Norwich Western Link

Transport Assessment - Appendix 11 – Junction Model Results

Sub Appendix 11h – Junction 11a B1108 Norwich Road/ Bell Road ‘T’ junction and Junction 11b Dark Lane/ Bell Road ‘T’ junction

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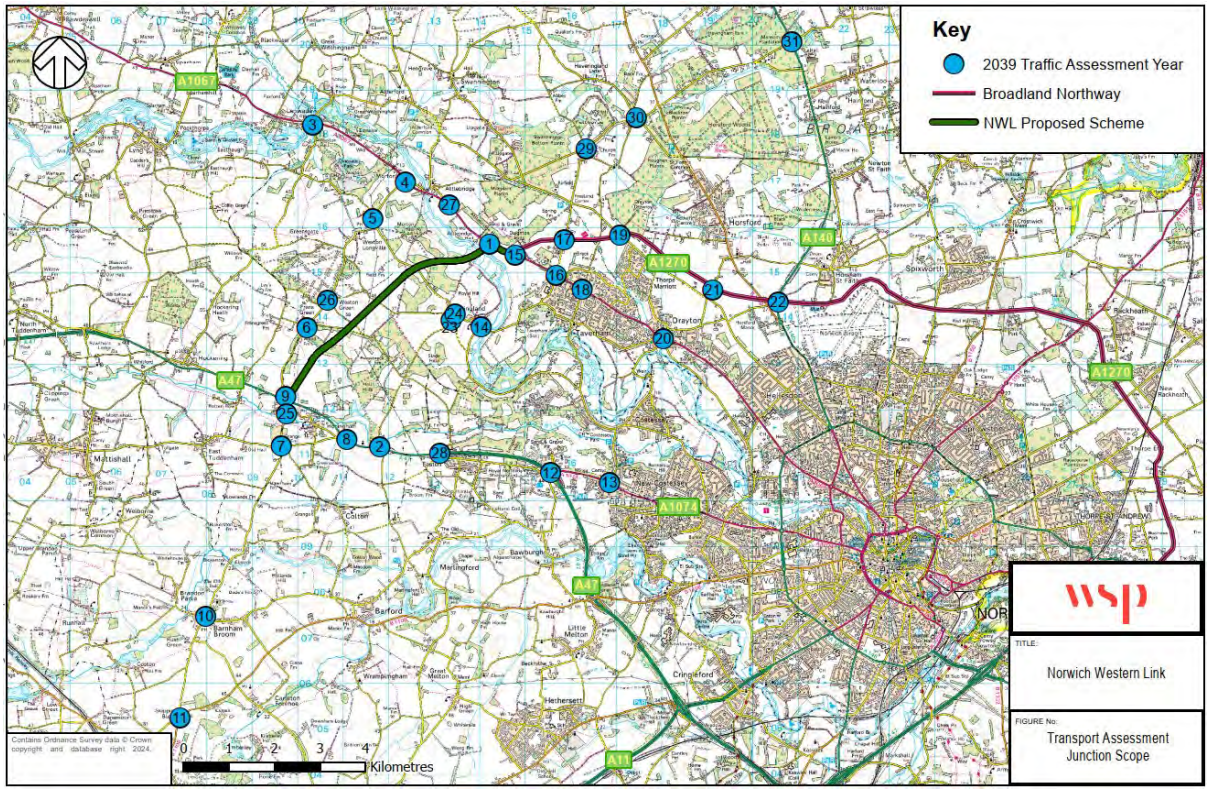
1 Junction Model Results

1.1.1 Junctions 10 modelling software output file that shows the junction capacity results for Junction 11a and Junction 11b of the TA.

1.1.2 We have included a summary of key information shown in this document in an accessible format. However, some users may not be able to access all technical details. If you require this document in a more accessible format please contact norwichwesternlink@norfolk.gov.uk

1.1.3 The TA scope map is shown below as a location plan.

Figure 1-1 Junction Assessment Scope



1.1.4 The model results are presented for 2029 and 2039 future assessment years for AM and PM peak hours, taking 7.30-8.30am and AM peak and 5pm-6pm as PM peak.

1.1.5 The scenarios tested are as follows:

- Do Minimum – the baseline future situation with committed developments and planned highway improvements but without the Proposed Scheme.
- Do Something - the baseline future situation with the Proposed Scheme.
- Do Something + Mitigation - the baseline future situation with the Proposed Scheme added plus a package of traffic mitigation measures in the wider network (north of A1067 and south of A47 plus Honingham Lane closure).

J11a - B1108 Norwich Road/ Bell Road ‘T’ junction and J11b - Dark Lane/ Bell Road ‘T’ junction Results

Junctions 10

PICADY 10 - Priority Intersection Module

Version: 10.0.1.1519

For sales and distribution information, program advice and maintenance, contact TRL Software:
+44 (0)1344 379777 software@trl.co.uk trlsoftware.com

Filename: J11a.j10
Path: \\corp.pbwan.net\IN\IN_Projects\70118686-70061370-Norwich Western Link 2019 20\04 Record of Issue\4A Internal WSP Doc Registers\20240129_Model Reports(wo 2044)\J11\J11a
Report generation date: 29/01/2024 17:08:11

»2029DM, AM
»2029DM, PM
»2029DS, AM
»2029DS, PM
»2029DS_Mitigation, AM
»2029DS_Mitigation, PM
»2039DM, AM
»2039DM, PM
»2039DS, AM
»2039DS, PM
»2039DS_Mitigation, AM
»2039DS_Mitigation, PM

Summary of junction performance

	AM					PM				
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Set ID	Queue (PCU)	Delay (s)	RFC	LOS
	2029DM									
Stream B-AC	D1	0.1	9.22	0.09	A	D2	0.0	7.61	0.03	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2029DS									
Stream B-AC	D3	0.1	9.04	0.10	A	D4	0.1	9.08	0.05	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2029DS_Mitigation									
Stream B-AC	D5	0.1	8.32	0.05	A	D6	0.0	7.78	0.03	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2039DM									
Stream B-AC	D7	0.1	9.40	0.09	A	D8	0.0	7.81	0.04	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2039DS									
Stream B-AC	D9	0.1	9.58	0.11	A	D10	0.1	9.11	0.06	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2039DS_Mitigation									
Stream B-AC	D11	0.1	8.64	0.06	A	D12	0.0	7.82	0.03	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A

There are warnings associated with one or more model runs - see the 'Data Errors and Warnings' tables for each Analysis or Demand Set.

Values shown are the highest values encountered over all time segments. Delay is the maximum value of average delay per arriving vehicle.

