Junctions 11

ARCADY 11 - Roundabout Module

Version: 11.1.0.2307

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Summary of junction performance

	AM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	AM Base - 2019 - Base					
1 - A20 (N)	A1 D1	0,7	2,34	0,40	A	22 % [2 - M26 Off-Slip (E)]
2 - M26 Off-Slip (E)		1,8	5,02	0,63	A	
3 - A20 (S)		1,3	4,34	0,55	A	
4 - M26 Off-Slip (w)		0,2	5,04	0,18	A	

	PM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	PM Base - 2019 - Base					
1 - A20 (N)	A2 D2	0,9	2,70	0,47	A	52 % [4 - M26 Off-Slip (w)]
2 - M26 Off-Slip (E)		0,4	2,55	0,29	A	
3 - A20 (S)		0,9	2,91	0,46	A	
4 - M26 Off-Slip (w)		0,3	3,43	0,20	A	

	AM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	AM Future Base - 2040 - Future Base					
1 - A20 (N)	A3 D3	0,7	2,35	0,42	A	13 % [2 - M26 Off-Slip (E)]
2 - M26 Off-Slip (E)		2,7	6,05	0,71	A	
3 - A20 (S)		1,8	6,25	0,63	A	
4 - M26 Off-Slip (w)		0,3	6,75	0,22	A	

	PM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	PM Future Base - 2040 - Future Base					
1 - A20 (N)	A4 D4	1,2	3,32	0,55	A	26 % [4 - M26 Off-Slip (w)]
2 - M26 Off-Slip (E)		0,6	2,74	0,37	A	
3 - A20 (S)		1,2	3,57	0,53	A	
4 - M26 Off-Slip (w)		0,6	5,73	0,36	A	

	AM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	AM LP Test - 2040 - LP test 2					
1 - A20 (N)	A5 D5	0,8	2,53	0,44	A	5 % [3 - A20 (S)]
2 - M26 Off-Slip (E)		3,4	7,15	0,76	A	
3 - A20 (S)		3,3	10,30	0,76	B	
4 - M26 Off-Slip (w)		0,5	12,59	0,34	B	

	PM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	PM LP Test - 2040 - LP test 2					
1 - A20 (N)	A6 D6	1,7	4,36	0,62	A	13 % [4 - M26 Off-Slip (w)]
2 - M26 Off-Slip (E)		0,9	3,57	0,48	A	
3 - A20 (S)		1,5	4,41	0,60	A	
4 - M26 Off-Slip (w)		1,0	8,53	0,50	A	

	AM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	AM LP High - 2040 - T&M LP_High					
1 - A20 (N)	A7 D7	0,8	2,67	0,44	A	9 % [3 - A20 (S)]
2 - M26 Off-Slip (E)		1,7	4,44	0,61	A	
3 - A20 (S)		3,0	7,95	0,73	A	
4 - M26 Off-Slip (w)		0,7	13,73	0,39	B	

	PM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	PM LP High - 2040 - T&M LP_High					
1 - A20 (N)	A8 D8	3,5	8,17	0,78	A	-1 % [4 - M26 Off-Slip (w)]
2 - M26 Off-Slip (E)		2,2	6,32	0,68	A	
3 - A20 (S)		2,5	6,80	0,70	A	
4 - M26 Off-Slip (w)		5,3	53,49	0,86	F	

	AM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	AM Forecast BL - 2042 - Forecast Baseline					
1 - A20 (N)	A9 D9	0,8	2,70	0,44	A	18 % [4 - M26 Off-Slip (w)]
2 - M26 Off-Slip (E)		1,9	5,29	0,64	A	
3 - A20 (S)		1,9	5,95	0,64	A	
4 - M26 Off-Slip (w)		0,6	9,46	0,33	A	

	PM					
	Set ID	Queue (PCU)	Delay (s)	RFC	LOS	Network Residual Capacity
	PM Forecast BL - 2042 - Forecast Baseline					
1 - A20 (N)	A10 D10	2,0	5,21	0,66	A	15 % [4 - M26 Off-Slip (w)]
2 - M26 Off-Slip (E)		1,0	3,68	0,49	A	
3 - A20 (S)		1,5	4,31	0,59	A	
4 - M26 Off-Slip (w)		0,9	8,70	0,46	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. Network Residual Capacity indicates the amount by which network flow could be increased before a user-definable threshold (see Analysis Options) is met.

