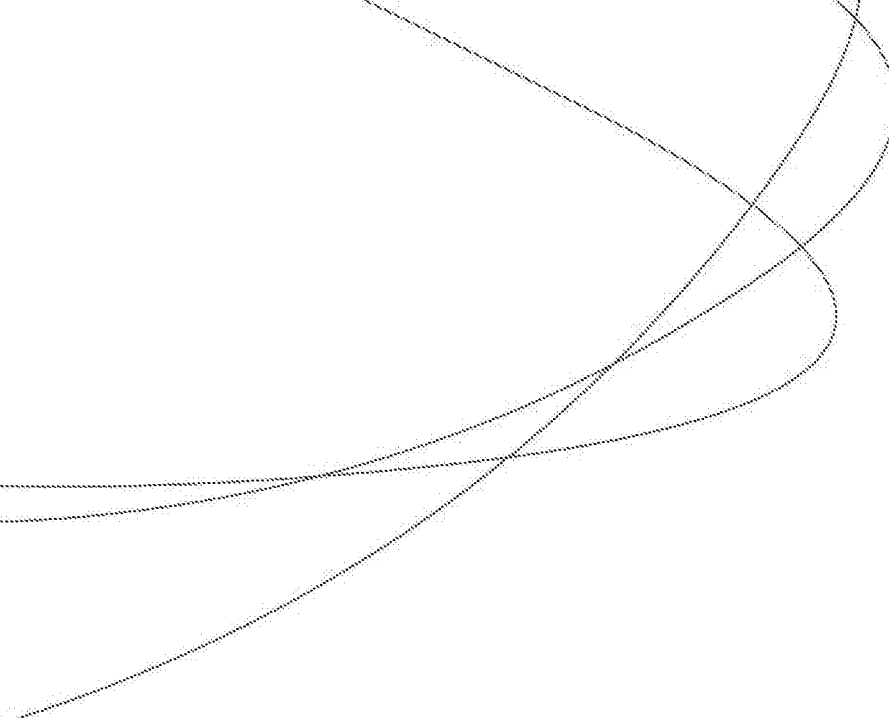




## DOCUMENT CONTROL

**Project:** Land South of Chichester Road, Bognor Regis  
Residential Development

**Document:** Technical Note

**Client:** Michael Bish

**Reference:** ADMA/17/3765s

### Document Checking:

|              |     |      |            |
|--------------|-----|------|------------|
| Author:      | EJD | Date | 04/06/2018 |
| Checked by:  | ALB | Date | 04/06/2018 |
| Approved by: | ALB | Date | 04/06/2018 |

### Status:

| Issue | Date     | Status | Issued by |
|-------|----------|--------|-----------|
| 1.    | 04/06/18 | Final  | EJD       |
| 2.    |          |        |           |
| 3.    |          |        |           |
| 4.    |          |        |           |
| 5.    |          |        |           |
| 6.    |          |        |           |
| 7.    |          |        |           |

© Copyright Russell Giles Partnership Limited 2018

No part of this publication may be reproduced by any means without the prior permission of Russell Giles Partnership Limited.

## CONTENTS

|     |                                 |   |
|-----|---------------------------------|---|
| 1   | INTRODUCTION.....               | 1 |
| 2   | PROPOSED DEVELOPMENT .....      | 2 |
| 2.2 | Vehicle Access .....            | 2 |
|     | Visibility .....                | 2 |
| 2.3 | Pedestrian Access .....         | 2 |
| 2.4 | Servicing Arrangements .....    | 3 |
| 2.5 | Emergency Access .....          | 3 |
| 2.6 | Stage 1 Road Safety Audit ..... | 3 |
| 2.7 | Parking Provision .....         | 3 |
|     | Car Parking .....               | 3 |
|     | Cycle Parking .....             | 4 |
| 3   | PARKING SURVEY .....            | 5 |
| 3.2 | Methodology .....               | 5 |
| 3.3 | Results .....                   | 6 |

## DRAWINGS

|               |                                                                  |
|---------------|------------------------------------------------------------------|
| 2018/3765/001 | Site Overview, Visibility Splays and Parking Swept Path Analysis |
| 2018/3765/002 | Refuse Vehicle Swept Path Analysis                               |

## APPENDICES

|            |                                                |
|------------|------------------------------------------------|
| Appendix A | WSCC Consultation Response                     |
| Appendix B | Stage 1 Road Safety Audit                      |
| Appendix C | WSCC Residential Car Parking Demand Calculator |
| Appendix D | Lambeth Parking Survey Results                 |

## 1 INTRODUCTION

- 1.1.1 This Technical Note (TN) has been prepared by Russell Giles Partnership Ltd (RGP) on behalf of Michael Bish to support a planning application for a proposed residential development at 283 Chichester Road, Bognor Regis. This report provides supplementary highways and transport information as requested within West Sussex County Council's (WSCC) consultation response attached at **Appendix A**.
- 1.1.2 The application site covers an area of approximately 0.18ha, located on the southern side of Chichester Road, c.1.9km to the north-west of Bognor Regis town centre. The site location is shown in **Figure 1.1**.

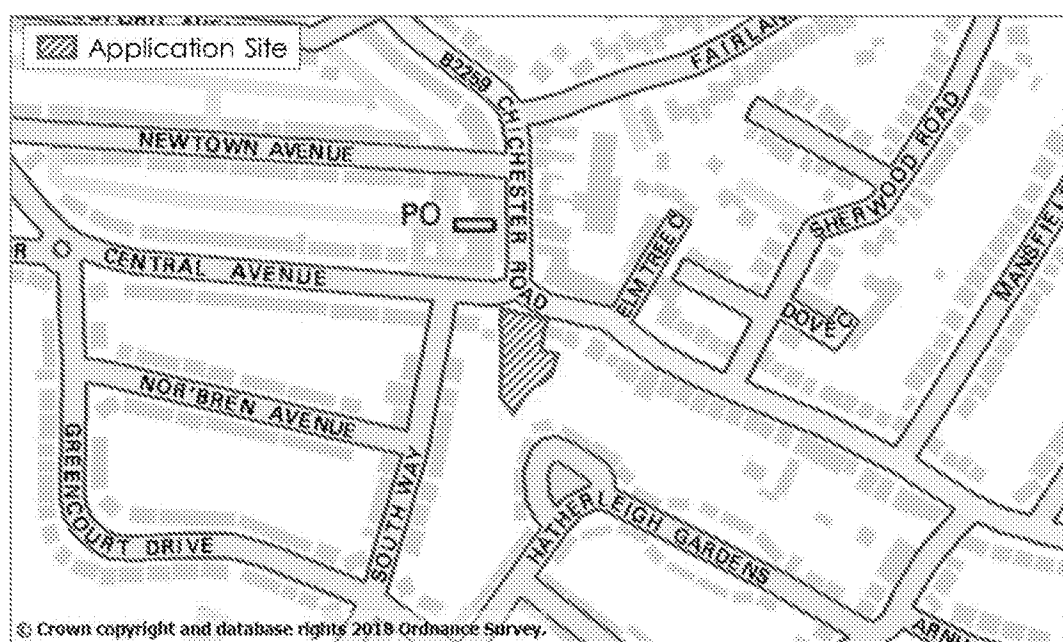


Figure 1.1: Site Location

- 1.1.3 The existing site currently comprises 4 residential dwellings and a small commercial unit. The application proposes the demolition of the commercial unit and 2 dwellings, the restoration of 2 of the dwellings, and the construction of 10 new dwellings.

