

# LAND AT GREVATT'S LANE, CLIMPING

## SUMMARY OF SITE ACCESS MODELLING ASSESSMENT

| IDENTIFICATION TABLE |                                             |
|----------------------|---------------------------------------------|
| Client/Project owner | Southern Co-Operative Ltd                   |
| Project              | Land at Grevatt's Lane, Climping            |
| Title of Document    | Summary of Site Access Modelling Assessment |
| Date                 | 01/05/2019                                  |
| Reference number     | BWREDE17-03                                 |
| Number of pages      | 3                                           |

## TABLE OF CONTENTS

|    |                                               |   |
|----|-----------------------------------------------|---|
| 1. | INTRODUCTION                                  | 2 |
| 2. | JUNCTION CAPACITY ASSESSMENT                  | 2 |
| 3. | JUNCTION CAPACITY ASSESSMENT SENSITIVITY TEST | 2 |
| 4. | SUMMARY AND CONCLUSION                        | 3 |

---

## APPENDICES

**Appendix A:** Proposed Site Layout

**Appendix B:** Site Access Capacity Testing Results (Anticipated Trip Generation And Distribution)

**Appendix C:** Site Access Capacity Testing Results (Doubled Trip Generation)

## 1. INTRODUCTION

- 1.1.1 This Note has been prepared in relation to a live planning application for the development of a crematorium on land to the south of Grevatt's Lane, Climping, summarising the capacity assessment at the proposed site access.
- 1.1.2 The proposed site access comprises a ghost-island right turn lane to the proposed site, taken from the A259 Grevatt's Lane. The proposed site layout, demonstrating the proposed site access, is demonstrated in **Appendix A**.
- 1.1.3 The junction assessment has been completed using the latest industry-standard software Junctions 9 for a priority T-junction with right-turn lane. All geometries have been taken from the topographical survey and proposed right-turn lane design, which has been designed in accordance with DMRB requirements.
- 1.1.4 Flows along the A259 Grevatt's Lane have been taken from an Automatic Traffic Count (ATC) survey taken on Grevatt's Lane adjacent to the proposed site access from 29/11/2018 to 05/12/2018. Full details of the ATC results are contained in the Transport Statement for the site which was previously submitted by SYSTRA.
- 1.1.5 Flows to/ from the site were calculated using The Federation of Burial and Crematorium Authorities statistics and likely service patterns as a result of the proposed site design, opening times and capacity. Again, full details are contained in the previously submitted Transport Statement.
- 1.1.6 The distribution of trips to/ from the site was estimated using information provided by the client. The catchment area includes Bognor Regis and Littlehampton (as well as other smaller settlements within Arun District), and the site is situated approximately half-way between the two. It is reasonable to assume therefore, that an approximate 50%/50% split of traffic east/ west from the site is to be expected.

## 2. JUNCTION CAPACITY ASSESSMENT

- 2.1.1 A summary of the modelling results for the capacity assessment are provided in Table 2.1. The full results are provided in **Appendix B**.

Table 2.1 – Summary of Capacity Assessment (Anticipated Trip Generation and Distribution)

| Arm | Arm Name             | AM Peak |       |           | PM Peak |       |           |
|-----|----------------------|---------|-------|-----------|---------|-------|-----------|
|     |                      | RFC     | Queue | Delay (s) | RFC     | Queue | Delay (s) |
| A   | Grevatt's Lane (E)   | -       | -     | -         | -       | -     | -         |
| B   | Proposed Site Access | 0.13    | 0     | 11.64     | 0.17    | 0     | 15.88     |
| C   | Grevatt's Lane (W)   | 0.04    | 0     | 6.39      | 0.05    | 0     | 7.78      |

- 2.1.2 Table 2.1 demonstrates that the proposed site access would operate well within its' theoretical capacity, with no queue on either the site access arm or the A259 Grevatt's Lane. A maximum RFC of 0.17 and associated delay of 15.88 seconds is experienced on the proposed site access arm in the PM Peak.

## 3. JUNCTION CAPACITY ASSESSMENT SENSITIVITY TEST

- 3.1.1 To ensure that the capacity testing of the proposed site access is robust, an additional test has been made whereby 100% of traffic enters the site from both the east and west, in the same scenario. This would account for double the trip generation expectation, and can therefore be seen as a truly robust assessment.
- 3.1.2 A summary of the modelling results for the capacity assessment are provided in Table 3.1. The full results are provided in **Appendix C**.

Table 3.1 – Summary of Capacity Assessment (Doubled Trip Generation)

| Arm | Arm Name             | AM Peak |       |           | PM Peak |       |           |
|-----|----------------------|---------|-------|-----------|---------|-------|-----------|
|     |                      | RFC     | Queue | Delay (s) | RFC     | Queue | Delay (s) |
| A   | Grevatt's Lane (E)   | -       | -     | -         | -       | -     | -         |
| B   | Proposed Site Access | 0.27    | 0     | 14.30     | 0.35    | 1     | 21.35     |
| C   | Grevatt's Lane (W)   | 0.08    | 0     | 6.75      | 0.10    | 0     | 8.31      |

3.1.3 Table 3.1 demonstrates that even with double the trip generation anticipated by the proposed development, the proposed site access would still operate well within its' theoretical capacity. A maximum RFC of 0.35 and associated delay of 21.35 seconds is experienced on the proposed site access arm in the PM Peak, with a queue length of 1 vehicle.

## 4. SUMMARY AND CONCLUSION

4.1.1 To summarise, it is demonstrated that the proposed site access junction operates well within its' theoretical capacity, using both the anticipated trip generation and distribution estimates from the site and a robust testing scenario whereby the trip generation is doubled.

4.1.2 It is therefore considered that the proposed site access has sufficient capacity to serve the proposed development.