File summary

File Description

Title	J2 m26 J2a
Location	
Site number	
Date	26.07.2024
Version	
Status	
Identifier	
Client	
Jobnumber	
Enumerator	JEGINTL\siudzis
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	PCU	PCU	perHour	s	-Min	perMin

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	Residual capacity criteria type	RFC Threshold	Average Delay threshold (s)	Queue threshold (PCU)	Use simulation for HCM roundabouts	Use iterations for HCM roundabouts
5,75					✓	RFC/DOS	0,85	36,00	20,00		

Demand Set Summary

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D1	2019	Base	AM	ONE HOUR	08:00	09:30	15	✓
D2	2019	Base	PM	ONE HOUR	15:00	16:30	15	✓
D3	2040	Future Base	AM	ONE HOUR	08:00	09:30	15	✓
D4	2040	Future Base	PM	ONE HOUR	15:00	16:30	15	✓
D5	2040	LP test 2	AM	ONE HOUR	08:00	09:30	15	✓
D6	2040	LP test 2	PM	ONE HOUR	15:00	16:30	15	✓
D7	2040	T&M LP_High	AM	ONE HOUR	08:00	09:30	15	✓
D8	2040	T&M LP_High	PM	ONE HOUR	15:00	16:30	15	✓
D9	2042	Forecast Baseline	AM	ONE HOUR	08:00	09:30	15	✓
D10	2042	Forecast Baseline	PM	ONE HOUR	15:00	16:30	15	✓

AM Base - D1 - 2019 | Base | AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A1	AM Base	✓	✓	D1	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	4,04	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	22	2 - M26 Off-Slip (E)	4,04	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Arm Capacity Adjustments

Arm	Type	Reason	Percentage capacity adjustment (%)
1 - A20 (N)	Percentage		94,00
4 - M26 Off-Slip (w)	Percentage		92,00

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D1	2019	Base	AM	ONE HOUR	08:00	09:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	936	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	1190	100,000
3 - A20 (S)		ONE HOUR	✓	951	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	147	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	11	336	503	86
	2 - M26 Off-Slip (E)	677	0	513	0
	3 - A20 (S)	625	218	2	106
	4 - M26 Off-Slip (w)	52	0	95	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	5	0	3
	2 - M26 Off-Slip (E)	7	0	12	6
	3 - A20 (S)	0	26	0	0
	4 - M26 Off-Slip (w)	7	6	5	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,40	2,34	0,7	A	859	1288
2 - M26 Off-Slip (E)	0,63	5,02	1,8	A	1092	1638
3 - A20 (S)	0,55	4,34	1,3	A	873	1309
4 - M26 Off-Slip (w)	0,18	5,04	0,2	A	135	202

Main Results for each time segment

08:00 - 08:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	705	176	236	2732	0,258	703	1025	0,0	0,4	1,810	A
2 - M26 Off-Slip (E)	896	224	524	2368	0,378	893	416	0,0	0,7	2,658	A
3 - A20 (S)	716	179	581	2229	0,321	714	836	0,0	0,5	2,491	A
4 - M26 Off-Slip (w)	111	28	1151	1524	0,073	110	144	0,0	0,1	2,691	A

08:15 - 08:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	841	210	283	2677	0,314	841	1226	0,4	0,5	2,000	A
2 - M26 Off-Slip (E)	1070	267	626	2252	0,475	1069	498	0,7	1,0	3,316	A
3 - A20 (S)	855	214	695	2098	0,407	854	1000	0,5	0,7	3,036	A
4 - M26 Off-Slip (w)	132	33	1377	1269	0,104	132	172	0,1	0,1	3,345	A

08:30 - 08:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1031	258	346	2603	0,396	1030	1499	0,5	0,7	2,332	A
2 - M26 Off-Slip (E)	1310	328	767	2093	0,626	1307	609	1,0	1,8	4,978	A
3 - A20 (S)	1047	262	850	1921	0,545	1045	1223	0,7	1,2	4,304	A
4 - M26 Off-Slip (w)	162	40	1684	922	0,176	161	211	0,1	0,2	5,004	A