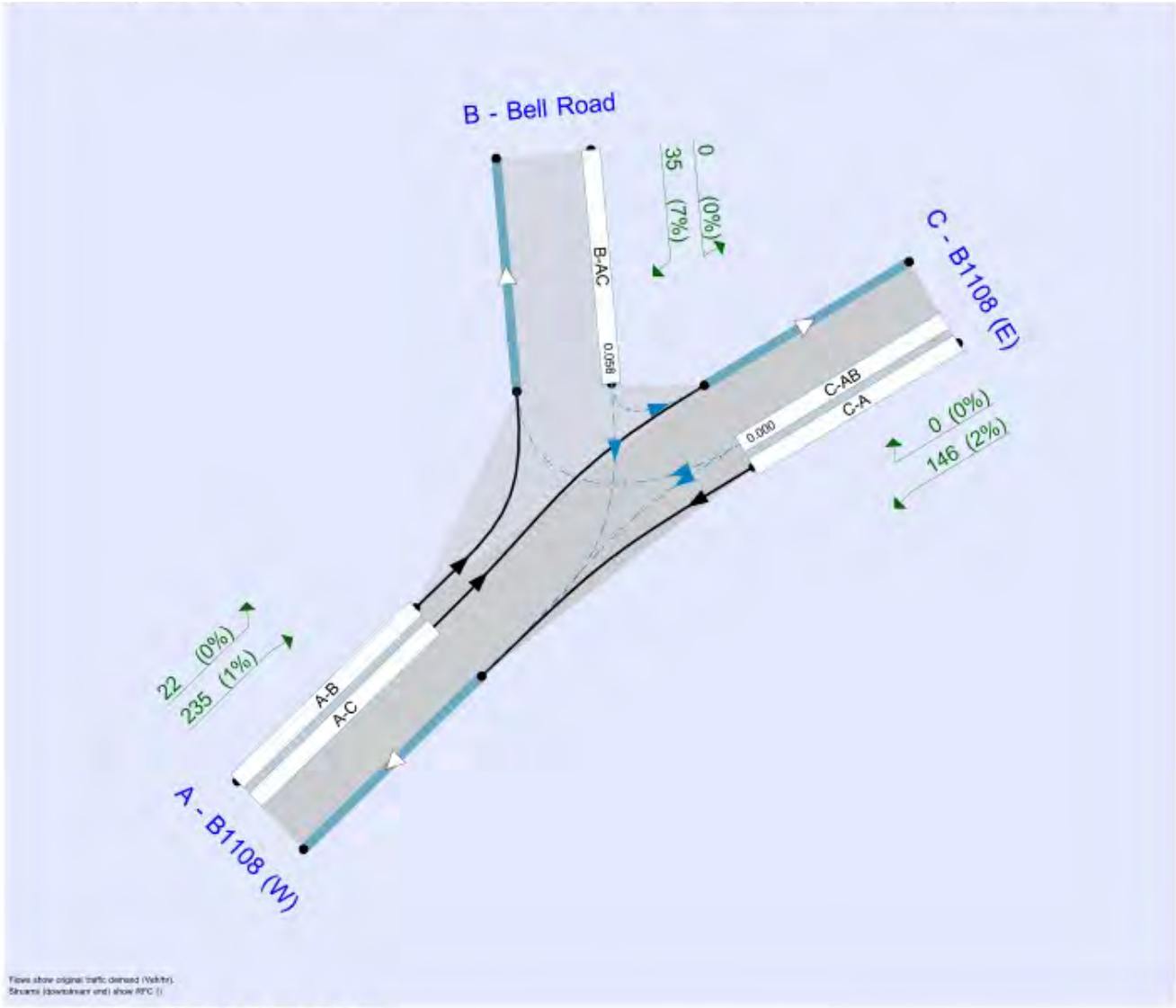
File summary

File Description

Title	Bell Road/ Dark Lane
Location	1.061937 ,52.605339
Site number	11a
Date	22/03/2023
Version	
Status	(new file)
Identifier	
Client	
Jobnumber	
Enumerator	CORP\INAA02374
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	PCU	perHour	s	-Min	perMin



The junction diagram reflects the last run of Junctions.

Analysis Options

Vehicle length (m)	Calculate Queue Percentiles	Calculate detailed queueing delay	Show lane queues in feet / metres	Show all PICADY stream intercepts	Calculate residual capacity	RFC Threshold	Average Delay threshold (s)	Queue threshold (PCU)	Use iterations with HCM roundabouts	Max number of iterations for roundabouts
5.75						0.85	36.00	20.00		500

Demand Set Summary

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D1	2029DM	AM	ONE HOUR	07:15	08:45	15	✓
D2	2029DM	PM	ONE HOUR	16:45	18:15	15	✓
D3	2029DS	AM	ONE HOUR	07:15	08:45	15	✓
D4	2029DS	PM	ONE HOUR	16:45	18:15	15	✓
D5	2029DS_Mitigation	AM	ONE HOUR	07:15	08:45	15	✓
D6	2029DS_Mitigation	PM	ONE HOUR	16:45	18:15	15	✓
D7	2039DM	AM	ONE HOUR	07:15	08:45	15	✓
D8	2039DM	PM	ONE HOUR	16:45	18:15	15	✓
D9	2039DS	AM	ONE HOUR	07:15	08:45	15	✓
D10	2039DS	PM	ONE HOUR	16:45	18:15	15	✓
D11	2039DS_Mitigation	AM	ONE HOUR	07:15	08:45	15	✓
D12	2039DS_Mitigation	PM	ONE HOUR	16:45	18:15	15	✓

Analysis Set Details

ID	Include in report	Network flow scaling factor (%)	Network capacity scaling factor (%)
A1	✓	100.000	100.000

2029DM, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.78	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.78	A

Arms

Arms

Arm	Name	Description	Arm type
A	B1108 (W)		Major
B	Bell Road		Minor
C	B1108 (E)		Major

Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Has right-turn storage	Visibility for right turn (m)	Blocks?	Blocking queue (PCU)
C - B1108 (E)	5.85			59.6	✓	0.00

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 - Bell Road	One lane	3.58	35	77

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
B-A	558	0.102	0.258	0.163	0.369
B-C	712	0.110	0.278	-	-
C-B	608	0.237	0.237	-	-

The slopes and intercepts shown above include custom intercept adjustments only.

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)	Run automatically
D1	2029DM	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	257	100.000
B - Bell Road		ONE HOUR	✓	35	100.000
C - B1108 (E)		ONE HOUR	✓	146	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	22	235
	B - Bell Road	35	0	0
	C - B1108 (E)	146	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.09	0.91
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	1
	B - Bell Road	7	0	0
	C - B1108 (E)	2	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.002	1.010
	B - Bell Road	1.074	1.000	1.000
	C - B1108 (E)	1.020	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	07:15-07:30	193	195
	07:30-07:45	231	233
	07:45-08:00	283	285
	08:00-08:15	283	285
	08:15-08:30	231	233
	08:30-08:45	193	195
B - Bell Road	07:15-07:30	27	29
	07:30-07:45	32	34
	07:45-08:00	39	42
	08:00-08:15	39	42
	08:15-08:30	32	34
	08:30-08:45	27	29
C - B1108 (E)	07:15-07:30	110	112
	07:30-07:45	132	134
	07:45-08:00	161	164
	08:00-08:15	161	164
	08:15-08:30	132	134
	08:30-08:45	110	112

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.09	9.22	0.1	A	35	52
C-AB	0.00	0.00	0.0	A	0	0
C-A					137	205
A-B					20	31
A-C					217	326

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	29	7	491	0.058	28	0.0	0.1	8.345	A
C-AB	0	0	562	0.000	0	0.0	0.0	0.000	A
C-A	112	28			112				
A-B	17	4			17				
A-C	178	45			178				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	34	9	479	0.071	34	0.1	0.1	8.696	A
C-AB	0	0	553	0.000	0	0.0	0.0	0.000	A
C-A	134	34			134				
A-B	20	5			20				
A-C	213	53			213				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	42	10	461	0.091	42	0.1	0.1	9.221	A
C-AB	0	0	541	0.000	0	0.0	0.0	0.000	A
C-A	164	41			164				
A-B	24	6			24				
A-C	261	65			261				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	42	10	461	0.091	42	0.1	0.1	9.225	A
C-AB	0	0	541	0.000	0	0.0	0.0	0.000	A
C-A	164	41			164				
A-B	24	6			24				
A-C	261	65			261				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	34	9	479	0.071	34	0.1	0.1	8.701	A
C-AB	0	0	553	0.000	0	0.0	0.0	0.000	A
C-A	134	34			134				
A-B	20	5			20				
A-C	213	53			213				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	29	7	491	0.058	29	0.1	0.1	8.355	A
C-AB	0	0	562	0.000	0	0.0	0.0	0.000	A
C-A	112	28			112				
A-B	17	4			17				
A-C	178	45			178				

2029DM, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.41	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.41	A

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)	Run automatically
D2	2029DM	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	119	100.000
B - Bell Road		ONE HOUR	✓	14	100.000
C - B1108 (E)		ONE HOUR	✓	137	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	14	105
	B - Bell Road	14	0	0
	C - B1108 (E)	137	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.12	0.88
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	2
	B - Bell Road	3	0	0
	C - B1108 (E)	0	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.003	1.020
	B - Bell Road	1.025	1.000	1.000
	C - B1108 (E)	1.000	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	16:45-17:00	90	91
	17:00-17:15	107	109
	17:15-17:30	131	133
	17:30-17:45	131	133
	17:45-18:00	107	109
	18:00-18:15	90	91
B - Bell Road	16:45-17:00	11	11
	17:00-17:15	13	13
	17:15-17:30	16	16
	17:30-17:45	16	16
	17:45-18:00	13	13
	18:00-18:15	11	11
C - B1108 (E)	16:45-17:00	103	103
	17:00-17:15	123	123
	17:15-17:30	151	151
	17:30-17:45	151	151
	17:45-18:00	123	123
	18:00-18:15	103	103

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.03	7.61	0.0	A	13	20
C-AB	0.00	0.00	0.0	A	0	0
C-A					126	189
A-B					13	19
A-C					99	148

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	11	3	519	0.021	11	0.0	0.0	7.268	A
C-AB	0	0	587	0.000	0	0.0	0.0	0.000	A
C-A	103	26			103				
A-B	10	3			10				
A-C	81	20			81				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	13	3	511	0.026	13	0.0	0.0	7.409	A
C-AB	0	0	583	0.000	0	0.0	0.0	0.000	A
C-A	123	31			123				
A-B	12	3			12				
A-C	97	24			97				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	16	4	501	0.032	16	0.0	0.0	7.613	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	151	38			151				
A-B	15	4			15				
A-C	118	30			118				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	16	4	501	0.032	16	0.0	0.0	7.613	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	151	38			151				
A-B	15	4			15				
A-C	118	30			118				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	13	3	511	0.026	13	0.0	0.0	7.410	A
C-AB	0	0	583	0.000	0	0.0	0.0	0.000	A
C-A	123	31			123				
A-B	12	3			12				
A-C	97	24			97				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	11	3	519	0.021	11	0.0	0.0	7.271	A
C-AB	0	0	587	0.000	0	0.0	0.0	0.000	A
C-A	103	26			103				
A-B	10	3			10				
A-C	81	20			81				

2029DS, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.96	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.96	A