### APPROVAL

| Version | Name        |                | Position          | Date       | Modifications |
|---------|-------------|----------------|-------------------|------------|---------------|
| 1       | Author      | Beth Wilson    | Senior Consultant | 01/05/2019 |               |
|         | Checked by  | David Fletcher | Associate         | 01/05/2019 |               |
|         | Approved by | David Fletcher | Associate         | 01/05/2019 |               |

## APPENDIX A – PROPOSED SITE LAYOUT

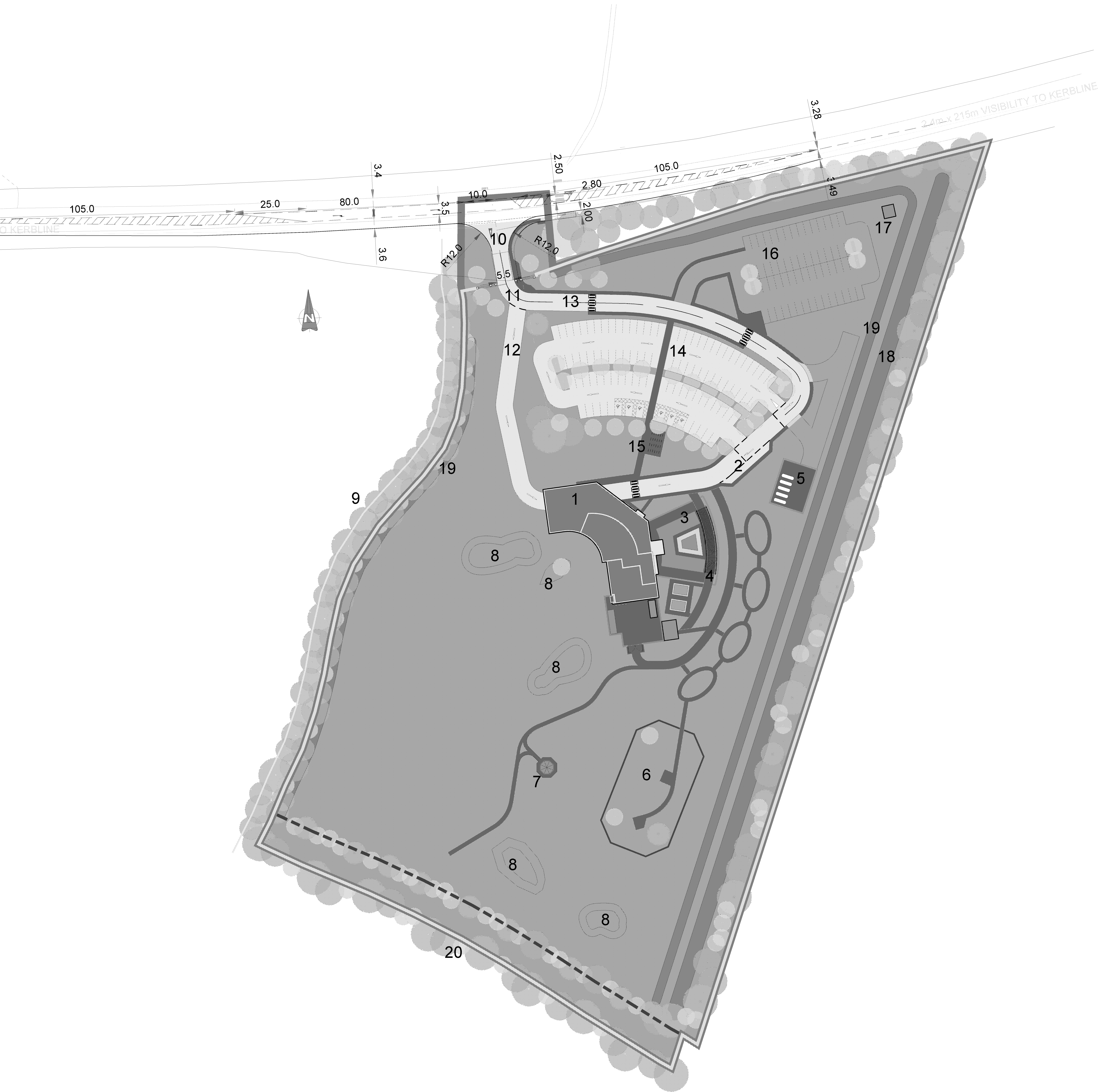
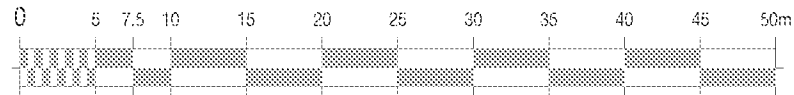
Notes:

THIS DRAWING IS THE COPYRIGHT OF THE SOUTHERN CO-OPERATIVE LIMITED AND MAY NOT BE COPIED, ALTERED OR REPRODUCED IN ANY FORM, OR PASSED TO A THIRD PARTY WITHOUT THE WRITTEN CONSENT OF THE SOUTHERN CO-OPERATIVE LIMITED.

DIMENSIONS SHOULD BE CHECKED AND VERIFIED ON SITE AND ANY DISCREPANCIES SHOULD BE REPORTED TO THE DESIGNER.

DO NOT SCALE FROM THIS DRAWING. EXCEPT FOR PLANNING PURPOSES, USE FIGURED DIMENSIONS ONLY.

IF IN DOUBT ASK FOR CONFIRMATION!