08:45 - 09:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1031	258	347	2602	0,396	1031	1503	0,7	0,7	2,336	A
2 - M26 Off-Slip (E)	1310	328	767	2092	0,626	1310	610	1,8	1,8	5,025	A
3 - A20 (S)	1047	262	852	1918	0,546	1047	1225	1,2	1,3	4,336	A
4 - M26 Off-Slip (w)	162	40	1688	917	0,176	162	211	0,2	0,2	5,035	A

09:00 - 09:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	841	210	284	2676	0,314	842	1231	0,7	0,5	2,003	A
2 - M26 Off-Slip (E)	1070	267	627	2251	0,475	1073	499	1,8	1,0	3,346	A
3 - A20 (S)	855	214	698	2095	0,408	857	1003	1,3	0,7	3,056	A
4 - M26 Off-Slip (w)	132	33	1382	1263	0,105	133	173	0,2	0,1	3,365	A

09:15 - 09:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	705	176	237	2731	0,258	705	1029	0,5	0,4	1,815	A
2 - M26 Off-Slip (E)	896	224	525	2366	0,379	897	417	1,0	0,7	2,677	A
3 - A20 (S)	716	179	584	2226	0,322	717	839	0,7	0,5	2,507	A
4 - M26 Off-Slip (w)	111	28	1156	1519	0,073	111	145	0,1	0,1	2,702	A

PM Base - D2 - 2019 | Base | PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A2	PM Base	✓	✓	D2	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	2,80	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	52	4 - M26 Off-Slip (w)	2,80	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D2	2019	Base	PM	ONE HOUR	15:00	16:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	1121	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	554	100,000
3 - A20 (S)		ONE HOUR	✓	986	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	253	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	548	523	50
	2 - M26 Off-Slip (E)	357	0	197	0
	3 - A20 (S)	577	313	2	94
	4 - M26 Off-Slip (w)	145	0	108	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	100	8	0	3
	2 - M26 Off-Slip (E)	5	0	8	6
	3 - A20 (S)	0	15	0	4
	4 - M26 Off-Slip (w)	6	12	4	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,47	2,70	0,9	A	1029	1543
2 - M26 Off-Slip (E)	0,29	2,55	0,4	A	508	763
3 - A20 (S)	0,46	2,91	0,9	A	905	1357
4 - M26 Off-Slip (w)	0,20	3,43	0,3	A	232	348

Main Results for each time segment

15:00 - 15:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	844	211	318	2805	0,301	842	810	0,0	0,4	1,903	A
2 - M26 Off-Slip (E)	417	104	513	2380	0,175	416	647	0,0	0,2	1,943	A
3 - A20 (S)	742	186	306	2544	0,292	741	624	0,0	0,4	2,089	A
4 - M26 Off-Slip (w)	190	48	938	1918	0,099	190	108	0,0	0,1	2,190	A

15:15 - 15:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1008	252	380	2727	0,370	1007	969	0,4	0,6	2,174	A
2 - M26 Off-Slip (E)	498	125	614	2266	0,220	498	774	0,2	0,3	2,158	A
3 - A20 (S)	886	222	366	2475	0,358	886	746	0,4	0,6	2,372	A
4 - M26 Off-Slip (w)	227	57	1122	1692	0,134	227	129	0,1	0,2	2,583	A

15:30 - 15:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1234	309	465	2621	0,471	1233	1187	0,6	0,9	2,692	A
2 - M26 Off-Slip (E)	610	152	751	2110	0,289	609	947	0,3	0,4	2,544	A
3 - A20 (S)	1086	271	448	2381	0,456	1084	913	0,6	0,9	2,904	A
4 - M26 Off-Slip (w)	279	70	1374	1383	0,201	278	158	0,2	0,3	3,426	A

15:45 - 16:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1234	309	466	2620	0,471	1234	1188	0,9	0,9	2,698	A
2 - M26 Off-Slip (E)	610	152	752	2109	0,289	610	948	0,4	0,4	2,545	A
3 - A20 (S)	1086	271	448	2381	0,456	1086	914	0,9	0,9	2,910	A
4 - M26 Off-Slip (w)	279	70	1375	1381	0,202	279	159	0,3	0,3	3,431	A

16:00 - 16:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1008	252	381	2726	0,370	1009	971	0,9	0,6	2,181	A
2 - M26 Off-Slip (E)	498	125	615	2265	0,220	499	775	0,4	0,3	2,161	A
3 - A20 (S)	886	222	366	2474	0,358	888	747	0,9	0,6	2,377	A
4 - M26 Off-Slip (w)	227	57	1124	1690	0,135	228	130	0,3	0,2	2,589	A