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)	Run automatically
D3	2029DS	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	231	100.000
B - Bell Road		ONE HOUR	✓	40	100.000
C - B1108 (E)		ONE HOUR	✓	128	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	24	207
	B - Bell Road	40	0	0
	C - B1108 (E)	128	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.11	0.89
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	0
	B - Bell Road	7	0	0
	C - B1108 (E)	2	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.002	1.003
	B - Bell Road	1.068	1.000	1.000
	C - B1108 (E)	1.023	1.001	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	07:15-07:30	174	174
	07:30-07:45	208	208
	07:45-08:00	254	255
	08:00-08:15	254	255
	08:15-08:30	208	208
	08:30-08:45	174	174
B - Bell Road	07:15-07:30	30	32
	07:30-07:45	36	39
	07:45-08:00	44	47
	08:00-08:15	44	47
	08:15-08:30	36	39
	08:30-08:45	30	32
C - B1108 (E)	07:15-07:30	97	99
	07:30-07:45	115	118
	07:45-08:00	141	145
	08:00-08:15	141	145
	08:15-08:30	115	118
	08:30-08:45	97	99

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.10	9.04	0.1	A	39	59
C-AB	0.00	0.00	0.0	A	0	0
C-A					121	181
A-B					22	34
A-C					190	285

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	32	8	499	0.065	32	0.0	0.1	8.224	A
C-AB	0	0	567	0.000	0	0.0	0.0	0.000	A
C-A	99	25			99				
A-B	18	5			18				
A-C	156	39			156				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	39	10	488	0.079	38	0.1	0.1	8.554	A
C-AB	0	0	559	0.000	0	0.0	0.0	0.000	A
C-A	118	30			118				
A-B	22	5			22				
A-C	186	47			186				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	47	12	472	0.100	47	0.1	0.1	9.041	A
C-AB	0	0	548	0.000	0	0.0	0.0	0.000	A
C-A	145	36			145				
A-B	27	7			27				
A-C	228	57			228				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	47	12	472	0.100	47	0.1	0.1	9.045	A
C-AB	0	0	548	0.000	0	0.0	0.0	0.000	A
C-A	145	36			145				
A-B	27	7			27				
A-C	228	57			228				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	39	10	488	0.079	39	0.1	0.1	8.561	A
C-AB	0	0	559	0.000	0	0.0	0.0	0.000	A
C-A	118	30			118				
A-B	22	5			22				
A-C	186	47			186				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	32	8	499	0.065	32	0.1	0.1	8.236	A
C-AB	0	0	567	0.000	0	0.0	0.0	0.000	A
C-A	99	25			99				
A-B	18	5			18				
A-C	156	39			156				

2029DS, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.75	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.75	A

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)	Run automatically
D4	2029DS	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	130	100.000
B - Bell Road		ONE HOUR	✓	20	100.000
C - B1108 (E)		ONE HOUR	✓	132	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	15	115
	B - Bell Road	20	0	0
	C - B1108 (E)	132	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.12	0.88
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	1
	B - Bell Road	19	0	0
	C - B1108 (E)	0	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.001	1.006
	B - Bell Road	1.194	1.000	1.004
	C - B1108 (E)	1.000	1.003	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	16:45-17:00	98	99
	17:00-17:15	117	118
	17:15-17:30	143	144
	17:30-17:45	143	144
	17:45-18:00	117	118
	18:00-18:15	98	99
B - Bell Road	16:45-17:00	15	18
	17:00-17:15	18	21
	17:15-17:30	22	26
	17:30-17:45	22	26
	17:45-18:00	18	21
	18:00-18:15	15	18
C - B1108 (E)	16:45-17:00	99	99
	17:00-17:15	118	118
	17:15-17:30	145	145
	17:30-17:45	145	145
	17:45-18:00	118	118
	18:00-18:15	99	99

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.05	9.08	0.1	A	22	33
C-AB	0.00	0.00	0.0	A	0	0
C-A					121	181
A-B					14	21
A-C					106	159

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	18	4	518	0.035	18	0.0	0.0	8.593	A
C-AB	0	0	585	0.000	0	0.0	0.0	0.000	A
C-A	99	25			99				
A-B	11	3			11				
A-C	87	22			87				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	21	5	510	0.042	21	0.0	0.1	8.795	A
C-AB	0	0	581	0.000	0	0.0	0.0	0.000	A
C-A	118	30			118				
A-B	14	3			14				
A-C	104	26			104				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	26	7	499	0.052	26	0.1	0.1	9.081	A
C-AB	0	0	574	0.000	0	0.0	0.0	0.000	A
C-A	145	36			145				
A-B	17	4			17				
A-C	127	32			127				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	26	7	499	0.052	26	0.1	0.1	9.083	A
C-AB	0	0	574	0.000	0	0.0	0.0	0.000	A
C-A	145	36			145				
A-B	17	4			17				
A-C	127	32			127				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	21	5	510	0.042	21	0.1	0.1	8.799	A
C-AB	0	0	581	0.000	0	0.0	0.0	0.000	A
C-A	118	30			118				
A-B	14	3			14				
A-C	104	26			104				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	18	4	518	0.035	18	0.1	0.0	8.600	A
C-AB	0	0	585	0.000	0	0.0	0.0	0.000	A
C-A	99	25			99				
A-B	11	3			11				
A-C	87	22			87				

2029DS_Mitigation, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.38	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.38	A

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)	Run automatically
D5	2029DS_Mitigation	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	277	100.000
B - Bell Road		ONE HOUR	✓	20	100.000
C - B1108 (E)		ONE HOUR	✓	137	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	24	253
	B - Bell Road	20	0	0
	C - B1108 (E)	137	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.09	0.91
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	0
	B - Bell Road	1	0	0
	C - B1108 (E)	2	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.000	1.002
	B - Bell Road	1.006	1.000	1.000
	C - B1108 (E)	1.022	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	07:15-07:30	209	209
	07:30-07:45	249	250
	07:45-08:00	305	306
	08:00-08:15	305	306
	08:15-08:30	249	250
	08:30-08:45	209	209
B - Bell Road	07:15-07:30	15	15
	07:30-07:45	18	18
	07:45-08:00	22	22
	08:00-08:15	22	22
	08:15-08:30	18	18
	08:30-08:45	15	15
C - B1108 (E)	07:15-07:30	103	105
	07:30-07:45	123	126
	07:45-08:00	151	154
	08:00-08:15	151	154
	08:15-08:30	123	126
	08:30-08:45	103	105

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.05	8.32	0.1	A	19	28
C-AB	0.00	0.00	0.0	A	0	0
C-A					129	193
A-B					22	33
A-C					233	349

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	15	4	489	0.031	15	0.0	0.0	7.639	A
C-AB	0	0	559	0.000	0	0.0	0.0	0.000	A
C-A	105	26			105				
A-B	18	5			18				
A-C	191	48			191				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	18	5	476	0.038	18	0.0	0.0	7.913	A
C-AB	0	0	549	0.000	0	0.0	0.0	0.000	A
C-A	126	31			126				
A-B	22	5			22				
A-C	228	57			228				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	22	6	458	0.049	22	0.0	0.1	8.319	A
C-AB	0	0	536	0.000	0	0.0	0.0	0.000	A
C-A	154	39			154				
A-B	26	7			26				
A-C	279	70			279				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	22	6	458	0.049	22	0.1	0.1	8.321	A
C-AB	0	0	536	0.000	0	0.0	0.0	0.000	A
C-A	154	39			154				
A-B	26	7			26				
A-C	279	70			279				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	18	5	476	0.038	18	0.1	0.0	7.915	A
C-AB	0	0	549	0.000	0	0.0	0.0	0.000	A
C-A	126	31			126				
A-B	22	5			22				
A-C	228	57			228				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	15	4	489	0.031	15	0.0	0.0	7.846	A
C-AB	0	0	559	0.000	0	0.0	0.0	0.000	A
C-A	105	26			105				
A-B	18	5			18				
A-C	191	48			191				

2029DS_Mitigation, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.24	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.24	A

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)	Run automatically
D6	2029DS_Mitigation	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	207	100.000
B - Bell Road		ONE HOUR	✓	11	100.000
C - B1108 (E)		ONE HOUR	✓	129	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	14	193
	B - Bell Road	11	0	0
	C - B1108 (E)	129	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.07	0.93
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	1
	B - Bell Road	1	0	0
	C - B1108 (E)	0	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.004	1.006
	B - Bell Road	1.006	1.000	1.000
	C - B1108 (E)	1.000	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	16:45-17:00	156	157
	17:00-17:15	186	187
	17:15-17:30	228	229
	17:30-17:45	228	229
	17:45-18:00	186	187
	18:00-18:15	156	157
B - Bell Road	16:45-17:00	8	8
	17:00-17:15	10	10
	17:15-17:30	12	12
	17:30-17:45	12	12
	17:45-18:00	10	10
	18:00-18:15	8	8
C - B1108 (E)	16:45-17:00	97	97
	17:00-17:15	116	116
	17:15-17:30	142	142
	17:30-17:45	142	142
	17:45-18:00	116	116
	18:00-18:15	97	97