## 2 PROPOSED DEVELOPMENT

- 2.1.1 The proposed development would involve the restoration of 2 existing dwellings, and the construction of 10 new dwellings, totalling 12 units at the site. The proposed layout is shown in **Drawing 2018/3765/001** and the proposed accommodation schedule is provided in **Figure 2.1**.

| Unit Type    | Number of Units |
|--------------|-----------------|
| 2 Bed Flat   | 8               |
| 3 Bed House  | 4               |
| <b>Total</b> | <b>12</b>       |

**Figure 2.1: Accommodation Schedule**

### 2.2 Vehicle Access

- 2.2.1 Vehicle access to the site would be served from a reformed access adjoining the southern side of Chichester Road. The access would take the form of a 4.8m wide bellmouth access supported by 6.0m corner radii.
- 2.2.2 The access geometries would allow concurrent car movements and can accommodate large service vehicles. A vehicle swept path analysis has been undertaken demonstrating access and egress manoeuvres in **Drawing 2018/3765/001**.

#### *Visibility*

- 2.2.3 Visibility requirements at the access have been based on the 30mph speed limit on Chichester Road. Using the calculation coefficients set out in Manual for Streets (MIS) guidance, a stopping sight distance (adjusted for bonnet length) of 43.0m would be required in both directions.
- 2.2.4 Visibility from the access accordingly achieves the necessary sight lines in both the primary (looking east) and secondary (looking west) directions. Visibility splays from the proposed access have been shown on **Drawing 2018/3765/001**.

### 2.3 Pedestrian Access

- 2.3.1 Pedestrian access to the dwelling at the front of the site would be served from the existing footways on the southern side of Chichester Road. Access to the properties to the rear would be served via the proposed vehicle access. A 1.2m wide footway would be provided on the western side of the access c.5m into the site. The footway and access road would be surfaced with contrasting materials so as to clearly demark pedestrian and vehicle priority.

## 2.4 Servicing Arrangements

- 2.4.1 Refuse collection would be undertaken within the site from a bin store located in the proposed parking court. The layout of the parking court is such that large refuse vehicles can access the site and turn within the site, allowing vehicles to access/egress the site in forward gear. A vehicle swept path analysis demonstrating access/ egress and turning manoeuvres has been undertaken in **Drawing 2018/3765/001**.
- 2.4.2 Bin carry distances between properties and refuse collectors would be within the maximum thresholds set out in MfS from all properties (25m for collectors 30m for residents).

## 2.5 Emergency Access

- 2.5.1 The proposed access geometries can accommodate access and egress manoeuvres by fire tenders (the largest emergency vehicles). A vehicle tracking exercise demonstrating a larger and less manoeuvrable refuse vehicle serves to demonstrate that fire tenders can comfortably access the site in **Drawing 2018/3765/001**.
- 2.5.2 The proposed development would provide access within 45m of all areas of buildings, in accordance with Building Regulation requirements for emergency vehicles. A minimum carriageway width of 3.7m is maintained throughout the site in accordance with Building Regulation requirements.

## 2.6 Stage 1 Road Safety Audit

- 2.6.1 The proposed vehicle and pedestrian access arrangements have been subject to a Stage 1 Road Safety Audit (RSA). The RSA was undertaken by The Safety Forum (TSF) on 25<sup>th</sup> May 2018.
- 2.6.2 The Stage 1 RSA identified a single problem with the proposed access arrangement based on **Drawings 2018/3765/001** and **2018/3765/002**. A copy of the Stage 1 RSA and Designers Response is shown in **Appendix 8**.

## 2.7 Parking Provision

### *Car Parking*

- 2.7.1 The anticipated parking demand has been determined using WSCC's Residential Car Parking Demand Calculator tool. A summary of the anticipated demand and proposed parking provision is shown in **Figure 2.2** and the full calculator output is attached at **Appendix C**.

|                               | WSCC Car<br>Parking Demand | Proposed<br>Provision |
|-------------------------------|----------------------------|-----------------------|
| Allocated                     | 16                         | 16                    |
| Visitor/Resident<br>Overspill | 4                          | 2                     |
| <b>Total</b>                  | <b>20</b>                  | <b>18</b>             |

**Figure 2.2: Car Parking Provision**

- 2.7.2 Whilst the proposed parking provision falls short of the anticipated car parking demand, there are ample opportunities for visitor/resident overspill to park on-street in the vicinity of the site. A study of available parking on the local road network is provided in **Section 4**.
- 2.7.3 Car parking would take place in a parking court at the centre of the site. Parking spaces would take the form of echelon bays and would use minimum dimensions of 2.4m x 4.8m, with 6m reversing distances, in accordance with MfS guidance. The layout includes 8 tandem spaces which would be allocated to single dwellings.
- 2.7.4 A vehicle swept path analysis demonstrating car parking manoeuvres has been undertaken in **Drawing 2018/3765/001**.

### **Cycle Parking**

- 2.7.5 Cycle parking would be provided in accordance with WSCC's cycle parking standards as set out in WSCC's Document "Guidance for Parking in New Residential Developments" September 2010. A summary of the required and proposed cycle parking provision is shown in **Figure 2.3**.

| Type         | Size  | Number of<br>Units | Cycle<br>Provision<br>(per unit) | Total<br>Required | Proposed<br>Provision |
|--------------|-------|--------------------|----------------------------------|-------------------|-----------------------|
| Flats        | 2 Bed | 8                  | 1 space                          | 8                 | 8                     |
| Houses       | 3 Bed | 4                  | 2 spaces                         | 8                 | 8                     |
| <b>Total</b> | -     | <b>12</b>          | -                                | <b>16</b>         | <b>16</b>             |

**Figure 2.3: Cycle Parking Provision**

- 2.7.6 Cycle parking for the proposed houses would be provided within the curtilage of the properties within sheds in the rear gardens. Cycle parking for the proposed flats would be provided within communal secure, sheltered cycle stores to the rear of the building.

### 3 PARKING SURVEY

3.1.1 WSCC's consultation response identifies a shortfall in the proposed on-site parking compared with the anticipated demand, as determined by WSCC's Residential Car Parking Demand Calculator tool. WSCC's response refers to the development providing 14 spaces, which is a shortfall of 6 spaces compared with the anticipated demand (see **Section 2.7**). The site layout has since been revised to provide 18 spaces however a shortfall of 2 on-site parking spaces remains. The development is therefore anticipated to generate a demand for 2 car parking spaces on the local road network.

3.1.2 In order to demonstrate that the local network can accommodate the additional demand for parking, WSCC have requested that a parking survey be undertaken in the vicinity of the site.