16:15 - 16:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	844	211	319	2804	0,301	845	813	0,6	0,4	1,908	A
2 - M26 Off-Slip (E)	417	104	515	2378	0,175	417	649	0,3	0,2	1,946	A
3 - A20 (S)	742	186	307	2543	0,292	743	625	0,6	0,4	2,095	A
4 - M26 Off-Slip (w)	190	48	941	1915	0,099	191	108	0,2	0,1	2,195	A

AM Future Base - D3 - 2040 | Future Base | AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A3	AM Future Base	✓	✓	D3	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	5,07	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	13	2 - M26 Off-Slip (E)	5,07	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D3	2040	Future Base	AM	ONE HOUR	08:00	09:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	1035	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	1457	100,000
3 - A20 (S)		ONE HOUR	✓	957	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	144	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	11	539	371	114
	2 - M26 Off-Slip (E)	848	0	610	0
	3 - A20 (S)	589	283	2	82
	4 - M26 Off-Slip (w)	68	0	76	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	4	0	3
	2 - M26 Off-Slip (E)	7	0	9	6
	3 - A20 (S)	0	22	0	14
	4 - M26 Off-Slip (w)	7	6	6	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,42	2,35	0,7	A	949	1424
2 - M26 Off-Slip (E)	0,71	6,05	2,7	A	1337	2006
3 - A20 (S)	0,63	6,25	1,8	A	878	1317
4 - M26 Off-Slip (w)	0,22	6,75	0,3	A	132	199

Main Results for each time segment

08:00 - 08:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	779	195	271	2863	0,272	777	1138	0,0	0,4	1,767	A
2 - M26 Off-Slip (E)	1097	274	431	2473	0,444	1094	618	0,0	0,9	2,807	A
3 - A20 (S)	720	180	730	2058	0,350	718	795	0,0	0,6	2,865	A
4 - M26 Off-Slip (w)	109	27	1301	1473	0,074	108	147	0,0	0,1	2,809	A

08:15 - 08:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	930	233	325	2796	0,333	930	1361	0,4	0,5	1,974	A
2 - M26 Off-Slip (E)	1310	327	516	2377	0,551	1308	739	0,9	1,3	3,625	A
3 - A20 (S)	860	215	873	1894	0,454	859	951	0,6	0,9	3,709	A
4 - M26 Off-Slip (w)	130	32	1556	1159	0,112	129	176	0,1	0,1	3,722	A

08:30 - 08:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1139	285	397	2706	0,421	1138	1663	0,5	0,7	2,349	A
2 - M26 Off-Slip (E)	1604	401	631	2246	0,714	1599	904	1,3	2,6	5,951	A
3 - A20 (S)	1054	263	1068	1672	0,630	1050	1163	0,9	1,8	6,148	A
4 - M26 Off-Slip (w)	159	40	1902	734	0,216	158	216	0,1	0,3	6,651	A

08:45 - 09:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1139	285	398	2704	0,421	1139	1669	0,7	0,7	2,354	A
2 - M26 Off-Slip (E)	1604	401	632	2245	0,715	1604	905	2,6	2,7	6,054	A
3 - A20 (S)	1054	263	1071	1668	0,632	1054	1166	1,8	1,8	6,252	A
4 - M26 Off-Slip (w)	159	40	1908	726	0,219	159	216	0,3	0,3	6,754	A

09:00 - 09:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	930	233	327	2794	0,333	931	1368	0,7	0,5	1,980	A
2 - M26 Off-Slip (E)	1310	327	517	2376	0,551	1315	741	2,7	1,3	3,677	A
3 - A20 (S)	860	215	878	1889	0,455	864	955	1,8	0,9	3,765	A
4 - M26 Off-Slip (w)	130	32	1565	1148	0,113	130	177	0,3	0,1	3,766	A

09:15 - 09:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	779	195	273	2861	0,272	779	1143	0,5	0,4	1,773	A
2 - M26 Off-Slip (E)	1097	274	433	2471	0,444	1099	620	1,3	0,9	2,831	A
3 - A20 (S)	720	180	733	2054	0,351	722	798	0,9	0,6	2,888	A
4 - M26 Off-Slip (w)	109	27	1307	1465	0,074	109	148	0,1	0,1	2,826	A