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.03	7.78	0.0	A	10	15
C-AB	0.00	0.00	0.0	A	0	0
C-A					119	178
A-B					13	19
A-C					178	267

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	8	2	503	0.016	8	0.0	0.0	7.321	A
C-AB	0	0	571	0.000	0	0.0	0.0	0.000	A
C-A	97	24			97				
A-B	10	3			10				
A-C	146	37			146				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	10	2	492	0.020	10	0.0	0.0	7.506	A
C-AB	0	0	564	0.000	0	0.0	0.0	0.000	A
C-A	116	29			116				
A-B	12	3			12				
A-C	175	44			175				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	12	3	478	0.025	12	0.0	0.0	7.779	A
C-AB	0	0	554	0.000	0	0.0	0.0	0.000	A
C-A	142	36			142				
A-B	15	4			15				
A-C	214	53			214				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	12	3	478	0.025	12	0.0	0.0	7.779	A
C-AB	0	0	554	0.000	0	0.0	0.0	0.000	A
C-A	142	36			142				
A-B	15	4			15				
A-C	214	53			214				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	10	2	492	0.020	10	0.0	0.0	7.507	A
C-AB	0	0	564	0.000	0	0.0	0.0	0.000	A
C-A	116	29			116				
A-B	12	3			12				
A-C	175	44			175				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	8	2	503	0.016	8	0.0	0.0	7.321	A
C-AB	0	0	571	0.000	0	0.0	0.0	0.000	A
C-A	97	24			97				
A-B	10	3			10				
A-C	146	37			146				

2039DM, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.78	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.78	A

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)	Run automatically
D7	2039DM	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	263	100.000
B - Bell Road		ONE HOUR	✓	35	100.000
C - B1108 (E)		ONE HOUR	✓	152	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	25	238
	B - Bell Road	35	0	0
	C - B1108 (E)	152	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.09	0.91
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	1
	B - Bell Road	9	0	0
	C - B1108 (E)	2	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.002	1.008
	B - Bell Road	1.088	1.000	1.000
	C - B1108 (E)	1.020	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	07:15-07:30	198	200
	07:30-07:45	237	239
	07:45-08:00	290	292
	08:00-08:15	290	292
	08:15-08:30	237	239
	08:30-08:45	198	200
B - Bell Road	07:15-07:30	26	29
	07:30-07:45	31	34
	07:45-08:00	39	42
	08:00-08:15	39	42
	08:15-08:30	31	34
	08:30-08:45	26	29
C - B1108 (E)	07:15-07:30	115	117
	07:30-07:45	137	140
	07:45-08:00	168	171
	08:00-08:15	168	171
	08:15-08:30	137	140
	08:30-08:45	115	117

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.09	9.40	0.1	A	35	52
C-AB	0.00	0.00	0.0	A	0	0
C-A					142	214
A-B					23	34
A-C					221	331

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	29	7	490	0.059	28	0.0	0.1	8.485	A
C-AB	0	0	561	0.000	0	0.0	0.0	0.000	A
C-A	117	29			117				
A-B	19	5			19				
A-C	181	45			181				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	34	9	477	0.072	34	0.1	0.1	8.850	A
C-AB	0	0	552	0.000	0	0.0	0.0	0.000	A
C-A	140	35			140				
A-B	22	6			22				
A-C	216	54			216				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	42	10	459	0.091	42	0.1	0.1	9.398	A
C-AB	0	0	539	0.000	0	0.0	0.0	0.000	A
C-A	171	43			171				
A-B	28	7			28				
A-C	265	66			265				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	42	10	459	0.091	42	0.1	0.1	9.401	A
C-AB	0	0	539	0.000	0	0.0	0.0	0.000	A
C-A	171	43			171				
A-B	28	7			28				
A-C	265	66			265				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	34	9	477	0.072	34	0.1	0.1	8.856	A
C-AB	0	0	552	0.000	0	0.0	0.0	0.000	A
C-A	140	35			140				
A-B	22	6			22				
A-C	216	54			216				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	29	7	490	0.059	29	0.1	0.1	8.497	A
C-AB	0	0	561	0.000	0	0.0	0.0	0.000	A
C-A	117	29			117				
A-B	19	5			19				
A-C	181	45			181				

2039DM, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.44	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.44	A

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)	Run automatically
D8	2039DM	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	162	100.000
B - Bell Road		ONE HOUR	✓	17	100.000
C - B1108 (E)		ONE HOUR	✓	125	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	14	147
	B - Bell Road	17	0	0
	C - B1108 (E)	125	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.09	0.91
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	1
	B - Bell Road	2	0	0
	C - B1108 (E)	0	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.003	1.015
	B - Bell Road	1.024	1.000	1.000
	C - B1108 (E)	1.000	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	16:45-17:00	122	123
	17:00-17:15	145	147
	17:15-17:30	178	180
	17:30-17:45	178	180
	17:45-18:00	145	147
	18:00-18:15	122	123
B - Bell Road	16:45-17:00	13	13
	17:00-17:15	15	15
	17:15-17:30	18	19
	17:30-17:45	18	19
	17:45-18:00	15	15
	18:00-18:15	13	13
C - B1108 (E)	16:45-17:00	94	94
	17:00-17:15	113	113
	17:15-17:30	138	138
	17:30-17:45	138	138
	17:45-18:00	113	113
	18:00-18:15	94	94

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.04	7.81	0.0	A	16	24
C-AB	0.00	0.00	0.0	A	0	0
C-A					115	172
A-B					13	20
A-C					137	206

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	13	3	512	0.025	13	0.0	0.0	7.383	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	94	24			94				
A-B	11	3			11				
A-C	113	28			113				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	15	4	503	0.031	15	0.0	0.0	7.557	A
C-AB	0	0	574	0.000	0	0.0	0.0	0.000	A
C-A	113	28			113				
A-B	13	3			13				
A-C	134	34			134				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	19	5	491	0.038	19	0.0	0.0	7.809	A
C-AB	0	0	566	0.000	0	0.0	0.0	0.000	A
C-A	138	34			138				
A-B	16	4			16				
A-C	165	41			165				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	19	5	491	0.038	19	0.0	0.0	7.809	A
C-AB	0	0	566	0.000	0	0.0	0.0	0.000	A
C-A	138	34			138				
A-B	16	4			16				
A-C	165	41			165				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	15	4	503	0.031	15	0.0	0.0	7.558	A
C-AB	0	0	574	0.000	0	0.0	0.0	0.000	A
C-A	113	28			113				
A-B	13	3			13				
A-C	134	34			134				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	13	3	512	0.025	13	0.0	0.0	7.389	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	94	24			94				
A-B	11	3			11				
A-C	113	28			113				

2039DS, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		1.05	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	1.05	A

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)	Run automatically
D9	2039DS	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	248	100.000
B - Bell Road		ONE HOUR	✓	43	100.000
C - B1108 (E)		ONE HOUR	✓	135	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	28	220
	B - Bell Road	43	0	0
	C - B1108 (E)	135	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.11	0.89
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	0
	B - Bell Road	10	0	0
	C - B1108 (E)	2	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.003	1.001
	B - Bell Road	1.103	1.000	1.000
	C - B1108 (E)	1.022	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	07:15-07:30	187	187
	07:30-07:45	223	223
	07:45-08:00	273	273
	08:00-08:15	273	273
	08:15-08:30	223	223
	08:30-08:45	187	187
B - Bell Road	07:15-07:30	32	36
	07:30-07:45	39	43
	07:45-08:00	48	52
	08:00-08:15	48	52
	08:15-08:30	39	43
	08:30-08:45	32	36
C - B1108 (E)	07:15-07:30	102	104
	07:30-07:45	121	124
	07:45-08:00	149	152
	08:00-08:15	149	152
	08:15-08:30	121	124
	08:30-08:45	102	104

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.11	9.58	0.1	A	44	66
C-AB	0.00	0.00	0.0	A	0	0
C-A					127	190
A-B					25	38
A-C					202	303

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	36	9	496	0.072	36	0.0	0.1	8.627	A
C-AB	0	0	564	0.000	0	0.0	0.0	0.000	A
C-A	104	26			104				
A-B	21	5			21				
A-C	166	41			166				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	43	11	484	0.088	43	0.1	0.1	9.006	A
C-AB	0	0	556	0.000	0	0.0	0.0	0.000	A
C-A	124	31			124				
A-B	25	6			25				
A-C	198	50			198				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	52	13	467	0.112	52	0.1	0.1	9.575	A
C-AB	0	0	544	0.000	0	0.0	0.0	0.000	A
C-A	152	38			152				
A-B	30	8			30				
A-C	243	61			243				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	52	13	467	0.112	52	0.1	0.1	9.580	A
C-AB	0	0	544	0.000	0	0.0	0.0	0.000	A
C-A	152	38			152				
A-B	30	8			30				
A-C	243	61			243				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	43	11	484	0.088	43	0.1	0.1	9.015	A
C-AB	0	0	556	0.000	0	0.0	0.0	0.000	A
C-A	124	31			124				
A-B	25	6			25				
A-C	198	50			198				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	36	9	496	0.072	36	0.1	0.1	8.842	A
C-AB	0	0	564	0.000	0	0.0	0.0	0.000	A
C-A	104	26			104				
A-B	21	5			21				
A-C	166	41			166				