LEGEND

- GRASS
- ROOFS
- GREEN ROOF SYSTEM
- GRASS PAVING SYSTEM
- GRAVEL
- PATHWAYS & HARDSTANDING
- TARMAC
- WATER FEATURE
- TREES, BUSHES & LANDSCAPING

- SITE BOUNDARY
- 1200mm TIMBER PICKET FENCE
- 1800mm CLOSEBOARD FENCE
- 2800mm CLOSEBOARD FENCE
- 2000mm DEER FENCE
- 2000mm POST & WIRE FENCE
- EDGE OF PUBLIC FOOTPATH

- 1 PORTE COCHERE & MAIN BUILDING
- 2 CORTEGE WAITING AREA
- 3 MEMORIAL GARDEN & WATER FEATURE
- 4 MEMORIAL GARDEN PERGOLA
- 5 SERVICE YARD FOR LPG TANKS & REFUSE COLLECTION
- 6 SCATTERING AREA INCLUDING SEATING
- 7 MEMORIAL GAZEBO
- 8 MOUNDS & LANDSCAPING AREA
- 9 EDGE OF EXISTING FOOTPATH & VEGETATION STRIP
- 10 NEW ROAD JUNCTION WITH CLEAR VISIBILITY SPLAYS
- 11 ENTRANCE TO SITE
- 12 CORTEGE ROUTE
- 13 PARKING ROUTE
- 14 MAIN CAR PARK - 94 SPACES & 6 BLUE BADGE HOLDER SPACES
- 15 24 BICYCLE SPACES
- 16 OVERFLOW CAR PARK - 60 SPACES
- 17 ELECTRICAL SUBSTATION
- 18 NEW DITCH
- 19 NEW SWALE
- 20 RYEBANK RIFE

|                  |                                                                                              |    |          |
|------------------|----------------------------------------------------------------------------------------------|----|----------|
| F                | ENTRANCE GATE POSITION AND NORTH BOUNDARY ADJUSTED IN ACCORDANCE WITH HIGHWAYS LANE BOUNDARY | ML | 01/05/19 |
| E                | OVERFLOW CARPARK SURFACE FINISH AMENDED                                                      | ML | 29/04/19 |
| D                | OVERFLOW CARPARK AND SITE AMENDED AS PER HIGHWAYS AUDIT COMMENTS                             | ML | 26/04/19 |
| C                | CHANGING PLACES ROOM ADDED TO PROPOSAL AS PER GUIDANCE PROVIDED BY LA                        | ML | 08/04/19 |
| B                | CHIMNEY POSITION & MAIN SERVICE YARD ADJUSTED                                                | ML | 14/03/19 |
| A                | DEER FENCE LINE AMENDED & POST & WIRE FENCE ADDED                                            | ML | 26/02/19 |
| 1ST              | FIRST ISSUE                                                                                  | ML | 17/01/19 |
| REV              | DESCRIPTION                                                                                  | BY | DATE     |
| STATUS: PLANNING |                                                                                              |    |          |



CLIENT: SOUTHERN COOPERATIVE  
END OF LIFE SERVICES

DESIGNER: SOUTHERN COOPERATIVE  
1000 LAKESIDE, WESTERN ROAD,  
PORTSMOUTH, HAMPSHIRE  
PO6 5PE

SITE: GREVATTS LANE  
WEST SUSSEX, BN17 5RX

TITLE: CLIMPING CREMATORIUM

|              |                          |           |          |
|--------------|--------------------------|-----------|----------|
| SCALE AT A3: | DATE:                    | DRAWN:    | CHECKED: |
| 1:500        | 04-12-2018               | ML        |          |
| DRAWING NO:  | SC-CLMPG-V1-XX-DR-K-0500 | REVISION: | F        |

APPENDIX B – SITE ACCESS CAPACITY TESTING RESULTS (ANTICIPATED TRIP  
GENERATION AND DISTRIBUTION)

|                                                                                                                                                                |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Junctions 9</b>                                                                                                                                             |
| <b>PICADY 9 - Priority Intersection Module</b>                                                                                                                 |
| Version: 9.5.0.6896<br>© Copyright TRL Limited, 2018                                                                                                           |
| For sales and distribution information, program advice and maintenance, contact TRL:                                                                           |
| The users of this computer program for the contents of an engineering programme in no way transfer or limit responsibility for the correctness of the solution |

**Filename:** Site Access Modelling (50.50).j9

**Path:** Z:\2019\BWREDE Reading Development Under 10k\BWREDE17 Land at Grevatts Lane, Climping\30 Technical\31 Modelling

**Report generation date:** 01/05/2019 13:52:44

»2019 (50/50 Split) - 2019, AM

»2019 (50/50 Split) - 2019, PM

### Summary of junction performance

|                           | AM          |           |      |     |                           | PM          |           |      |     |                           |
|---------------------------|-------------|-----------|------|-----|---------------------------|-------------|-----------|------|-----|---------------------------|
|                           | Queue (Veh) | Delay (s) | RFC  | LOS | Network Residual Capacity | Queue (Veh) | Delay (s) | RFC  | LOS | Network Residual Capacity |
| 2019 (50/50 Split) - 2019 |             |           |      |     |                           |             |           |      |     |                           |
| Stream B-AC               | 0.1         | 11.64     | 0.13 | B   | 43 %                      | 0.2         | 15.88     | 0.17 | C   | 21 %                      |
| Stream C-AB               | 0.0         | 6.39      | 0.04 | A   | [Stream B-AC]             | 0.0         | 7.78      | 0.05 | A   | [Stream B-AC]             |

Values shown are the highest values encountered over all time segments. Delay is the maximum value of average delay per arriving vehicle. Network Residual Capacity indicates the amount by which network flow could be increased before a user-definable threshold (see Analysis Options) is met.

### File summary

#### File Description

|                    |                          |
|--------------------|--------------------------|
| <b>Title</b>       |                          |
| <b>Location</b>    | Grevatt's Lane, Climping |
| <b>Site number</b> |                          |
| <b>Date</b>        | 01/05/2019               |
| <b>Version</b>     |                          |
| <b>Status</b>      | (new file)               |
| <b>Identifier</b>  |                          |
| <b>Client</b>      |                          |
| <b>Jobnumber</b>   |                          |
| <b>Enumerator</b>  | ADSYSTRA\ohennessy       |
| <b>Description</b> |                          |

### Units

| Distance units | Speed units | Traffic units input | Traffic units results | Flow units | Average delay units | Total delay units | Rate of delay units |
|----------------|-------------|---------------------|-----------------------|------------|---------------------|-------------------|---------------------|
| m              | kph         | Veh                 | Veh                   | perHour    | s                   | -Min              | perMin              |