#### 3.2 Methodology

3.2.1 In order to assess the existing on-street parking demand in the vicinity of the site, a parking survey has been undertaken by Modal Data Ltd. The survey conducted followed the established 'Lambeth' methodology in the mornings of Thursday 13th and Friday 14th May 2018. The 'Lambeth' methodology aims to identify the peak parking conditions for residents by undertaking a survey early in the morning when residents are typically at home and therefore parked on the local road network.

3.2.2 The survey area includes all viable on-street parking areas within a 200m walking distance of the development site (c. 2.5 min walk). Parked vehicle counts were recorded at 03:00am on Thursday 3<sup>rd</sup>, and 01:00am on Friday 4<sup>th</sup> as per the standard 'Lambeth' methodology.

3.2.3 The parking counts can be compared to the total capacity in the study area to determine the parking stress as a percentage. The maximum parking capacity was established assuming standard passenger car unit (PCU) dimensions of 6.0m length and 2.0m wide. The PCU size provides a robust estimation of the parking capacity in the survey area, as in reality cars can park at a higher density than this unit allows.

3.2.4 In calculating the maximum capacity, care was taken to exclude parking areas in front of dropped kerbs that serve private driveways and disabled parking bays. The study area and maximum parking capacity on each road is demonstrated in **Figures 3.1 and 3.2**. The results of the survey are attached in **Appendix D**.

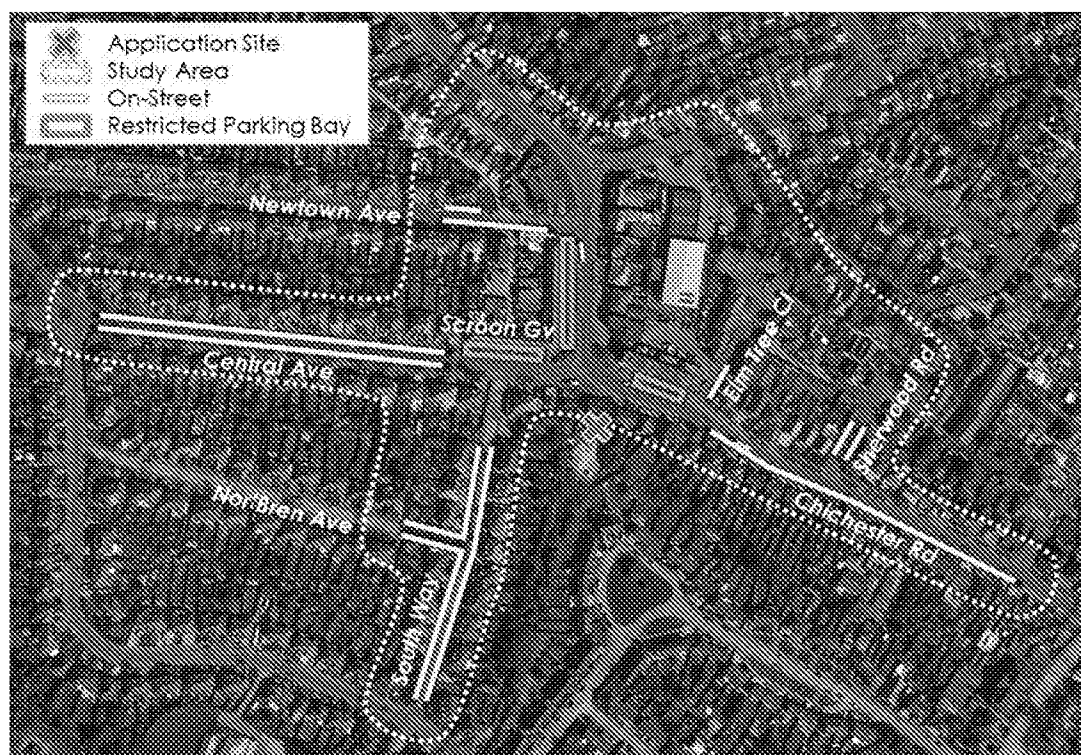


Figure 3.1: Survey Area

| Location        | Restricted Bays | On-Street  | Disabled | Total      |
|-----------------|-----------------|------------|----------|------------|
| Chichester Road | 5               | 22         | 1        | 28         |
| Elm Tree Close  | -               | 5          | -        | 5          |
| Sherwood Road   | -               | 8          | -        | 8          |
| South Way       | -               | 20         | -        | 20         |
| Norbren Ave     | -               | 6          | -        | 6          |
| Newtown Ave     | -               | 6          | -        | 6          |
| Scroon Grove    | 11              | 11         | -        | 22         |
| Central Ave     | -               | 45         | -        | 45         |
| <b>Total</b>    | <b>16</b>       | <b>123</b> | <b>1</b> | <b>140</b> |

Figure 3.2: Maximum Parking Capacities

### 3.3 Results

3.3.1 This section summarises the results from the car parking survey conducted by the survey company Modal Data on the Thursday 13th and Friday 14th May 2018. The survey identifies the remaining capacity on the local road network allowing for the additional parking demand as a result of the proposed development.

3.3.2 The survey measured parking 'stress' as a percentage of the overall spaces occupied by parked vehicles. The average stress over the two surveys days has been used for the analysis. In order to take a robust view of the remaining parking capacity in the survey area, any restricted or disabled parking bays have been omitted from stress analysis as these are unlikely to be used by future residents. A summary of the results is demonstrated in Figure 3.3.

| Location        | Cars Parked | Unrestricted Capacity | Remaining Capacity | Parking Stress |
|-----------------|-------------|-----------------------|--------------------|----------------|
| Chichester Road | 20          | 22                    | 2                  | 91%            |
| Elm Tree Close  | 6           | 5                     | -1                 | 120%           |
| Sherwood Road   | 8           | 8                     | 1                  | 94%            |
| South Way       | 7           | 20                    | 14                 | 33%            |
| Nor'Bren Ave    | 0           | 6                     | 6                  | 0%             |
| Newtown Ave     | 4           | 6                     | 2                  | 67%            |
| Scroon Grove    | 8           | 11                    | 3                  | 73%            |
| Central Ave     | 17          | 45                    | 29                 | 37%            |
| <b>Total</b>    | <b>69</b>   | <b>123</b>            | <b>55</b>          | <b>56%</b>     |

**Figure 3.3: Survey Results (2 Day Average)**

- 3.3.3 The survey revealed an average parking stress of 56% across the overall study area equating to 55 remaining parking spaces within a 200m walking distance of the site.
- 3.3.4 It is concluded that the parking survey has demonstrated sufficient parking capacity on the surrounding local road network to accommodate the parking an additional 6 cars on the local road network.