2039DS, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.83	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.83	A

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)	Run automatically
D10	2039DS	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	162	100.000
B - Bell Road		ONE HOUR	✓	24	100.000
C - B1108 (E)		ONE HOUR	✓	118	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	17	145
	B - Bell Road	24	0	0
	C - B1108 (E)	118	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.10	0.90
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	0
	B - Bell Road	17	0	0
	C - B1108 (E)	0	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.001	1.004
	B - Bell Road	1.169	1.000	1.000
	C - B1108 (E)	1.000	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	16:45-17:00	122	122
	17:00-17:15	146	146
	17:15-17:30	178	179
	17:30-17:45	178	179
	17:45-18:00	146	146
	18:00-18:15	122	122
B - Bell Road	16:45-17:00	18	21
	17:00-17:15	22	25
	17:15-17:30	27	31
	17:30-17:45	27	31
	17:45-18:00	22	25
	18:00-18:15	18	21
C - B1108 (E)	16:45-17:00	89	89
	17:00-17:15	106	106
	17:15-17:30	130	130
	17:30-17:45	130	130
	17:45-18:00	106	106
	18:00-18:15	89	89

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.06	9.11	0.1	A	26	39
C-AB	0.00	0.00	0.0	A	0	0
C-A					108	162
A-B					15	23
A-C					134	201

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	21	5	513	0.041	21	0.0	0.0	8.538	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	89	22			89				
A-B	13	3			13				
A-C	110	27			110				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	25	6	505	0.050	25	0.0	0.1	8.773	A
C-AB	0	0	574	0.000	0	0.0	0.0	0.000	A
C-A	106	26			106				
A-B	15	4			15				
A-C	131	33			131				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	31	8	493	0.063	31	0.1	0.1	9.104	A
C-AB	0	0	566	0.000	0	0.0	0.0	0.000	A
C-A	130	32			130				
A-B	18	5			18				
A-C	161	40			161				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	31	8	493	0.063	31	0.1	0.1	9.106	A
C-AB	0	0	566	0.000	0	0.0	0.0	0.000	A
C-A	130	32			130				
A-B	18	5			18				
A-C	161	40			161				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	25	6	505	0.050	25	0.1	0.1	8.777	A
C-AB	0	0	574	0.000	0	0.0	0.0	0.000	A
C-A	106	26			106				
A-B	15	4			15				
A-C	131	33			131				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	21	5	513	0.041	21	0.1	0.1	8.549	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	89	22			89				
A-B	13	3			13				
A-C	110	27			110				

2039DS_Mitigation, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.38	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.38	A

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)	Run automatically
D11	2039DS_Mitigation	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	298	100.000
B - Bell Road		ONE HOUR	✓	22	100.000
C - B1108 (E)		ONE HOUR	✓	178	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	27	271
	B - Bell Road	22	0	0
	C - B1108 (E)	178	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.09	0.91
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	0
	B - Bell Road	1	0	0
	C - B1108 (E)	2	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.004	1.001
	B - Bell Road	1.009	1.000	1.000
	C - B1108 (E)	1.017	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	07:15-07:30	225	225
	07:30-07:45	268	268
	07:45-08:00	328	329
	08:00-08:15	328	329
	08:15-08:30	268	268
	08:30-08:45	225	225
B - Bell Road	07:15-07:30	17	17
	07:30-07:45	20	20
	07:45-08:00	24	25
	08:00-08:15	24	25
	08:15-08:30	20	20
	08:30-08:45	17	17
C - B1108 (E)	07:15-07:30	134	136
	07:30-07:45	160	163
	07:45-08:00	196	200
	08:00-08:15	196	200
	08:15-08:30	160	163
	08:30-08:45	134	136

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.06	8.64	0.1	A	20	31
C-AB	0.00	0.00	0.0	A	0	0
C-A					166	249
A-B					25	37
A-C					249	374

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	17	4	480	0.035	17	0.0	0.0	7.828	A
C-AB	0	0	555	0.000	0	0.0	0.0	0.000	A
C-A	136	34			136				
A-B	20	5			20				
A-C	204	51			204				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	20	5	465	0.043	20	0.0	0.0	8.153	A
C-AB	0	0	545	0.000	0	0.0	0.0	0.000	A
C-A	163	41			163				
A-B	24	6			24				
A-C	244	61			244				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	25	6	445	0.055	24	0.0	0.1	8.640	A
C-AB	0	0	530	0.000	0	0.0	0.0	0.000	A
C-A	200	50			200				
A-B	30	7			30				
A-C	299	75			299				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	25	6	445	0.055	25	0.1	0.1	8.642	A
C-AB	0	0	530	0.000	0	0.0	0.0	0.000	A
C-A	200	50			200				
A-B	30	7			30				
A-C	299	75			299				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	20	5	465	0.043	20	0.1	0.0	8.155	A
C-AB	0	0	545	0.000	0	0.0	0.0	0.000	A
C-A	163	41			163				
A-B	24	6			24				
A-C	244	61			244				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	17	4	480	0.035	17	0.0	0.0	7.834	A
C-AB	0	0	555	0.000	0	0.0	0.0	0.000	A
C-A	136	34			136				
A-B	20	5			20				
A-C	204	51			204				

2039DS_Mitigation, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - B1108 (E) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11a	B1108/ Bell Road	T-Junction	Two-way	Two-way	Two-way		0.27	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.27	A

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)	Run automatically
D12	2039DS_Mitigation	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - B1108 (W)		ONE HOUR	✓	219	100.000
B - Bell Road		ONE HOUR	✓	12	100.000
C - B1108 (E)		ONE HOUR	✓	121	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	16	203
	B - Bell Road	12	0	0
	C - B1108 (E)	121	0	0

Proportions

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0.00	0.07	0.93
	B - Bell Road	1.00	0.00	0.00
	C - B1108 (E)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	0	0	0
	B - Bell Road	1	0	0
	C - B1108 (E)	0	0	0

Average PCU Per Veh

		To		
		A - B1108 (W)	B - Bell Road	C - B1108 (E)
From	A - B1108 (W)	1.000	1.004	1.004
	B - Bell Road	1.005	1.000	1.000
	C - B1108 (E)	1.000	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - B1108 (W)	16:45-17:00	165	165
	17:00-17:15	197	197
	17:15-17:30	241	242
	17:30-17:45	241	242
	17:45-18:00	197	197
	18:00-18:15	165	165
B - Bell Road	16:45-17:00	9	9
	17:00-17:15	11	11
	17:15-17:30	13	14
	17:30-17:45	13	14
	17:45-18:00	11	11
	18:00-18:15	9	9
C - B1108 (E)	16:45-17:00	91	91
	17:00-17:15	109	109
	17:15-17:30	134	134
	17:30-17:45	134	134
	17:45-18:00	109	109
	18:00-18:15	91	91

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.03	7.82	0.0	A	11	17
C-AB	0.00	0.00	0.0	A	0	0
C-A					111	167
A-B					14	21
A-C					187	281

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	9	2	502	0.018	9	0.0	0.0	7.346	A
C-AB	0	0	569	0.000	0	0.0	0.0	0.000	A
C-A	91	23			91				
A-B	12	3			12				
A-C	154	38			154				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	11	3	491	0.022	11	0.0	0.0	7.539	A
C-AB	0	0	562	0.000	0	0.0	0.0	0.000	A
C-A	109	27			109				
A-B	14	4			14				
A-C	183	46			183				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	14	3	476	0.028	13	0.0	0.0	7.824	A
C-AB	0	0	551	0.000	0	0.0	0.0	0.000	A
C-A	134	33			134				
A-B	17	4			17				
A-C	225	56			225				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	14	3	476	0.028	14	0.0	0.0	7.824	A
C-AB	0	0	551	0.000	0	0.0	0.0	0.000	A
C-A	134	33			134				
A-B	17	4			17				
A-C	225	56			225				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	11	3	491	0.022	11	0.0	0.0	7.542	A
C-AB	0	0	562	0.000	0	0.0	0.0	0.000	A
C-A	109	27			109				
A-B	14	4			14				
A-C	183	46			183				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	9	2	502	0.018	9	0.0	0.0	7.346	A
C-AB	0	0	569	0.000	0	0.0	0.0	0.000	A
C-A	91	23			91				
A-B	12	3			12				
A-C	154	38			154				