### Analysis Options

| Calculate Queue Percentiles | Calculate residual capacity | Residual capacity criteria type | RFC Threshold | Average Delay threshold (s) | Queue threshold (PCU) |
|-----------------------------|-----------------------------|---------------------------------|---------------|-----------------------------|-----------------------|
|                             | ✓                           | Delay                           | 0.85          | 36.00                       | 20.00                 |

### Demand Set Summary

| ID | Scenario name | Time Period name | Traffic profile type | Start time (HH:mm) | Finish time (HH:mm) | Time segment length (min) |
|----|---------------|------------------|----------------------|--------------------|---------------------|---------------------------|
| D1 | 2019          | AM               | ONE HOUR             | 07:45              | 09:15               | 15                        |
| D2 | 2019          | PM               | ONE HOUR             | 16:45              | 18:15               | 15                        |

### Analysis Set Details

| ID | Name               | Network flow scaling factor (%) |
|----|--------------------|---------------------------------|
| A1 | 2019 (50/50 Split) | 100.000                         |

# 2019 (50/50 Split) - 2019, AM

## Data Errors and Warnings

No errors or warnings

## Junction Network

### Junctions

| Junction | Name                 | Junction type | Major road direction | Use circulating lanes | Junction Delay (s) | Junction LOS |
|----------|----------------------|---------------|----------------------|-----------------------|--------------------|--------------|
| 1        | Proposed Site Access | T-Junction    | Two-way              |                       | 0.39               | A            |

### Junction Network Options

| Driving side | Lighting       | Network residual capacity (%) | First arm reaching threshold |
|--------------|----------------|-------------------------------|------------------------------|
| Left         | Normal/unknown | 43                            | Stream B-AC                  |

## Arms

### Arms

| Arm | Name                 | Description | Arm type |
|-----|----------------------|-------------|----------|
| A   | Grevatt's Lane (E)   |             | Major    |
| B   | Proposed Site Access |             | Minor    |
| C   | Grevatt's Lane (W)   |             | Major    |

### Major Arm Geometry

| Arm | Width of carriageway (m) | Has kerbed central reserve | Has right turn bay | Width for right turn (m) | Visibility for right turn (m) | Blocks? | Blocking queue (PCU) |
|-----|--------------------------|----------------------------|--------------------|--------------------------|-------------------------------|---------|----------------------|
| C   | 7.60                     |                            | ✓                  | 3.50                     | 250.0                         | ✓       | 12.00                |

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

### Minor Arm Geometry

| Arm | Minor arm type | Lane width (m) | Visibility to left (m) | Visibility to right (m) |
|-----|----------------|----------------|------------------------|-------------------------|
| B   | One lane       | 2.75           | 215                    | 215                     |

### Slope / Intercept / Capacity

#### Priority Intersection Slopes and Intercepts

| Junction | Stream | Intercept (Veh/hr) | Slope for A-B | Slope for A-C | Slope for C-A | Slope for C-B |
|----------|--------|--------------------|---------------|---------------|---------------|---------------|
| 1        | B-A    | 647                | 0.110         | 0.277         | 0.174         | 0.396         |
| 1        | B-C    | 740                | 0.106         | 0.267         | -             | -             |
| 1        | C-B    | 820                | 0.296         | 0.296         | -             | -             |

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

## Traffic Demand

### Demand Set Details

| ID | Scenario name | Time Period name | Traffic profile type | Start time (HH:mm) | Finish time (HH:mm) | Time segment length (min) |
|----|---------------|------------------|----------------------|--------------------|---------------------|---------------------------|
| D1 | 2019          | AM               | ONE HOUR             | 07:45              | 09:15               | 15                        |

| Vehicle mix source | PCU Factor for a HV (PCU) |
|--------------------|---------------------------|
| HV Percentages     | 2.00                      |

### Demand overview (Traffic)

| Arm | Linked arm | Use O-D data | Average Demand (Veh/hr) | Scaling Factor (%) |
|-----|------------|--------------|-------------------------|--------------------|
| A   |            | ✓            | 704                     | 100.000            |
| B   |            | ✓            | 42                      | 100.000            |
| C   |            | ✓            | 811                     | 100.000            |

## Origin-Destination Data

Demand (Veh/hr)

|  | To |     |    |     |
|--|----|-----|----|-----|
|  |    | A   | B  | C   |
|  | A  | 0   | 21 | 683 |
|  | B  | 21  | 0  | 21  |
|  | C  | 790 | 21 | 0   |

## Vehicle Mix

Heavy Vehicle Percentages

|  | To |   |   |   |
|--|----|---|---|---|
|  |    | A | B | C |
|  | A  | 0 | 0 | 2 |
|  | B  | 0 | 0 | 0 |
|  | C  | 3 | 0 | 0 |

## Results

### Results Summary for whole modelled period

| Stream | Max RFC | Max Delay (s) | Max Queue (Veh) | Max LOS |
|--------|---------|---------------|-----------------|---------|
| B-AC   | 0.13    | 11.64         | 0.1             | B       |
| C-AB   | 0.04    | 6.39          | 0.0             | A       |
| C-A    |         |               |                 |         |
| AB     |         |               |                 |         |
| AC     |         |               |                 |         |

### Main Results for each time segment

07:45 - 08:00

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 32                    | 470               | 0.067 | 31                  | 0.1             | 8.200     | A                             |
| C-AB   | 16                    | 661               | 0.024 | 16                  | 0.0             | 5.582     | A                             |
| C-A    | 595                   |                   |       | 595                 |                 |           |                               |
| AB     | 16                    |                   |       | 16                  |                 |           |                               |
| AC     | 514                   |                   |       | 514                 |                 |           |                               |

08:00 - 08:15

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 38                    | 423               | 0.089 | 38                  | 0.1             | 9.330     | A                             |
| C-AB   | 19                    | 630               | 0.030 | 19                  | 0.0             | 5.894     | A                             |
| C-A    | 710                   |                   |       | 710                 |                 |           |                               |
| A-B    | 19                    |                   |       | 19                  |                 |           |                               |
| A-C    | 614                   |                   |       | 614                 |                 |           |                               |