## **DRAWINGS**



|                             |        |
|-----------------------------|--------|
| DB32 Private Car            |        |
| Overall Length              | 4.223m |
| Overall Width               | 1.418m |
| Overall Body Height         | 1.392m |
| Min Body Ground Clearance   | 0.232m |
| Max Track Width             | 1.629m |
| Lock to lock time           | 4.00s  |
| Kerb to Kerb Turning Radius | 5.780m |

## RESIDUAL HAZARDS

In addition to the hazards/risks normally associated with the type of work detailed on this drawing, note the following:

- Buried services
- Working in live carriageway
- Public being struck by moving plant
- excavations close to existing structures
- Dust from granular materials
- Hazardous Substances

It is assumed that all works will be carried out by a competent contractor working, where appropriate, to an approved risk assessment and method statement

This map is based on or reproduced from Ordnance Survey material with the permission of Ordnance Survey on behalf of the controller of Her Majesty's Stationary Office (c) Crown Copyright. Licence Number: AJ101037120.  
This drawing is based upon Ordnance Survey mapping.  
- NPS accept no liability for any inaccuracies with this data.



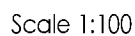
**Transport Planning and Infrastructure Design Consultant**  
 Suite 2, West Gate, Norton Lane, Westborough, Gloucestershire, PO20 3A  
 Tel: 01762 210 615      Fax: 01762 210 616

Michael Bish

Project  
Land South of Chichester Road,  
Bognor Regis

## Site Overview, Visibility Splays and Parking Swept Path Analysis

|      |          |             |               |            |     |             |     |
|------|----------|-------------|---------------|------------|-----|-------------|-----|
| Date | 1:250    | Drawn By    | SMO           | Checked By | ALB | Approved By | PMR |
| Date | May 2018 | Drawing No. | 2017/3765/001 |            |     | Rev.        |     |



A diagram showing a car on a platform. The car's length is labeled as 4.223. The platform has a width of 0.760 and a height of 2.862.

DB32 Private Car  
Overall Length  
Overall Width  
Overall Body Height  
Min Body Ground Clearance  
Max Track Width  
Lock to lock time  
Kerb to Kerb Turning Radius

Technical drawing of a truck chassis showing dimensions: 11, 1.8, 4, and 3.2.

|                             |         |
|-----------------------------|---------|
| CDC Refuse Vehicle          |         |
| Overall Length              | 11.000m |
| Overall Width               | 3.000m  |
| Overall Body Height         | 3.760m  |
| Min Body Ground Clearance   | 0.304m  |
| Track Width                 | 2.500m  |
| Lock to lock time           | 4.00s   |
| Wall to Wall Turning Radius | 8.500m  |

## RESIDUAL HAZARDS

In addition to the hazards/risks normally associated with the type of work detailed on this drawing, note the following:

- Buried services
- Working in live carriageway
- Public being struck by moving plant
- excavations close to existing structures
- Dust from granular materials
- Hazardous Substances

It is assumed that all works will be carried out by a competent contractor working, where appropriate, to an approved risk assessment and method statement

This map is based on or reproduced from Ordnance Survey material with the permission of Ordnance Survey on behalf of the Controller of Her Majesty's Stationary Office (c) Crown Copyright, Licence Number: A101037722  
This drawing is based upon Ordnance Survey mapping.  
- NSP accept no liability for any inaccuracies with the data.



Michael Bish

Land South of Chichester Road,  
Bognor Regis

## Refuse Vehicle Swept Path Analysis

|             |               |            |             |
|-------------|---------------|------------|-------------|
| Code        | Created By    | Checked By | Approved By |
| Varies @ A2 | SMO           | ALB        | PMR         |
| Date        | Decoding No.  |            |             |
| May 2018    | 2017/3765/002 |            |             |

## **APPENDIX A**

**WEST SUSSEX COUNTY COUNCIL  
STRATEGIC PLANNING CONSULTATION**

**DATE: 01/03/2018**

**FROM: Alison Meeus**

**TO: Arun District Council  
FAO: Planning Case Officer**

**SUBJECT: BR-324-17**

**283 Chichester Road, Bognor Regis, PO21 5AH**

**Residential development: restoration of 2 houses and attached commercial annexe to pair of semi-detached houses, replacement of bungalow with pair of semi-detached houses, and development of land to rear for eight flats.**

**RECOMMENDATION:**

|                  |                          |                     |                          |                         |                                     |
|------------------|--------------------------|---------------------|--------------------------|-------------------------|-------------------------------------|
| <b>Advice</b>    | <input type="checkbox"/> | <b>Modification</b> | <input type="checkbox"/> | <b>More Information</b> | <input checked="" type="checkbox"/> |
| <b>Objection</b> | <input type="checkbox"/> | <b>No Objection</b> | <input type="checkbox"/> | <b>Refusal</b>          | <input type="checkbox"/>            |

WSCC as the County Highway Authority has reviewed the above planning submission for the development of 283 Chichester Road, Bognor Regis.

The site currently has 4 dwellings, two which will be renovated and two to the rear of the site that will be demolished. These will be replaced by 2 houses and 8 flats, creating a total development of 12 dwellings, (a net increase of 8 dwellings). Please provide more information:-

- 1) Due to the intensification of use, at an existing access onto a busy 'A' road; WSCC would like a Stage 1 Road Safety audit undertaken, including a signed designer's response.
- 2) Refuse vehicle proposals, including swept paths or waiting position on the A259 should be considered within this
- 3) Cycle storage should be included in plans
- 4) Alternative 'on -street' visitor parking for at least 6 cars within a 2 minute walk should be provided as the car parking strategy falls short of any unallocated parking for the use.

The site currently has an existing access onto Chichester Road which is in the form of a minor crossover. Plans submitted show no changes are proposed to this, and it is not physically possible to make it any wider. Although it appears wide enough to accommodate a car, it is doubtful if two cars would be able to pass; however no dimensions are provided to confirm the actual width.

The access road is short in its length and therefore lends itself well to a shared use layout. Manual for Streets recommend shared use layouts are likely to work well in short lengths, where vehicle speeds are low. It is envisaged that cars exiting from the site will be travelling at low speeds and have good forward visibility. Due to the access position on the outside of the bend splays from the access are considered good. It is noticed there is an area of vegetation outside of the applicants control, within the boundary of no. 281 Chichester Road (right hand visibility splay) which may benefit from some cutting back to keep it at 0.6m. This will need to be agreed with the applicant and the owner.

The applicant needs to confirm how the site will be serviced by refuse vehicles. If they are to use the site access swept path diagrams would be required to ensure they can enter and exit in forward gear. Additionally if refuse collection is undertaken on street what will the arrangements be?

14 car parking spaces will be provided. WSCC car parking calculator has been referred to and an allocation of 1 space per 2 bed flat, and 2 spaces for the 3 bed houses is proposed. The parking strategy does not include spaces for visitors and therefore some parking associated with the development may spill out into other surrounding areas. This needs to be considered as if there are no other parking options this could cause access issues on site.

The parking layout is a combination of echelon and tandem spaces. These are in a courtyard layout and provided they are allocated and are within the guidelines of no smaller than 2.4 x 4.8m then WSCC is satisfied with the parking on site. The applicant does need to consider visitor parking as this could cause issues for access into the site

Cycle parking needs to be provided in accordance with NPPF guidance.

As there is only one access in and out of the site during the demolition and construction phases a full demolition and construction management plan must be submitted to the LPA prior to any works. Additionally if there will be a need for the constructors to use the public highway the appropriate temporary licences will be required prior to any works starting.