Junctions 10

PICADY 10 - Priority Intersection Module

Filename: J11b.j10
Path: \\corp.pbwan.net\IN\IN_Projects\70118686-70061370-Norwich Western Link 2019 20\04 Record of Issue\4A Internal WSP Doc Registers\20240129_Model Reports(wo 2044)\J11\J12b
Report generation date: 29/01/2024 17:12:22

»2029DM, AM
»2029DM, PM
»2029DS, AM
»2029DS, PM
»2029DS_Mitigation, AM
»2029DS_Mitigation, PM
»2039DM, AM
»2039DM, PM
»2039DS, AM
»2039DS, PM
»2039DS_Mitigation, AM
»2039DS_Mitigation, PM

Summary of junction performance

	AM					PM				
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Set ID	Queue (PCU)	Delay (s)	RFC	LOS
	2029DM									
Stream B-AC	D1	0.0	0.00	0.00	A	D2	0.0	0.00	0.00	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2029DS									
Stream B-AC	D3	0.0	0.00	0.00	A	D4	0.0	0.00	0.00	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2029DS_Mitigation									
Stream B-AC	D5	0.0	0.00	0.00	A	D6	0.0	0.00	0.00	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2039DM									
Stream B-AC	D7	0.0	0.00	0.00	A	D8	0.0	0.00	0.00	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2039DS									
Stream B-AC	D9	0.0	0.00	0.00	A	D10	0.0	0.00	0.00	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A
	2039DS_Mitigation									
Stream B-AC	D11	0.0	0.00	0.00	A	D12	0.0	0.00	0.00	A
Stream C-AB		0.0	0.00	0.00	A		0.0	0.00	0.00	A

There are warnings associated with one or more model runs - see the 'Data Errors and Warnings' tables for each Analysis or Demand Set.

Values shown are the highest values encountered over all time segments. Delay is the maximum value of average delay per arriving vehicle.

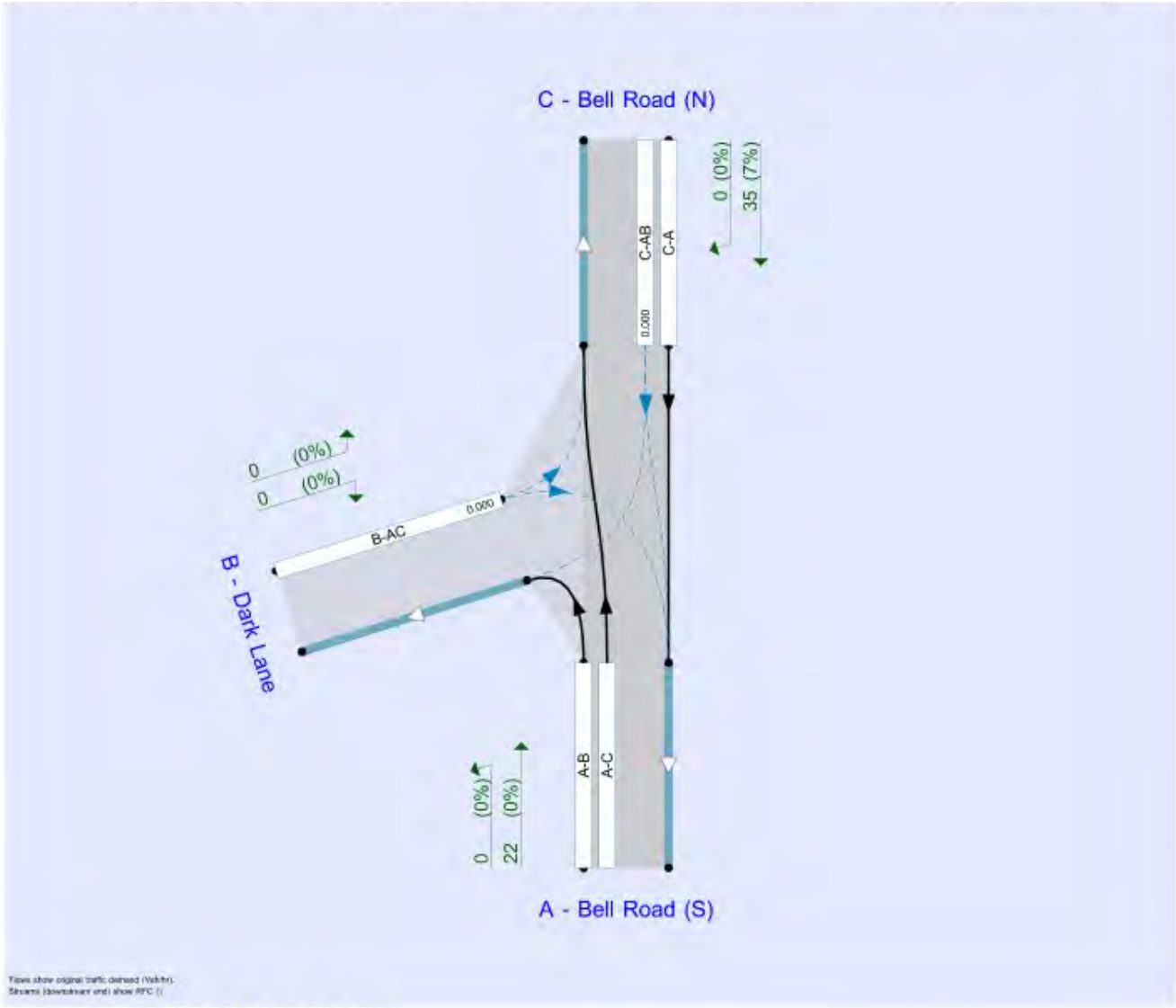
File summary

File Description

Title	Bell Road/ B1108 Norwich Road
Location	52.605361, 1.061860
Site number	11b
Date	22/03/2023
Version	
Status	(new file)
Identifier	
Client	
Jobnumber	
Enumerator	CORP\INAA02374
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	PCU	perHour	s	-Min	perMin



The junction diagram reflects the last run of Junctions.

Analysis Options

Vehicle length (m)	Calculate Queue Percentiles	Calculate detailed queueing delay	Show lane queues in feet / metres	Show all PICADY stream intercepts	Calculate residual capacity	RFC Threshold	Average Delay threshold (s)	Queue threshold (PCU)	Use iterations with HCM roundabouts	Max number of iterations for roundabouts
5.75						0.85	36.00	20.00		500

Demand Set Summary

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D1	2029DM	AM	ONE HOUR	07:15	08:45	15	✓
D2	2029DM	PM	ONE HOUR	16:45	18:15	15	✓
D3	2029DS	AM	ONE HOUR	07:15	08:45	15	✓
D4	2029DS	PM	ONE HOUR	16:45	18:15	15	✓
D5	2029DS_Mitigation	AM	ONE HOUR	07:15	08:45	15	✓
D6	2029DS_Mitigation	PM	ONE HOUR	16:45	18:15	15	✓
D7	2039DM	AM	ONE HOUR	07:15	08:45	15	✓
D8	2039DM	PM	ONE HOUR	16:45	18:15	15	✓
D9	2039DS	AM	ONE HOUR	07:15	08:45	15	✓
D10	2039DS	PM	ONE HOUR	16:45	18:15	15	✓
D11	2039DS_Mitigation	AM	ONE HOUR	07:15	08:45	15	✓
D12	2039DS_Mitigation	PM	ONE HOUR	16:45	18:15	15	✓

Analysis Set Details

ID	Include in report	Network flow scaling factor (%)	Network capacity scaling factor (%)
A1	✓	100.000	100.000

2029DM, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

Arms

Arms

Arm	Name	Description	Arm type
A	Bell Road (S)		Major
B	Dark Lane		Minor
C	Bell Road (N)		Major

Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Has right-turn storage	Visibility for right turn (m)	Blocks?	Blocking queue (PCU)
C - Bell Road (N)	4.70			13.3	✓	0.00

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 - Dark Lane	One lane	2.94	28	9

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
B-A	488	0.094	0.237	0.149	0.339
B-C	626	0.101	0.256	-	-
C-B	582	0.238	0.238	-	-

The slopes and intercepts shown above include custom intercept adjustments only.