08:15 - 08:30

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 46                    | 355               | 0.130 | 46                  | 0.1             | 11.631    | B                             |
| C-AB   | 23                    | 587               | 0.039 | 23                  | 0.0             | 6.387     | A                             |
| C-A    | 870                   |                   |       | 870                 |                 |           |                               |
| A-B    | 23                    |                   |       | 23                  |                 |           |                               |
| A-C    | 752                   |                   |       | 752                 |                 |           |                               |

08:30 - 08:45

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 46                    | 355               | 0.130 | 46                  | 0.1             | 11.645    | B                             |
| C-AB   | 23                    | 587               | 0.039 | 23                  | 0.0             | 6.387     | A                             |
| C-A    | 870                   |                   |       | 870                 |                 |           |                               |
| A-B    | 23                    |                   |       | 23                  |                 |           |                               |
| A-C    | 752                   |                   |       | 752                 |                 |           |                               |

08:45 - 09:00

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 38                    | 423               | 0.089 | 38                  | 0.1             | 9.346     | A                             |
| C-AB   | 19                    | 630               | 0.030 | 19                  | 0.0             | 5.895     | A                             |
| C-A    | 710                   |                   |       | 710                 |                 |           |                               |
| A-B    | 19                    |                   |       | 19                  |                 |           |                               |
| A-C    | 614                   |                   |       | 614                 |                 |           |                               |

09:00 - 09:15

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 32                    | 470               | 0.067 | 32                  | 0.1             | 8.216     | A                             |
| C-AB   | 16                    | 661               | 0.024 | 16                  | 0.0             | 5.585     | A                             |
| C-A    | 595                   |                   |       | 595                 |                 |           |                               |
| A-B    | 16                    |                   |       | 16                  |                 |           |                               |
| A-C    | 514                   |                   |       | 514                 |                 |           |                               |

# 2019 (50/50 Split) - 2019, PM

## Data Errors and Warnings

No errors or warnings

## Junction Network

### Junctions

| Junction | Name                 | Junction type | Major road direction | Use circulating lanes | Junction Delay (s) | Junction LOS |
|----------|----------------------|---------------|----------------------|-----------------------|--------------------|--------------|
| 1        | Proposed Site Access | T-Junction    | Two-way              |                       | 0.47               | A            |

### Junction Network Options

| Driving side | Lighting       | Network residual capacity (%) | First arm reaching threshold |
|--------------|----------------|-------------------------------|------------------------------|
| Left         | Normal/unknown | 21                            | Stream B-AC                  |

## Traffic Demand

### Demand Set Details

| ID | Scenario name | Time Period name | Traffic profile type | Start time (HH:mm) | Finish time (HH:mm) | Time segment length (min) |
|----|---------------|------------------|----------------------|--------------------|---------------------|---------------------------|
| D2 | 2019          | PM               | ONE HOUR             | 16:45              | 18:15               | 15                        |

| Vehicle mix source | PCU Factor for a HV (PCU) |
|--------------------|---------------------------|
| HV Percentages     | 2.00                      |

### Demand overview (Traffic)

| Arm | Linked arm | Use O-D data | Average Demand (Veh/hr) | Scaling Factor (%) |
|-----|------------|--------------|-------------------------|--------------------|
| A   |            | ✓            | 1017                    | 100.000            |
| B   |            | ✓            | 42                      | 100.000            |
| C   |            | ✓            | 697                     | 100.000            |

## Origin-Destination Data

Demand (Veh/hr)

|      | To |     |    |     |
|------|----|-----|----|-----|
|      | A  | B   | C  |     |
| From | A  | 0   | 21 | 996 |
|      | B  | 21  | 0  | 21  |
|      | C  | 676 | 21 | 0   |

## Vehicle Mix

Heavy Vehicle Percentages

|      | To |   |   |   |
|------|----|---|---|---|
|      | A  | B | C |   |
| From | A  | 0 | 0 | 1 |
|      | B  | 0 | 0 | 0 |
|      | C  | 1 | 0 | 0 |

## Results

### Results Summary for whole modelled period

| Stream | Max RFC | Max Delay (s) | Max Queue (Veh) | Max LOS |
|--------|---------|---------------|-----------------|---------|
| B-AC   | 0.17    | 15.88         | 0.2             | C       |
| C-AB   | 0.05    | 7.78          | 0.0             | A       |
| C-A    |         |               |                 |         |
| A-B    |         |               |                 |         |
| A-C    |         |               |                 |         |

### Main Results for each time segment

16:45 - 17:00

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 32                    | 416               | 0.076 | 31                  | 0.1             | 9.350     | A                             |
| C-AB   | 16                    | 592               | 0.027 | 16                  | 0.0             | 6.249     | A                             |
| C-A    | 509                   |                   |       | 509                 |                 |           |                               |
| A-B    | 16                    |                   |       | 16                  |                 |           |                               |
| A-C    | 750                   |                   |       | 750                 |                 |           |                               |

17:00 - 17:15

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 38                    | 358               | 0.105 | 38                  | 0.1             | 11.227    | B                             |
| C-AB   | 19                    | 547               | 0.034 | 19                  | 0.0             | 6.810     | A                             |
| C-A    | 608                   |                   |       | 608                 |                 |           |                               |
| A-B    | 19                    |                   |       | 19                  |                 |           |                               |
| A-C    | 895                   |                   |       | 895                 |                 |           |                               |

17:15 - 17:30

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 46                    | 273               | 0.169 | 46                  | 0.2             | 15.834    | C                             |
| C-AB   | 23                    | 486               | 0.048 | 23                  | 0.0             | 7.775     | A                             |
| C-A    | 744                   |                   |       | 744                 |                 |           |                               |
| A-B    | 23                    |                   |       | 23                  |                 |           |                               |
| A-C    | 1097                  |                   |       | 1097                |                 |           |                               |