Alison Meeus  
Planner – County Highways

## ***CONDITIONS***

### **VISIBILITY SPLAYS**

*Visibility (details required)*

No part of the development shall be first occupied until visibility splays of \_\_\_\_ metres by \_\_\_\_ metres have been provided at the proposed site vehicular access onto \_\_\_\_\_ in accordance with plans and details submitted to and approved in writing by the Local Planning Authority. Once provided the splays shall thereafter be maintained and kept free of all obstructions over a height of 0.6 metre above adjoining carriageway level or as otherwise agreed.

Reason: In the interests of road safety.

*Pedestrian Visibility (details required)*

No part of the development shall be first occupied until pedestrian visibility splays of 2 metres by 2 metres have been provided either side of the proposed site vehicular access onto \_\_\_\_\_ in accordance with plans and details submitted to and approved in writing by the Local Planning Authority. These visibility splays shall thereafter be kept free of all obstructions over a height of 0.6 metre above adjoining carriageway level or as otherwise agreed.

Reason: In the interests of road safety.

### **PARKING**

*Car parking space (details approved)*

No part of the development shall be first occupied until the car parking has been constructed in accordance with the approved site plan. These spaces shall thereafter be retained at all times for their designated purpose.

Reason: To provide car-parking space for the use

#### *Cycle parking*

No part of the development shall be first occupied until covered and secure cycle parking spaces have been provided in accordance with plans and details submitted to and approved by the Local Planning Authority.

Reason: To provide alternative travel options to the use of the car in accordance with current sustainable transport policies.

#### *Vehicle parking and turning*

No part of the development shall be first occupied until the vehicle parking and turning spaces have been constructed in accordance with the approved plan. These spaces shall thereafter be retained for their designated use.

Reason: To provide adequate on-site car parking and turning space for the development.

### **CONSTRUCTION**

#### *Construction Management Plan*

No development shall take place, including any works of demolition, until a Construction Management Plan has been submitted to and approved in writing by the Local Planning Authority. Thereafter the approved Plan shall be implemented and adhered to throughout the entire construction period. The Plan shall provide details as appropriate but not necessarily be restricted to the following matters,

- the anticipated number, frequency and types of vehicles used during construction,
- the method of access and routing of vehicles during construction,
- the parking of vehicles by site operatives and visitors,
- the loading and unloading of plant, materials and waste,
- the storage of plant and materials used in construction of the development,
- the erection and maintenance of security hoarding,
- the provision of wheel washing facilities and other works required to mitigate the impact of construction upon the public highway (including the provision of temporary Traffic Regulation Orders),
- details of public engagement both prior to and during construction works.

Reason: In the interests of highway safety and the amenities of the area.

### **INFORMATIVES**

#### *Temporary Works Required During Construction*

The applicant is advised of the requirement to enter into early discussions with and obtain the necessary licenses from the Highway Authority to cover any temporary construction related works that will obstruct or affect the normal operation of the public highway prior to any works commencing. These temporary works may include, the placing of skips or other materials within the highway, the temporary closure of on-street parking bays, the imposition of temporary parking restrictions requiring a Temporary Traffic Regulation Order, the erection of hoarding or scaffolding within the limits of the highway, the provision of cranes over-sailing the highway.

.

## **APPENDIX B**



# **LAND SOUTH OF CHICHESTER ROAD BOGNOR REGIS**

## **PROPOSED RESIDENTIAL DEVELOPMENT ACCESS ARRANGEMENTS**

**Stage 1 Road Safety Audit**

**May 2018**

**GH/RDW/18/1742/RSA1**

| Revision Status      | Prepared by:<br>(Name) | Checked by:<br>(Name) | Approved by: | Date Approved: |
|----------------------|------------------------|-----------------------|--------------|----------------|
| Original             | G Holland              | R Westhead            |              | 29/05/2018     |
| Designer's Response  |                        |                       |              |                |
| Authority's Response |                        |                       |              |                |
| Audit Response       |                        |                       |              |                |

|                                                                           |                                              |
|---------------------------------------------------------------------------|----------------------------------------------|
| <b>Client:</b>                                                            |                                              |
| Russel Giles Partnership Ltd (RGP)                                        | The Safety Forum Ltd                         |
| Unit 2, West Barn<br>Norton Lane<br>Chichester<br>West Sussex<br>PO20 3AF | PO Box 831<br>Godalming<br>Surrey<br>GU7 9HT |
|                                                                           | Date: 29/05/2018                             |

|     |                                               |   |
|-----|-----------------------------------------------|---|
| 1.0 | INTRODUCTION.....                             | 3 |
| 2.0 | ITEMS CONSIDERED .....                        | 5 |
| 3.0 | MATTERS ARISING FROM THIS STAGE 1 AUDIT. .... | 6 |
| 4.0 | AUDITOR STATEMENT .....                       | 7 |

|                   |                            |
|-------------------|----------------------------|
| <b>APPENDIX A</b> | Location Plan              |
| <b>APPENDIX B</b> | Road Safety Audit Response |

---

## 1.0 INTRODUCTION

- 1.1 This report results from a Stage 1 Road Safety Audit (RSA) carried out on the proposed access arrangements for a small residential development on land south of Chichester Road, Bognor Regis, between property Nos. 281 and 283.
- 1.2 The highway proposals include the provision of a 4.8m wide access road junction with Chichester Road, to serve a development of 12 new residential units.
- 1.3 The Stage 1 RSA was carried out at the request of Russell Giles Partnership Ltd (RGP).
- 1.4 The Road Safety Audit Brief was supplied by Ed Dodd of RGP.
- 1.5 The Audit was carried out on between Friday 25<sup>th</sup> and Monday 28<sup>th</sup> May 2018 by consultants working on behalf of The Safety Forum Limited.
- 1.6 The Audit Team, which is established from The Safety Forum Ltd and independent of the project design team, has had no involvement with the project.

The Auditors were:

Team Leader - Gregg Holland, FIHE, HE RSA Cert Comp, FSoRSA, AMRSGB

Team Member – Rob Westhead, HE RSA Cert Comp, MSoRSA

- 1.7 The report has been prepared in accordance with the Design Manual for Roads and Bridges (DMRB) Highways Directive (HD) 19/15.
- 1.8 The Audit consisted of a desktop study and a site visit. The site visit was carried out on Friday 25<sup>th</sup> May 2018, between 10:00 and 10:30 hours by all members of the Audit Team together. The weather was dry and clear; the road surface was dry. Traffic volumes were inter-peak, steady but dispersed and without congestion. There was some pedestrian movement, mostly associated with the nearby commercial frontages.
- 1.9 Issues relating to the health & safety of operatives constructing, operating or maintaining the highway are not covered by Road Safety Audit. Only issues relating to the design and construction of facilities for highway maintenance that may potentially contribute to a Road Safety Matter are considered by the Road Safety Audit process.