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)	Run automatically
D1	2029DM	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	22	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	35	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	22
	B - Dark Lane	0	0	0
	C - Bell Road (N)	35	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	7	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.002
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.074	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	07:15-07:30	17	17
	07:30-07:45	20	20
	07:45-08:00	24	24
	08:00-08:15	24	24
	08:15-08:30	20	20
	08:30-08:45	17	17
B - Dark Lane	07:15-07:30	0	0
	07:30-07:45	0	0
	07:45-08:00	0	0
	08:00-08:15	0	0
	08:15-08:30	0	0
	08:30-08:45	0	0
C - Bell Road (N)	07:15-07:30	27	29
	07:30-07:45	32	34
	07:45-08:00	39	42
	08:00-08:15	39	42
	08:15-08:30	32	34
	08:30-08:45	27	29

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					35	52
A-B					0	0
A-C					20	31

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	29	7			29				
A-B	0	0			0				
A-C	17	4			17				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	34	9			34				
A-B	0	0			0				
A-C	20	5			20				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	538	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	42	10			42				
A-B	0	0			0				
A-C	24	6			24				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	538	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	42	10			42				
A-B	0	0			0				
A-C	24	6			24				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	34	9			34				
A-B	0	0			0				
A-C	20	5			20				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	29	7			29				
A-B	0	0			0				
A-C	17	4			17				

2029DM, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D2	2029DM	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	14	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	14	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	14
	B - Dark Lane	0	0	0
	C - Bell Road (N)	14	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	3	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.003
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.025	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	16:45-17:00	10	10
	17:00-17:15	12	12
	17:15-17:30	15	15
	17:30-17:45	15	15
	17:45-18:00	12	12
	18:00-18:15	10	10
B - Dark Lane	16:45-17:00	0	0
	17:00-17:15	0	0
	17:15-17:30	0	0
	17:30-17:45	0	0
	17:45-18:00	0	0
	18:00-18:15	0	0
C - Bell Road (N)	16:45-17:00	11	11
	17:00-17:15	13	13
	17:15-17:30	16	16
	17:30-17:45	16	16
	17:45-18:00	13	13
	18:00-18:15	11	11

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					13	20
A-B					0	0
A-C					13	19

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	545	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	11	3			11				
A-B	0	0			0				
A-C	10	3			10				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	13	3			13				
A-B	0	0			0				
A-C	12	3			12				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	16	4			16				
A-B	0	0			0				
A-C	15	4			15				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	16	4			16				
A-B	0	0			0				
A-C	15	4			15				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	13	3			13				
A-B	0	0			0				
A-C	12	3			12				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	545	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	11	3			11				
A-B	0	0			0				
A-C	10	3			10				

2029DS, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D3	2029DS	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	24	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	40	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	24
	B - Dark Lane	0	0	0
	C - Bell Road (N)	40	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	7	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.001	1.002
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.068	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	07:15-07:30	18	18
	07:30-07:45	22	22
	07:45-08:00	27	27
	08:00-08:15	27	27
	08:15-08:30	22	22
	08:30-08:45	18	18
B - Dark Lane	07:15-07:30	0	0
	07:30-07:45	0	0
	07:45-08:00	0	0
	08:00-08:15	0	0
	08:15-08:30	0	0
	08:30-08:45	0	0
C - Bell Road (N)	07:15-07:30	30	32
	07:30-07:45	36	39
	07:45-08:00	44	47
	08:00-08:15	44	47
	08:15-08:30	36	39
	08:30-08:45	30	32

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					39	59
A-B					0	0
A-C					22	34

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	541	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	32	8			32				
A-B	0	0			0				
A-C	18	5			18				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	539	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	39	10			39				
A-B	0	0			0				
A-C	22	5			22				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	537	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	575	0.000	0	0.0	0.0	0.000	A
C-A	47	12			47				
A-B	0	0			0				
A-C	27	7			27				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	537	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	575	0.000	0	0.0	0.0	0.000	A
C-A	47	12			47				
A-B	0	0			0				
A-C	27	7			27				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	539	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	39	10			39				
A-B	0	0			0				
A-C	22	5			22				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	541	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	32	8			32				
A-B	0	0			0				
A-C	18	5			18				

2029DS, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D4	2029DS	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	15	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	20	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	15
	B - Dark Lane	0	0	0
	C - Bell Road (N)	20	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	19	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.003	1.001
	B - Dark Lane	1.004	1.000	1.000
	C - Bell Road (N)	1.194	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	16:45-17:00	11	11
	17:00-17:15	14	14
	17:15-17:30	17	17
	17:30-17:45	17	17
	17:45-18:00	14	14
	18:00-18:15	11	11
B - Dark Lane	16:45-17:00	0	0
	17:00-17:15	0	0
	17:15-17:30	0	0
	17:30-17:45	0	0
	17:45-18:00	0	0
	18:00-18:15	0	0
C - Bell Road (N)	16:45-17:00	15	18
	17:00-17:15	18	21
	17:15-17:30	22	26
	17:30-17:45	22	26
	17:45-18:00	18	21
	18:00-18:15	15	18

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					22	33
A-B					0	0
A-C					14	21

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	18	4			18				
A-B	0	0			0				
A-C	11	3			11				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	21	5			21				
A-B	0	0			0				
A-C	14	3			14				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	26	7			26				
A-B	0	0			0				
A-C	17	4			17				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	26	7			26				
A-B	0	0			0				
A-C	17	4			17				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	21	5			21				
A-B	0	0			0				
A-C	14	3			14				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	18	4			18				
A-B	0	0			0				
A-C	11	3			11				

2029DS_Mitigation, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D5	2029DS_Mitigation	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	24	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	20	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	24
	B - Dark Lane	0	0	0
	C - Bell Road (N)	20	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	1	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.000
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.006	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	07:15-07:30	18	18
	07:30-07:45	22	22
	07:45-08:00	26	26
	08:00-08:15	26	26
	08:15-08:30	22	22
	08:30-08:45	18	18
B - Dark Lane	07:15-07:30	0	0
	07:30-07:45	0	0
	07:45-08:00	0	0
	08:00-08:15	0	0
	08:15-08:30	0	0
	08:30-08:45	0	0
C - Bell Road (N)	07:15-07:30	15	15
	07:30-07:45	18	18
	07:45-08:00	22	22
	08:00-08:15	22	22
	08:15-08:30	18	18
	08:30-08:45	15	15

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					19	28
A-B					0	0
A-C					22	33

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	15	4			15				
A-B	0	0			0				
A-C	18	5			18				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	541	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	18	5			18				
A-B	0	0			0				
A-C	22	5			22				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	575	0.000	0	0.0	0.0	0.000	A
C-A	22	6			22				
A-B	0	0			0				
A-C	26	7			26				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	575	0.000	0	0.0	0.0	0.000	A
C-A	22	6			22				
A-B	0	0			0				
A-C	26	7			26				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	541	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	18	5			18				
A-B	0	0			0				
A-C	22	5			22				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	15	4			15				
A-B	0	0			0				
A-C	18	5			18				

2029DS_Mitigation, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D6	2029DS_Mitigation	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	14	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	11	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	14
	B - Dark Lane	0	0	0
	C - Bell Road (N)	11	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	1	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.004
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.006	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	16:45-17:00	10	10
	17:00-17:15	12	12
	17:15-17:30	15	15
	17:30-17:45	15	15
	17:45-18:00	12	12
	18:00-18:15	10	10
B - Dark Lane	16:45-17:00	0	0
	17:00-17:15	0	0
	17:15-17:30	0	0
	17:30-17:45	0	0
	17:45-18:00	0	0
	18:00-18:15	0	0
C - Bell Road (N)	16:45-17:00	8	8
	17:00-17:15	10	10
	17:15-17:30	12	12
	17:30-17:45	12	12
	17:45-18:00	10	10
	18:00-18:15	8	8

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					10	15
A-B					0	0
A-C					13	19

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	545	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	8	2			8				
A-B	0	0			0				
A-C	10	3			10				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	10	2			10				
A-B	0	0			0				
A-C	12	3			12				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	12	3			12				
A-B	0	0			0				
A-C	15	4			15				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	12	3			12				
A-B	0	0			0				
A-C	15	4			15				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	10	2			10				
A-B	0	0			0				
A-C	12	3			12				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	545	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	8	2			8				
A-B	0	0			0				
A-C	10	3			10				

2039DM, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D7	2039DM	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	25	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	35	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	25
	B - Dark Lane	0	0	0
	C - Bell Road (N)	35	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	9	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.002
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.088	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	07:15-07:30	19	19
	07:30-07:45	22	22
	07:45-08:00	27	28
	08:00-08:15	27	28
	08:15-08:30	22	22
	08:30-08:45	19	19
B - Dark Lane	07:15-07:30	0	0
	07:30-07:45	0	0
	07:45-08:00	0	0
	08:00-08:15	0	0
	08:15-08:30	0	0
	08:30-08:45	0	0
C - Bell Road (N)	07:15-07:30	26	29
	07:30-07:45	31	34
	07:45-08:00	39	42
	08:00-08:15	39	42
	08:15-08:30	31	34
	08:30-08:45	26	29

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					35	52
A-B					0	0
A-C					23	34

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	541	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	29	7			29				
A-B	0	0			0				
A-C	19	5			19				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	34	9			34				
A-B	0	0			0				
A-C	22	6			22				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	538	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	575	0.000	0	0.0	0.0	0.000	A
C-A	42	10			42				
A-B	0	0			0				
A-C	28	7			28				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	538	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	575	0.000	0	0.0	0.0	0.000	A
C-A	42	10			42				
A-B	0	0			0				
A-C	28	7			28				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	34	9			34				
A-B	0	0			0				
A-C	22	6			22				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	541	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	29	7			29				
A-B	0	0			0				
A-C	19	5			19				

