	11.330m

NOTES

REVISIONS *(CONTINUED)*

REVISIONS

Rev	Date	Description	By	Ckd	App
P01	02/11/2021	First Issue.	MP	BS-L	BS-L

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CLIENT
PLACE LAND LLP

PROJECT
LAND OFF STATION ROAD, CREWKERNE

SITE ACCESS ROUNDABOUT GENERAL ARRANGEMENT

HYDROCK PROJECT NO.	SCALE @ A2
09984	1:500

STATUS DESCRIPTION	STATUS
INFORMATION	S2

DRAWING NO. (PROJECT CODE-ORGINATOR-ZONE-LEVEL-TYPE-ROLE-NUMBER)
09984-HYD-XX-XX-DR-TP-0113

REVISION
P01

Appendix B 210510 SK013 Framework Plan

NOTES:

Land at Station Road, Crewkerne Framework Plan		-
		PC/DE
210510 SK013	1:1000 @ A1	22/07/21

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DRAWING STATUS Preliminary