- 
- 1.10 Road Safety Audit is not a technical check that the design conforms to Standards and/or best practice guidance. Design Organisations are responsible for ensuring that their designs have been subjected to the appropriate design reviews (including, where applicable, Non-Motorised User (NMU) assessment and review) prior to Road Safety Audit.
- 1.11 Road Safety Audit is not a check that the scheme has been constructed in accordance with the design.
- 1.12 Whilst reference is made to certain design standards, where safety may be compromised by a reduction in standard, this report is not intended to provide a design check. The Auditors have only reported on matters that might have an adverse effect on road safety in the context of the chosen design. No attempt has been made to comment on the justification of the scheme or the appropriateness of the design. Consequently, the Auditors accept no responsibility for the design or construction of the scheme.
- 1.13 The recommendations in this report are aimed at addressing the road safety problems; however there may be other alternative acceptable ways to overcome a specific problem, when other practical issues are considered. The recommendations contained herein do not absolve the Designer of his/her responsibilities.
- 1.14 The Auditors would be pleased to discuss the acceptability of alternative solutions to problems identified during the Audit, and would encourage the Designer to consult them on this matter.
- 1.15 The LHA response to the RSA should be formally recorded and reported to the Designer and the RSA Team so that a record of the Audit process is contained in the *As Built* design pack to be provided and retained by the LHA on final completion.
- 1.16 All problems identified in this Road Safety Audit Report are indicated on a location plan in Appendix A

## 2.0 ITEMS CONSIDERED

- 2.1 The Road Safety Audit was undertaken on the scheme detailed in the following documentation provided by RGP.

| Drawing No.                                          | Rev      | Title                                                            |
|------------------------------------------------------|----------|------------------------------------------------------------------|
| Project: Land South of Chichester Road, Bognor Regis |          |                                                                  |
| 2017/3765/001                                        | May 2018 | Site Overview, Visibility Splays and Parking Swept Path Analysis |
| 2017/3765/001                                        | May 2018 | Refuse Vehicle Swept Path Analysis                               |

| Document Ref/Filename.                                        | Rev | Title |
|---------------------------------------------------------------|-----|-------|
| Project: Project: Land South of Chichester Road, Bognor Regis |     |       |

- 2.2 No departure from standards or other information was submitted to the Audit Team.

### 3.0 MATTERS ARISING FROM THIS STAGE 1 AUDIT.

#### 3.1 PROBLEM

LOCATION: Chichester Road; outside property Nos. 277 and 279

SUMMARY: Visibility to the right partially obstructed by overgrown hedgerow and entranceway parking; potential increase in risk of front-to-side impact type collisions.



The hedgerow between property Nos. 277 and 299 encroaches into the visibility splay to the right for drivers exiting the development site. In addition, ad hoc parking in the entranceways of nearby properties reduces this visibility aspect. As a result there may be an increased risk of front-to-side impact type collisions if drivers emerge from the development site into the path of westbound Chichester Road traffic.

#### RECOMMENDATION

Ensure that visibility splays are kept clear of obstruction by overgrown vegetation and that parking is controlled to give clear access and egress.

---

## **4.0 AUDITOR STATEMENT**

4.1 We certify that this audit has been carried out in accordance with HD 19/15.

### **AUDIT TEAM LEADER**

**Gregg Holland**

The Safety Forum Ltd

PO Box 831

Godalming

Surrey

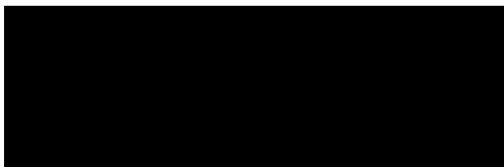
GU7 9HT



**Date: 29 May 2018**

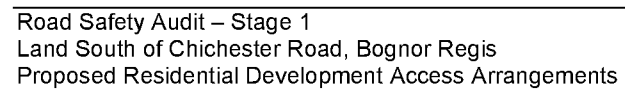
### **AUDIT TEAM MEMBER**

**Rob Westhead**



**Date: 29 May 2018**





## APPENDIX B: Road Safety Audit Response

Auditors: Gregg Holland (Team Leader) and Rob Westhead (Team Member).

Date Response Completed:

Scheme: Land South of Chichester Road, Bognor Regis; Proposed Residential Development Access Arrangements

This response is to a Stage 1 Road Safety Audit to the design standard detailed within HD19/15 of Volume 5, Section 2, Part 2, of the Design Manual for Roads and Bridges, as detailed by Highways England.

| Problem no.<br>in safety<br>audit report | Problem<br>accepted<br>(yes/no) | Recommended<br>measure accepted<br>(yes/no) | Alternative measure (detail description)                                                                                                                                                                                                                                                                                                                     |
|------------------------------------------|---------------------------------|---------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 3.1                                      | Yes                             | Yes                                         | <p>Vegetation within the visibility splays will be trimmed back to outside the visibility envelope.</p> <p>Manual for Streets 2 Section 10.7.1 identifies that parking in visibility splays in built-up areas is common but does not create significant problems in practice. In circumstances where speeds are low some encroachment may be acceptable.</p> |

## **Principal Engineer's / Audit Project Sponsor's Statement:**

Road Safety Audit for Land South of Chichester Road, Bognor Regis; Proposed Residential Development Access Arrangements.

I certify that I have considered the items raised in the Stage 1 Road Safety Audit Report and I am content to accept all of its recommendations except for the ones listed above. I have stated my reasons for not accepting them and I seek the Chief Engineer's endorsement of my proposals.

..... Date.....

Principal Engineer

## **Chief Engineer's / Director's Decision:**

I accept these proposals by the Principal Engineer.

..... Date.....

Chief Engineer

## **APPENDIX C**



| Ward Finder |  |      |  |
|-------------|--|------|--|
| Postcode    |  | Ward |  |

**Note:**

No special provision need be made for visitors where at least half of the total parking provision assigned to a development is unallocated. In other circumstances, it may be appropriate to allow for additional visitor parking of up to 0.2 spaces per dwelling.

In areas of parking constraint, levels of provision below predicted demand may be applicable.

The tool is expressed as number of Rooms (Per Unit). If data is not available in this format and number of Bedrooms is used this will need to be converted. A general guide for conversion is as follows but may vary in some cases.

| Houses          | Flats           |
|-----------------|-----------------|
| 1 bed = 3 rooms | Studio = 1 room |
| 2 bed = 4 rooms | 1 bed = 2 rooms |
| 3 bed = 5 rooms | 2 bed = 3 rooms |
| 4 bed = 6 rooms | 3 bed = 4 rooms |
| 5 bed = 7 rooms | 4 bed = 5 rooms |

Garages will count as 1 space when allocating spaces.

Ward data used can be checked by the user by referring to the District-Ward Data Tables. The Ward highlighted if the Census data does not include data for certain dwelling sizes. In such cases car ownership has been obtained using the nearest sized dwelling with same tenure and ward. For example, if not available for a private house with 1 room then data for a private house with 2 rooms has been used. Ownership Data is highlighted in purple where such an approach has been used. Where Census data is not available for small samples for certain sized dwellings this is highlighted in red if <20, and green if <50 in the Total column. In such cases, other wards should be selected to achieve a higher sample size.