2039DM, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D8	2039DM	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	14	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	17	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	14
	B - Dark Lane	0	0	0
	C - Bell Road (N)	17	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	2	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.003
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.024	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	16:45-17:00	11	11
	17:00-17:15	13	13
	17:15-17:30	16	16
	17:30-17:45	16	16
	17:45-18:00	13	13
	18:00-18:15	11	11
B - Dark Lane	16:45-17:00	0	0
	17:00-17:15	0	0
	17:15-17:30	0	0
	17:30-17:45	0	0
	17:45-18:00	0	0
	18:00-18:15	0	0
C - Bell Road (N)	16:45-17:00	13	13
	17:00-17:15	15	15
	17:15-17:30	18	19
	17:30-17:45	18	19
	17:45-18:00	15	15
	18:00-18:15	13	13

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					16	24
A-B					0	0
A-C					13	20

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	545	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	13	3			13				
A-B	0	0			0				
A-C	11	3			11				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	15	4			15				
A-B	0	0			0				
A-C	13	3			13				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	19	5			19				
A-B	0	0			0				
A-C	16	4			16				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	19	5			19				
A-B	0	0			0				
A-C	16	4			16				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	15	4			15				
A-B	0	0			0				
A-C	13	3			13				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	545	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	13	3			13				
A-B	0	0			0				
A-C	11	3			11				

2039DS, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D9	2039DS	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	28	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	43	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	28
	B - Dark Lane	0	0	0
	C - Bell Road (N)	43	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	10	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.003
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.103	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	07:15-07:30	21	21
	07:30-07:45	25	25
	07:45-08:00	30	30
	08:00-08:15	30	30
	08:15-08:30	25	25
	08:30-08:45	21	21
B - Dark Lane	07:15-07:30	0	0
	07:30-07:45	0	0
	07:45-08:00	0	0
	08:00-08:15	0	0
	08:15-08:30	0	0
	08:30-08:45	0	0
C - Bell Road (N)	07:15-07:30	32	36
	07:30-07:45	39	43
	07:45-08:00	48	52
	08:00-08:15	48	52
	08:15-08:30	39	43
	08:30-08:45	32	36

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					44	66
A-B					0	0
A-C					25	38

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	36	9			36				
A-B	0	0			0				
A-C	21	5			21				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	538	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	43	11			43				
A-B	0	0			0				
A-C	25	6			25				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	536	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	574	0.000	0	0.0	0.0	0.000	A
C-A	52	13			52				
A-B	0	0			0				
A-C	30	8			30				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	536	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	574	0.000	0	0.0	0.0	0.000	A
C-A	52	13			52				
A-B	0	0			0				
A-C	30	8			30				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	538	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	43	11			43				
A-B	0	0			0				
A-C	25	6			25				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	36	9			36				
A-B	0	0			0				
A-C	21	5			21				

2039DS, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D10	2039DS	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	17	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	24	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	17
	B - Dark Lane	0	0	0
	C - Bell Road (N)	24	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	17	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.001
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.169	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	16:45-17:00	13	13
	17:00-17:15	15	15
	17:15-17:30	18	18
	17:30-17:45	18	18
	17:45-18:00	15	15
	18:00-18:15	13	13
B - Dark Lane	16:45-17:00	0	0
	17:00-17:15	0	0
	17:15-17:30	0	0
	17:30-17:45	0	0
	17:45-18:00	0	0
	18:00-18:15	0	0
C - Bell Road (N)	16:45-17:00	18	21
	17:00-17:15	22	25
	17:15-17:30	27	31
	17:30-17:45	27	31
	17:45-18:00	22	25
	18:00-18:15	18	21

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					26	39
A-B					0	0
A-C					15	23

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	21	5			21				
A-B	0	0			0				
A-C	13	3			13				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	25	6			25				
A-B	0	0			0				
A-C	15	4			15				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	541	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	31	8			31				
A-B	0	0			0				
A-C	18	5			18				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	541	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	31	8			31				
A-B	0	0			0				
A-C	18	5			18				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	25	6			25				
A-B	0	0			0				
A-C	15	4			15				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	21	5			21				
A-B	0	0			0				
A-C	13	3			13				

2039DS_Mitigation, AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D11	2039DS_Mitigation	AM	ONE HOUR	07:15	08:45	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	27	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	22	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	27
	B - Dark Lane	0	0	0
	C - Bell Road (N)	22	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	1	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.004
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.009	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	07:15-07:30	20	20
	07:30-07:45	24	24
	07:45-08:00	30	30
	08:00-08:15	30	30
	08:15-08:30	24	24
	08:30-08:45	20	20
B - Dark Lane	07:15-07:30	0	0
	07:30-07:45	0	0
	07:45-08:00	0	0
	08:00-08:15	0	0
	08:15-08:30	0	0
	08:30-08:45	0	0
C - Bell Road (N)	07:15-07:30	17	17
	07:30-07:45	20	20
	07:45-08:00	24	25
	08:00-08:15	24	25
	08:15-08:30	20	20
	08:30-08:45	17	17

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					20	31
A-B					0	0
A-C					25	37

Main Results for each time segment

07:15 - 07:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	17	4			17				
A-B	0	0			0				
A-C	20	5			20				

07:30 - 07:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	20	5			20				
A-B	0	0			0				
A-C	24	6			24				

07:45 - 08:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	539	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	575	0.000	0	0.0	0.0	0.000	A
C-A	25	6			25				
A-B	0	0			0				
A-C	30	7			30				

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	539	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	575	0.000	0	0.0	0.0	0.000	A
C-A	25	6			25				
A-B	0	0			0				
A-C	30	7			30				

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	540	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	576	0.000	0	0.0	0.0	0.000	A
C-A	20	5			20				
A-B	0	0			0				
A-C	24	6			24				

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	542	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	577	0.000	0	0.0	0.0	0.000	A
C-A	17	4			17				
A-B	0	0			0				
A-C	20	5			20				

2039DS_Mitigation, PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Major arm width	C - Bell Road (N) - Major arm geometry	For two-way major roads, please interpret results with caution if the total major carriageway width is less than 6m.

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
J11b	Bell Road/ Dark Lane	T-Junction	Two-way	Two-way	Two-way		0.00	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	0.00	A

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)	Run automatically
D12	2039DS_Mitigation	PM	ONE HOUR	16:45	18:15	15	✓

Vehicle mix varies over turn	Vehicle mix varies over entry	Vehicle mix source	PCU Factor for a HV (PCU)
✓	✓	HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Bell Road (S)		ONE HOUR	✓	16	100.000
B - Dark Lane		ONE HOUR	✓	0	100.000
C - Bell Road (N)		ONE HOUR	✓	12	100.000

Origin-Destination Data

Demand (Veh/hr)

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	16
	B - Dark Lane	0	0	0
	C - Bell Road (N)	12	0	0

Proportions

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0.00	0.00	1.00
	B - Dark Lane	0.33	0.33	0.33
	C - Bell Road (N)	1.00	0.00	0.00

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	0	0	0
	B - Dark Lane	0	0	0
	C - Bell Road (N)	1	0	0

Average PCU Per Veh

		To		
		A - Bell Road (S)	B - Dark Lane	C - Bell Road (N)
From	A - Bell Road (S)	1.000	1.000	1.004
	B - Dark Lane	1.000	1.000	1.000
	C - Bell Road (N)	1.005	1.000	1.000

Detailed Demand Data

Demand for each time segment

Arm	Time Segment	Demand (Veh/hr)	Demand in PCU (PCU/hr)
A - Bell Road (S)	16:45-17:00	12	12
	17:00-17:15	14	14
	17:15-17:30	17	17
	17:30-17:45	17	17
	17:45-18:00	14	14
	18:00-18:15	12	12
B - Dark Lane	16:45-17:00	0	0
	17:00-17:15	0	0
	17:15-17:30	0	0
	17:30-17:45	0	0
	17:45-18:00	0	0
	18:00-18:15	0	0
C - Bell Road (N)	16:45-17:00	9	9
	17:00-17:15	11	11
	17:15-17:30	13	14
	17:30-17:45	13	14
	17:45-18:00	11	11
	18:00-18:15	9	9

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
B-AC	0.00	0.00	0.0	A	0	0
C-AB	0.00	0.00	0.0	A	0	0
C-A					11	17
A-B					0	0
A-C					14	21

Main Results for each time segment

16:45 - 17:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	545	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	9	2			9				
A-B	0	0			0				
A-C	12	3			12				

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	11	3			11				
A-B	0	0			0				
A-C	14	4			14				

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	14	3			14				
A-B	0	0			0				
A-C	17	4			17				

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	543	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	14	3			14				
A-B	0	0			0				
A-C	17	4			17				

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	544	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	578	0.000	0	0.0	0.0	0.000	A
C-A	11	3			11				
A-B	0	0			0				
A-C	14	4			14				

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
B-AC	0	0	545	0.000	0	0.0	0.0	0.000	A
C-AB	0	0	579	0.000	0	0.0	0.0	0.000	A
C-A	9	2			9				
A-B	0	0			0				
A-C	12	3			12				