PM Future Base - D4 - 2040 | Future Base | PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A4	PM Future Base	✓	✓	D4	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	3,51	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	26	4 - M26 Off-Slip (w)	3,51	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	I' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Arm Capacity Adjustments

Arm	Type	Reason	Percentage capacity adjustment (%)
4 - M26 Off-Slip (w)	Percentage		92,00

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D4	2040	Future Base	PM	ONE HOUR	15:00	16:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	1206	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	745	100,000
3 - A20 (S)		ONE HOUR	✓	1083	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	327	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	709	436	61
	2 - M26 Off-Slip (E)	449	0	296	0
	3 - A20 (S)	550	456	2	76
	4 - M26 Off-Slip (w)	211	0	117	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	100	0	0	3
	2 - M26 Off-Slip (E)	4	0	5	6
	3 - A20 (S)	0	12	0	5
	4 - M26 Off-Slip (w)	5	2	2	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,55	3,32	1,2	A	1106	1660
2 - M26 Off-Slip (E)	0,37	2,74	0,6	A	684	1025
3 - A20 (S)	0,53	3,57	1,2	A	994	1491
4 - M26 Off-Slip (w)	0,36	5,73	0,6	A	300	451

Main Results for each time segment

15:00 - 15:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	908	227	431	2663	0,341	906	908	0,0	0,5	2,050	A
2 - M26 Off-Slip (E)	561	140	463	2437	0,230	560	875	0,0	0,3	2,000	A
3 - A20 (S)	816	204	383	2455	0,332	813	639	0,0	0,5	2,301	A
4 - M26 Off-Slip (w)	246	62	1094	1589	0,155	246	103	0,0	0,2	2,783	A

15:15 - 15:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1084	271	516	2558	0,424	1083	1086	0,5	0,7	2,444	A
2 - M26 Off-Slip (E)	670	167	553	2335	0,287	669	1046	0,3	0,4	2,256	A
3 - A20 (S)	974	243	458	2369	0,411	973	764	0,5	0,7	2,708	A
4 - M26 Off-Slip (w)	294	74	1308	1347	0,219	294	123	0,2	0,3	3,554	A

15:30 - 15:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1328	332	631	2413	0,550	1326	1329	0,7	1,2	3,309	A
2 - M26 Off-Slip (E)	820	205	677	2194	0,374	819	1280	0,4	0,6	2,732	A
3 - A20 (S)	1193	298	561	2251	0,530	1191	935	0,7	1,2	3,561	A
4 - M26 Off-Slip (w)	360	90	1601	1015	0,355	359	151	0,3	0,6	5,695	A

15:45 - 16:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1328	332	633	2412	0,550	1328	1331	1,2	1,2	3,323	A
2 - M26 Off-Slip (E)	820	205	678	2193	0,374	820	1282	0,6	0,6	2,737	A
3 - A20 (S)	1193	298	562	2251	0,530	1193	937	1,2	1,2	3,574	A
4 - M26 Off-Slip (w)	360	90	1603	1013	0,356	360	151	0,6	0,6	5,733	A

16:00 - 16:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1084	271	518	2555	0,424	1086	1089	1,2	0,7	2,458	A
2 - M26 Off-Slip (E)	670	167	555	2333	0,287	671	1049	0,6	0,4	2,261	A
3 - A20 (S)	974	243	459	2368	0,411	976	766	1,2	0,7	2,719	A
4 - M26 Off-Slip (w)	294	74	1311	1343	0,219	295	124	0,6	0,3	3,573	A

16:15 - 16:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	908	227	433	2661	0,341	909	911	0,7	0,5	2,058	A
2 - M26 Off-Slip (E)	561	140	464	2436	0,230	561	878	0,4	0,3	2,006	A
3 - A20 (S)	816	204	384	2454	0,332	816	641	0,7	0,5	2,311	A
4 - M26 Off-Slip (w)	246	62	1097	1585	0,156	247	103	0,3	0,2	2,798	A