### Report Summary Table

| DEVELOPMENT MIX |           |             |                            |                      |
|-----------------|-----------|-------------|----------------------------|----------------------|
| Ref.            | Unit Type | Unit Tenure | Habitable Rooms (Per Unit) | No. of Units (Total) |
| A               | Flats     | Private     | 3                          | 8                    |
| B               | Houses    | Private     | 5                          | 4                    |
| C               |           |             |                            |                      |
| D               |           |             |                            |                      |
| E               |           |             |                            |                      |
| F               |           |             |                            |                      |
| G               |           |             |                            |                      |
| H               |           |             |                            |                      |
| I               |           |             |                            |                      |
| J               |           |             |                            |                      |
| K               |           |             |                            |                      |
| L               |           |             |                            |                      |
| M               |           |             |                            |                      |
| N               |           |             |                            |                      |
| O               |           |             |                            |                      |
| P               |           |             |                            |                      |
| Q               |           |             |                            |                      |
| R               |           |             |                            |                      |
| S               |           |             |                            |                      |
| Total           |           |             |                            | 12                   |

[illegible]

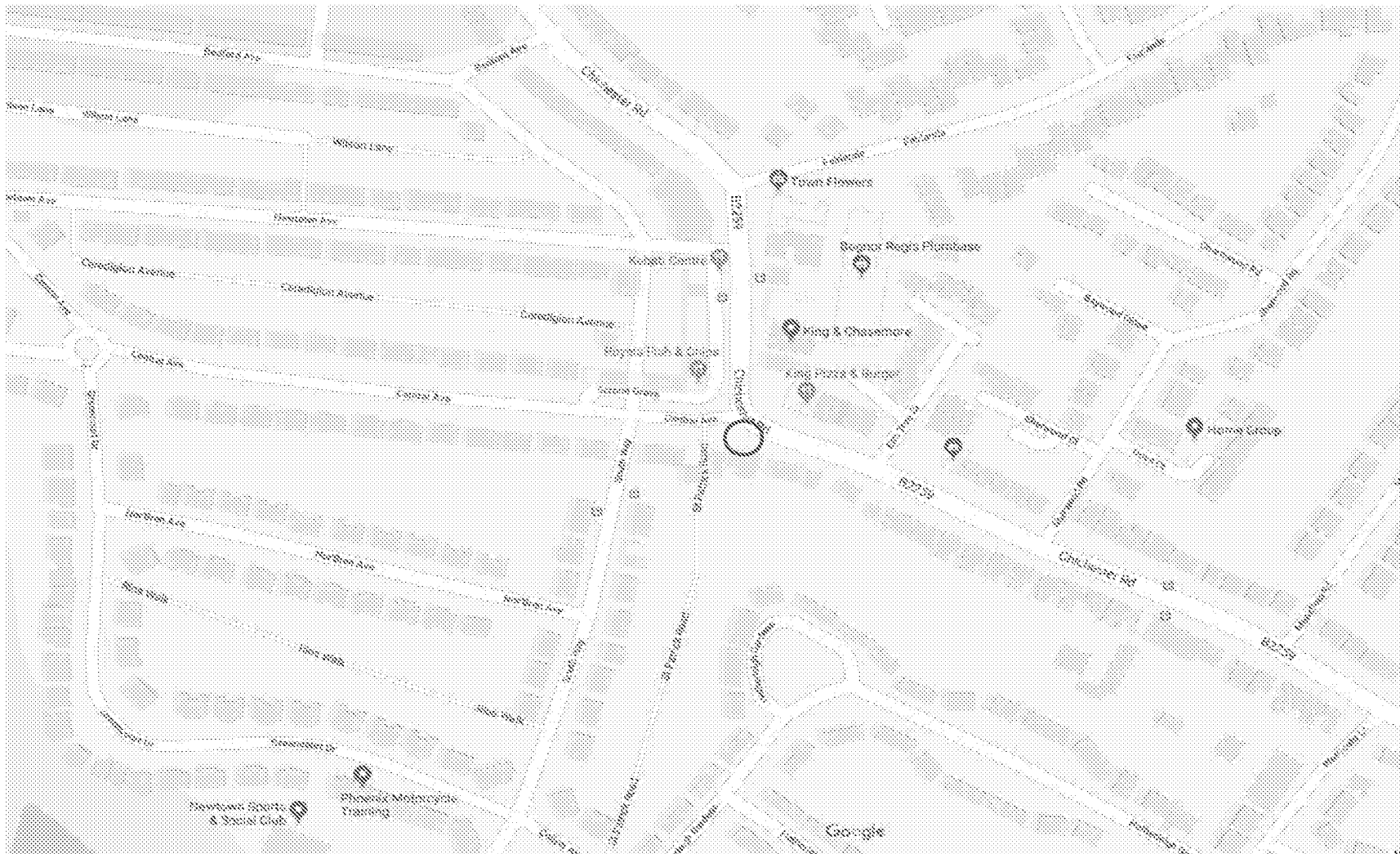
| <b>PARKING DEMAND</b> |                                  |              |                                 |              |                     |
|-----------------------|----------------------------------|--------------|---------------------------------|--------------|---------------------|
| <b>Allocated No.</b>  | <b>Unallocated for Residents</b> |              | <b>Unallocated for Visitors</b> |              | <b>Total Demand</b> |
|                       | <b>per unit</b>                  | <b>Total</b> | <b>per unit</b>                 | <b>Total</b> |                     |
| 8                     | 0                                | 1            | 0                               | 2            | 11                  |
| 8                     | 0                                | 0            | 0                               | 1            | 9                   |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
|                       |                                  |              |                                 |              |                     |
| 16                    |                                  | 1.66         |                                 | 2.40         | 20                  |