17:30 - 17:45

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 46                    | 273               | 0.169 | 46                  | 0.2             | 15.881    | C                             |
| C-AB   | 23                    | 486               | 0.048 | 23                  | 0.0             | 7.776     | A                             |
| C-A    | 744                   |                   |       | 744                 |                 |           |                               |
| A-B    | 23                    |                   |       | 23                  |                 |           |                               |
| A-C    | 1097                  |                   |       | 1097                |                 |           |                               |

17:45 - 18:00

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 38                    | 358               | 0.105 | 38                  | 0.1             | 11.260    | B                             |
| C-AB   | 19                    | 547               | 0.034 | 19                  | 0.0             | 6.814     | A                             |
| C-A    | 608                   |                   |       | 608                 |                 |           |                               |
| A-B    | 19                    |                   |       | 19                  |                 |           |                               |
| A-C    | 895                   |                   |       | 895                 |                 |           |                               |

18:00 - 18:15

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 32                    | 416               | 0.076 | 32                  | 0.1             | 9.375     | A                             |
| C-AB   | 16                    | 592               | 0.027 | 16                  | 0.0             | 6.252     | A                             |
| C-A    | 509                   |                   |       | 509                 |                 |           |                               |
| A-B    | 16                    |                   |       | 16                  |                 |           |                               |
| A-C    | 750                   |                   |       | 750                 |                 |           |                               |

APPENDIX C – SITE ACCESS CAPACITY TESTING RESULTS (DOUBLED TRIP  
GENERATION)

|                                                                                                      |  |
|------------------------------------------------------------------------------------------------------|--|
| <b>Junctions 9</b>                                                                                   |  |
| <b>PICADY 9 - Priority Intersection Module</b>                                                       |  |
| Version: 9.5.0.6896<br>© Copyright TRL Limited, 2018                                                 |  |
| For sales and distribution information, program advice and maintenance, contact TRL:                 |  |
| The users of this computer program for [REDACTED] responsibility for the correctness of the solution |  |

**Filename:** Site Access Modelling (100.100).j9

**Path:** Z:\2019\BWREDE Reading Development Under 10k\BWREDE17 Land at Grevatts Lane, Climping\30 Technical\31 Modelling

**Report generation date:** 01/05/2019 13:52:08

»2019 (100/100 Split) - 2019, AM

»2019 (100/100 Split) - 2019, PM

### Summary of junction performance

|                             | AM          |           |      |     |                           | PM          |           |      |     |                           |
|-----------------------------|-------------|-----------|------|-----|---------------------------|-------------|-----------|------|-----|---------------------------|
|                             | Queue (Veh) | Delay (s) | RFC  | LOS | Network Residual Capacity | Queue (Veh) | Delay (s) | RFC  | LOS | Network Residual Capacity |
| 2019 (100/100 Split) - 2019 |             |           |      |     |                           |             |           |      |     |                           |
| Stream B-AC                 | 0.4         | 14.30     | 0.27 | B   | 28 %                      | 0.5         | 21.35     | 0.35 | C   | 11 %                      |
| Stream C-AB                 | 0.1         | 6.75      | 0.08 | A   | [Stream B-AC]             | 0.1         | 8.31      | 0.10 | A   | [Stream B-AC]             |

Values shown are the highest values encountered over all time segments. Delay is the maximum value of average delay per arriving vehicle. Network Residual Capacity indicates the amount by which network flow could be increased before a user-definable threshold (see Analysis Options) is met.

### File summary

#### File Description

|             |                          |
|-------------|--------------------------|
| Title       |                          |
| Location    | Grevatt's Lane, Climping |
| Site number |                          |
| Date        | 01/05/2019               |
| Version     |                          |
| Status      | (new file)               |
| Identifier  |                          |
| Client      |                          |
| Jobnumber   |                          |
| Enumerator  | ADSYSTRA\ohennessy       |
| Description |                          |

### Units

| Distance units | Speed units | Traffic units input | Traffic units results | Flow units | Average delay units | Total delay units | Rate of delay units |
|----------------|-------------|---------------------|-----------------------|------------|---------------------|-------------------|---------------------|
| m              | kph         | Veh                 | Veh                   | perHour    | s                   | -Min              | perMin              |

### Analysis Options

| Calculate Queue Percentiles | Calculate residual capacity | Residual capacity criteria type | RFC Threshold | Average Delay threshold (s) | Queue threshold (PCU) |
|-----------------------------|-----------------------------|---------------------------------|---------------|-----------------------------|-----------------------|
|                             | ✓                           | Delay                           | 0.85          | 36.00                       | 20.00                 |

### Demand Set Summary

| ID | Scenario name | Time Period name | Traffic profile type | Start time (HH:mm) | Finish time (HH:mm) | Time segment length (min) |
|----|---------------|------------------|----------------------|--------------------|---------------------|---------------------------|
| D1 | 2019          | AM               | ONE HOUR             | 07:45              | 09:15               | 15                        |
| D2 | 2019          | PM               | ONE HOUR             | 16:45              | 18:15               | 15                        |

### Analysis Set Details

| ID | Name                 | Network flow scaling factor (%) |
|----|----------------------|---------------------------------|
| A1 | 2019 (100/100 Split) | 100.000                         |

# 2019 (100/100 Split) - 2019, AM

## Data Errors and Warnings

No errors or warnings

## Junction Network

### Junctions

| Junction | Name                 | Junction type | Major road direction | Use circulating lanes | Junction Delay (s) | Junction LOS |
|----------|----------------------|---------------|----------------------|-----------------------|--------------------|--------------|
| 1        | Proposed Site Access | T-Junction    | Two-way              |                       | 0.88               | A            |

### Junction Network Options

| Driving side | Lighting       | Network residual capacity (%) | First arm reaching threshold |
|--------------|----------------|-------------------------------|------------------------------|
| Left         | Normal/unknown | 28                            | Stream B-AC                  |