PROJECT  
CENTRE  
PEOPLE | PASSION | PLACES

## **APPENDIX D**

03/05/2018 and 04/05/2018

modaldata.com



| STREET          | AVAILABLE PARKING |       |              |       | PARKING RESTRICTIONS |       |        |       |          |       |        |       | TOTAL LEGAL PARKING STRESS |       |        |       |                            | WAITING RESTRICTION |            |                             |                    |              | OTHER         |       |            |       |             |       | TOTAL PARKING STRESS |                      |      |
|-----------------|-------------------|-------|--------------|-------|----------------------|-------|--------|-------|----------|-------|--------|-------|----------------------------|-------|--------|-------|----------------------------|---------------------|------------|-----------------------------|--------------------|--------------|---------------|-------|------------|-------|-------------|-------|----------------------|----------------------|------|
|                 | MARKED DAYS       |       | UNRESTRICTED |       | PERMIT HOLDERS       |       |        |       | DISABLED |       |        |       | MOTORBIKE BAY              |       |        |       | TOTAL LEGAL PARKING STRESS | WAITING RESTRICTION |            |                             |                    |              | SINGLE YELLOW |       | SINGLE RED |       | GRASS VERGE |       | TOTAL PARKING STRESS | TOTAL PARKING STRESS |      |
|                 | PARKED            | SPACE | PARKED       | SPACE | PARKED               | SPACE | PARKED | SPACE | PARKED   | SPACE | PARKED | SPACE | PARKED                     | SPACE | PARKED | SPACE |                            | DOUBLE YELLOW       | DOUBLE RED | TURNING AREA AT END OF ROAD | IN FRONT OF GARAGE | DROPPED KERB | PARKED        | SPACE | PARKED     | SPACE | PARKED      | SPACE |                      |                      |      |
| Chichester Road | 1                 | 5     | 20           | 24    |                      |       |        |       | 1        | 1     |        |       |                            |       |        |       | 23                         | 28                  |            |                             |                    |              |               |       |            |       |             |       | 23                   | 28                   | 82%  |
| Elm Tree Close  |                   |       | 6            | 5     |                      |       |        |       |          |       |        |       |                            |       |        |       | 6                          | 5                   |            |                             |                    |              |               |       |            |       |             |       | 6                    | 5                    | 120% |
| Sherwood Road   |                   |       | 7            | 8     |                      |       |        |       |          |       |        |       |                            |       |        |       | 7                          | 8                   | 2          |                             |                    |              |               |       |            |       |             |       | 9                    | 8                    | 113% |
| South Way       |                   |       | 6            | 20    |                      |       |        |       |          |       |        |       |                            |       |        |       | 6                          | 20                  |            |                             |                    |              |               |       |            |       |             |       | 6                    | 20                   | 30%  |
| Nor Bren Ave    |                   |       |              | 6     |                      |       |        |       |          |       |        |       |                            |       |        |       | 0                          | 6                   |            |                             |                    |              |               |       |            |       |             |       | 0                    | 6                    | 0%   |
| Newtown Ave     |                   |       | 4            | 6     |                      |       |        |       |          |       |        |       |                            |       |        |       | 4                          | 6                   |            |                             |                    |              |               |       |            |       |             |       | 4                    | 6                    | 67%  |
| Fairlands       |                   |       |              |       |                      |       |        |       |          |       |        |       |                            |       |        |       | 0                          | 0                   |            |                             |                    |              |               |       |            |       |             |       | 0                    | 0                    | N/A  |
| Scroon Grove    | 1                 | 11    | 6            | 11    |                      |       |        |       |          |       |        |       |                            |       |        |       | 9                          | 22                  |            |                             |                    | 1            |               |       |            |       |             |       | 10                   | 22                   | 45%  |
| Central Ave     |                   |       | 15           | 45    |                      |       |        |       |          |       |        |       |                            |       |        |       | 15                         | 45                  |            |                             |                    | 1            | 1             |       |            | 3     |             |       | 20                   | 45                   | 84%  |
| TOTALS          | 5                 | 16    | 56           | 123   | 0                    | 0     | 0      | 0     | 1        | 1     | 0      | 0     | 0                          | 0     | 0      | 0     | 70                         | 140                 | 2          | 0                           | 0                  | 0            | 2             | 1     | 0          | 0     | 3           | 0     | 78                   | 140                  | 56%  |

# 283 Chichester Road - Bognor

Friday 04/05/2018 1AM

MODAL

modaldata.com

| STREET          | AVAILABLE PARKING |       |              |       | PARKING RESTRICTIONS |       |        |       |          |       |               |       | TOTAL LEGAL PARKING STRESS |       |                            | WAITING RESTRICTION |       |            |       |                             | OTHER              |        |              |               |       |            | TOTAL PARKING STRESS |                      |      |             |     |
|-----------------|-------------------|-------|--------------|-------|----------------------|-------|--------|-------|----------|-------|---------------|-------|----------------------------|-------|----------------------------|---------------------|-------|------------|-------|-----------------------------|--------------------|--------|--------------|---------------|-------|------------|----------------------|----------------------|------|-------------|-----|
|                 | MARKED DAYS       |       | UNRESTRICTED |       | PERMIT HOLDERS       |       |        |       | DISABLED |       | MOTORBIKE BAY |       |                            |       |                            | DOUBLE YELLOW       |       | DOUBLE RED |       | TURNING AREA AT END OF ROAD | IN FRONT OF GARAGE |        | DROPPED KERB | SINGLE YELLOW |       | SINGLE RED |                      |                      |      | GRASS VERGE |     |
|                 | PARKED            | SPACE | PARKED       | SPACE | PARKED               | SPACE | PARKED | SPACE | PARKED   | SPACE | PARKED        | SPACE | PARKED                     | SPACE | TOTAL LEGAL PARKING STRESS | PARKED              | SPACE | PARKED     | SPACE | PARKED                      | SPACE              | PARKED | SPACE        | PARKED        | SPACE | PARKED     | SPACE                | TOTAL PARKING STRESS |      |             |     |
| Chichester Road |                   | 5     | 20           | 22    |                      |       |        |       | 1        | 1     |               |       |                            |       | 21                         | 28                  | 73%   |            |       |                             |                    |        |              |               |       |            | 21                   | 28                   | 75%  |             |     |
| Elm Tree Close  |                   |       | 6            | 5     |                      |       |        |       |          |       |               |       |                            |       | 6                          | 5                   | 120%  |            |       |                             |                    |        |              |               |       |            | 6                    | 5                    | 120% |             |     |
| Sherwood Road   |                   |       | 8            | 8     |                      |       |        |       |          |       |               |       |                            |       | 8                          | 8                   | 100%  |            |       |                             |                    |        |              |               |       |            | 8                    | 8                    | 100% |             |     |
| South Way       |                   |       | 7            | 20    |                      |       |        |       |          |       |               |       |                            |       | 7                          | 20                  | 35%   |            |       |                             |                    |        |              |               |       |            | 7                    | 20                   | 35%  |             |     |
| Nor Bren Ave    |                   |       | 0            | 6     |                      |       |        |       |          |       |               |       |                            |       | 0                          | 6                   | 0%    |            |       |                             |                    |        |              |               |       |            | 0                    | 6                    | 0%   |             |     |
| Newtown Ave     |                   |       | 4            | 6     |                      |       |        |       |          |       |               |       |                            |       | 4                          | 6                   | 67%   |            |       |                             |                    |        |              |               |       |            | 4                    | 6                    | 67%  |             |     |
| Fairlands       |                   |       | 0            | 0     |                      |       |        |       |          |       |               |       |                            |       | 0                          | 0                   | N/A   |            |       |                             |                    |        |              |               |       |            | 0                    | 0                    | N/A  |             |     |
| Scroon Grove    | 0                 | 11    | 6            | 11    |                      |       |        |       |          |       |               |       |                            |       | 8                          | 22                  | 36%   |            |       |                             |                    |        |              |               |       | 1          | 9                    | 22                   | 41%  |             |     |
| Central Ave     |                   |       | 18           | 45    |                      |       |        |       |          |       |               |       |                            |       | 18                         | 45                  | 40%   |            |       |                             |                    |        |              |               | 2     | 1          | 23                   | 45                   | 51%  |             |     |
| TOTALS          | 0                 | 16    | 71           | 123   | 0                    | 0     | 0      | 0     | 1        | 1     | 0             | 0     | 72                         | 140   | 51%                        | 0                   | 0     | 0          | 0     | 0                           | 0                  | 3      | 2            | 0             | 0     | 0          | 1                    | 0                    | 78   | 140         | 56% |