## Arms

### Arms

| Arm | Name                 | Description | Arm type |
|-----|----------------------|-------------|----------|
| A   | Grevatt's Lane (E)   |             | Major    |
| B   | Proposed Site Access |             | Minor    |
| C   | Grevatt's Lane (W)   |             | Major    |

### Major Arm Geometry

| Arm | Width of carriageway (m) | Has kerbed central reserve | Has right turn bay | Width for right turn (m) | Visibility for right turn (m) | Blocks? | Blocking queue (PCU) |
|-----|--------------------------|----------------------------|--------------------|--------------------------|-------------------------------|---------|----------------------|
| C   | 7.60                     |                            | ✓                  | 3.50                     | 250.0                         | ✓       | 12.00                |

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

### Minor Arm Geometry

| Arm | Minor arm type | Lane width (m) | Visibility to left (m) | Visibility to right (m) |
|-----|----------------|----------------|------------------------|-------------------------|
| B   | One lane       | 2.75           | 215                    | 215                     |

## Slope / Intercept / Capacity

### Priority Intersection Slopes and Intercepts

| Junction | Stream | Intercept (Veh/hr) | Slope for A-B | Slope for A-C | Slope for C-A | Slope for C-B |
|----------|--------|--------------------|---------------|---------------|---------------|---------------|
| 1        | B-A    | 647                | 0.110         | 0.277         | 0.174         | 0.396         |
| 1        | B-C    | 740                | 0.106         | 0.267         | -             | -             |
| 1        | C-B    | 820                | 0.296         | 0.296         | -             | -             |

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

## Traffic Demand

### Demand Set Details

| ID | Scenario name | Time Period name | Traffic profile type | Start time (HH:mm) | Finish time (HH:mm) | Time segment length (min) |
|----|---------------|------------------|----------------------|--------------------|---------------------|---------------------------|
| D1 | 2019          | AM               | ONE HOUR             | 07:45              | 09:15               | 15                        |

| Vehicle mix source | PCU Factor for a HV (PCU) |
|--------------------|---------------------------|
| HV Percentages     | 2.00                      |

### Demand overview (Traffic)

| Arm | Linked arm | Use O-D data | Average Demand (Veh/hr) | Scaling Factor (%) |
|-----|------------|--------------|-------------------------|--------------------|
| A   |            | ✓            | 725                     | 100.000            |
| B   |            | ✓            | 84                      | 100.000            |
| C   |            | ✓            | 832                     | 100.000            |

## Origin-Destination Data

Demand (Veh/hr)

|  | To |     |    |     |
|--|----|-----|----|-----|
|  |    | A   | B  | C   |
|  | A  | 0   | 42 | 683 |
|  | B  | 42  | 0  | 42  |
|  | C  | 790 | 42 | 0   |

## Vehicle Mix

Heavy Vehicle Percentages

|  | To |   |   |   |
|--|----|---|---|---|
|  |    | A | B | C |
|  | A  | 0 | 0 | 2 |
|  | B  | 0 | 0 | 0 |
|  | C  | 3 | 0 | 0 |

## Results

### Results Summary for whole modelled period

| Stream | Max RFC | Max Delay (s) | Max Queue (Veh) | Max LOS |
|--------|---------|---------------|-----------------|---------|
| B-AC   | 0.27    | 14.30         | 0.4             | B       |
| C-AB   | 0.08    | 6.75          | 0.1             | A       |
| C-A    |         |               |                 |         |
| AB     |         |               |                 |         |
| AC     |         |               |                 |         |

### Main Results for each time segment

07:45 - 08:00

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 63                    | 464               | 0.136 | 63                  | 0.2             | 8.964     | A                             |
| C-AB   | 32                    | 656               | 0.048 | 31                  | 0.1             | 5.763     | A                             |
| C-A    | 595                   |                   |       | 595                 |                 |           |                               |
| AB     | 32                    |                   |       | 32                  |                 |           |                               |
| AC     | 514                   |                   |       | 514                 |                 |           |                               |

08:00 - 08:15

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 76                    | 415               | 0.182 | 75                  | 0.2             | 10.583    | B                             |
| C-AB   | 38                    | 624               | 0.061 | 38                  | 0.1             | 6.140     | A                             |
| C-A    | 710                   |                   |       | 710                 |                 |           |                               |
| A-B    | 38                    |                   |       | 38                  |                 |           |                               |
| A-C    | 614                   |                   |       | 614                 |                 |           |                               |

08:15 - 08:30

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 92                    | 344               | 0.269 | 92                  | 0.4             | 14.235    | B                             |
| C-AB   | 46                    | 580               | 0.080 | 46                  | 0.1             | 6.746     | A                             |
| C-A    | 870                   |                   |       | 870                 |                 |           |                               |
| A-B    | 46                    |                   |       | 46                  |                 |           |                               |
| A-C    | 752                   |                   |       | 752                 |                 |           |                               |

08:30 - 08:45

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 92                    | 344               | 0.269 | 92                  | 0.4             | 14.296    | B                             |
| C-AB   | 46                    | 580               | 0.080 | 46                  | 0.1             | 6.746     | A                             |
| C-A    | 870                   |                   |       | 870                 |                 |           |                               |
| A-B    | 46                    |                   |       | 46                  |                 |           |                               |
| A-C    | 752                   |                   |       | 752                 |                 |           |                               |

08:45 - 09:00

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 76                    | 415               | 0.182 | 76                  | 0.2             | 10.635    | B                             |
| C-AB   | 38                    | 624               | 0.061 | 38                  | 0.1             | 6.142     | A                             |
| C-A    | 710                   |                   |       | 710                 |                 |           |                               |
| A-B    | 38                    |                   |       | 38                  |                 |           |                               |
| A-C    | 614                   |                   |       | 614                 |                 |           |                               |

09:00 - 09:15

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 63                    | 464               | 0.136 | 64                  | 0.2             | 9.006     | A                             |
| C-AB   | 32                    | 656               | 0.048 | 32                  | 0.1             | 5.769     | A                             |
| C-A    | 595                   |                   |       | 595                 |                 |           |                               |
| A-B    | 32                    |                   |       | 32                  |                 |           |                               |
| A-C    | 514                   |                   |       | 514                 |                 |           |                               |

# 2019 (100/100 Split) - 2019, PM

## Data Errors and Warnings

No errors or warnings

## Junction Network

### Junctions

| Junction | Name                 | Junction type | Major road direction | Use circulating lanes | Junction Delay (s) | Junction LOS |
|----------|----------------------|---------------|----------------------|-----------------------|--------------------|--------------|
| 1        | Proposed Site Access | T-Junction    | Two-way              |                       | 1.15               | A            |

### Junction Network Options

| Driving side | Lighting       | Network residual capacity (%) | First arm reaching threshold |
|--------------|----------------|-------------------------------|------------------------------|
| Left         | Normal/unknown | 11                            | Stream B-AC                  |

## Traffic Demand

### Demand Set Details

| ID | Scenario name | Time Period name | Traffic profile type | Start time (HH:mm) | Finish time (HH:mm) | Time segment length (min) |
|----|---------------|------------------|----------------------|--------------------|---------------------|---------------------------|
| D2 | 2019          | PM               | ONE HOUR             | 16:45              | 18:15               | 15                        |

| Vehicle mix source | PCU Factor for a HV (PCU) |
|--------------------|---------------------------|
| HV Percentages     | 2.00                      |

### Demand overview (Traffic)

| Arm | Linked arm | Use O-D data | Average Demand (Veh/hr) | Scaling Factor (%) |
|-----|------------|--------------|-------------------------|--------------------|
| A   |            | ✓            | 1038                    | 100.000            |
| B   |            | ✓            | 84                      | 100.000            |
| C   |            | ✓            | 718                     | 100.000            |

## Origin-Destination Data

Demand (Veh/hr)

|      | To |     |    |     |
|------|----|-----|----|-----|
|      | A  | B   | C  |     |
| From | A  | 0   | 42 | 996 |
|      | B  | 42  | 0  | 42  |
|      | C  | 676 | 42 | 0   |

## Vehicle Mix

Heavy Vehicle Percentages

|      | To |   |   |   |
|------|----|---|---|---|
|      | A  | B | C |   |
| From | A  | 0 | 0 | 1 |
|      | B  | 0 | 0 | 0 |
|      | C  | 1 | 0 | 0 |

## Results

### Results Summary for whole modelled period

| Stream | Max RFC | Max Delay (s) | Max Queue (Veh) | Max LOS |
|--------|---------|---------------|-----------------|---------|
| B-AC   | 0.35    | 21.35         | 0.5             | C       |
| C-AB   | 0.10    | 8.31          | 0.1             | A       |
| C-A    |         |               |                 |         |
| A-B    |         |               |                 |         |
| A-C    |         |               |                 |         |

### Main Results for each time segment

16:45 - 17:00

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 63                    | 409               | 0.154 | 63                  | 0.2             | 10.357    | B                             |
| C-AB   | 32                    | 587               | 0.054 | 31                  | 0.1             | 6.475     | A                             |
| C-A    | 509                   |                   |       | 509                 |                 |           |                               |
| A-B    | 32                    |                   |       | 32                  |                 |           |                               |
| A-C    | 750                   |                   |       | 750                 |                 |           |                               |

17:00 - 17:15

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 76                    | 350               | 0.216 | 75                  | 0.3             | 13.096    | B                             |
| C-AB   | 38                    | 542               | 0.070 | 38                  | 0.1             | 7.141     | A                             |
| C-A    | 608                   |                   |       | 608                 |                 |           |                               |
| A-B    | 38                    |                   |       | 38                  |                 |           |                               |
| A-C    | 895                   |                   |       | 895                 |                 |           |                               |

17:15 - 17:30

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 92                    | 261               | 0.354 | 91                  | 0.5             | 21.098    | C                             |
| C-AB   | 46                    | 479               | 0.097 | 46                  | 0.1             | 8.309     | A                             |
| C-A    | 744                   |                   |       | 744                 |                 |           |                               |
| A-B    | 46                    |                   |       | 46                  |                 |           |                               |
| A-C    | 1097                  |                   |       | 1097                |                 |           |                               |

17:30 - 17:45

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 92                    | 261               | 0.354 | 92                  | 0.5             | 21.346    | C                             |
| C-AB   | 46                    | 479               | 0.097 | 46                  | 0.1             | 8.314     | A                             |
| C-A    | 744                   |                   |       | 744                 |                 |           |                               |
| A-B    | 46                    |                   |       | 46                  |                 |           |                               |
| A-C    | 1097                  |                   |       | 1097                |                 |           |                               |

17:45 - 18:00

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 76                    | 350               | 0.216 | 77                  | 0.3             | 13.233    | B                             |
| C-AB   | 38                    | 542               | 0.070 | 38                  | 0.1             | 7.144     | A                             |
| C-A    | 608                   |                   |       | 608                 |                 |           |                               |
| A-B    | 38                    |                   |       | 38                  |                 |           |                               |
| A-C    | 895                   |                   |       | 895                 |                 |           |                               |

18:00 - 18:15

| Stream | Total Demand (Veh/hr) | Capacity (Veh/hr) | RFC   | Throughput (Veh/hr) | End queue (Veh) | Delay (s) | Unsignalised level of service |
|--------|-----------------------|-------------------|-------|---------------------|-----------------|-----------|-------------------------------|
| B-AC   | 63                    | 409               | 0.154 | 64                  | 0.2             | 10.423    | B                             |
| C-AB   | 32                    | 587               | 0.054 | 32                  | 0.1             | 6.481     | A                             |
| C-A    | 509                   |                   |       | 509                 |                 |           |                               |
| A-B    | 32                    |                   |       | 32                  |                 |           |                               |
| A-C    | 750                   |                   |       | 750                 |                 |           |                               |