AM LP Test - D5 - 2040 | LP test 2 | AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A5	AM LP Test	✓	✓	D5	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	6,96	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	5	3 - A20 (S)	6,96	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D5	2040	LP test 2	AM	ONE HOUR	08:00	09:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	1054	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	1556	100,000
3 - A20 (S)		ONE HOUR	✓	1062	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	144	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	11	557	362	123
	2 - M26 Off-Slip (E)	943	0	613	0
	3 - A20 (S)	628	345	2	87
	4 - M26 Off-Slip (w)	67	0	77	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	4	0	3
	2 - M26 Off-Slip (E)	4	0	8	6
	3 - A20 (S)	0	16	0	10
	4 - M26 Off-Slip (w)	7	6	6	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,44	2,53	0,8	A	967	1451
2 - M26 Off-Slip (E)	0,76	7,15	3,4	A	1428	2142
3 - A20 (S)	0,76	10,30	3,3	B	974	1461
4 - M26 Off-Slip (w)	0,34	12,59	0,5	B	132	198

Main Results for each time segment

08:00 - 08:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	793	198	318	2805	0,283	792	1237	0,0	0,4	1,829	A
2 - M26 Off-Slip (E)	1172	293	432	2472	0,474	1168	677	0,0	0,9	2,905	A
3 - A20 (S)	799	200	809	1968	0,406	796	791	0,0	0,7	3,233	A
4 - M26 Off-Slip (w)	108	27	1447	1293	0,084	108	158	0,0	0,1	3,234	A

08:15 - 08:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	947	237	380	2727	0,347	947	1480	0,4	0,5	2,071	A
2 - M26 Off-Slip (E)	1399	350	517	2376	0,589	1397	810	0,9	1,5	3,872	A
3 - A20 (S)	954	239	967	1787	0,534	953	946	0,7	1,2	4,543	A
4 - M26 Off-Slip (w)	129	32	1731	944	0,137	129	189	0,1	0,2	4,699	A

08:30 - 08:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1160	290	463	2624	0,442	1159	1806	0,5	0,8	2,517	A
2 - M26 Off-Slip (E)	1714	428	632	2245	0,763	1706	990	1,5	3,3	6,960	A
3 - A20 (S)	1169	292	1182	1541	0,758	1161	1157	1,2	3,2	9,794	A
4 - M26 Off-Slip (w)	158	40	2112	476	0,332	157	231	0,2	0,5	11,955	B

08:45 - 09:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1160	290	466	2620	0,443	1160	1815	0,8	0,8	2,526	A
2 - M26 Off-Slip (E)	1714	428	633	2244	0,764	1713	993	3,3	3,4	7,154	A
3 - A20 (S)	1169	292	1186	1536	0,761	1169	1160	3,2	3,3	10,302	B
4 - M26 Off-Slip (w)	158	40	2123	462	0,342	158	232	0,5	0,5	12,590	B

09:00 - 09:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	947	237	384	2722	0,348	949	1492	0,8	0,5	2,081	A
2 - M26 Off-Slip (E)	1399	350	519	2374	0,589	1406	814	3,4	1,5	3,955	A
3 - A20 (S)	954	239	973	1780	0,536	963	952	3,3	1,2	4,693	A
4 - M26 Off-Slip (w)	129	32	1746	926	0,139	131	190	0,5	0,2	4,829	A

09:15 - 09:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	793	198	320	2803	0,283	794	1244	0,5	0,4	1,838	A
2 - M26 Off-Slip (E)	1172	293	434	2470	0,474	1174	680	1,5	1,0	2,935	A
3 - A20 (S)	799	200	813	1964	0,407	801	795	1,2	0,7	3,275	A
4 - M26 Off-Slip (w)	108	27	1455	1283	0,084	108	159	0,2	0,1	3,263	A

PM LP Test - D6 - 2040 | LP test 2 | PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A6	PM LP Test	✓	✓	D6	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	4,63	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	13	4 - M26 Off-Slip (w)	4,63	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D6	2040	LP test 2	PM	ONE HOUR	15:00	16:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	1298	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	865	100,000
3 - A20 (S)		ONE HOUR	✓	1143	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	392	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	706	527	64
	2 - M26 Off-Slip (E)	565	0	299	0
	3 - A20 (S)	577	484	2	80
	4 - M26 Off-Slip (w)	212	0	180	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	100	7	0	3
	2 - M26 Off-Slip (E)	3	0	5	6
	3 - A20 (S)	0	7	0	5
	4 - M26 Off-Slip (w)	5	12	2	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,62	4,36	1,7	A	1191	1786
2 - M26 Off-Slip (E)	0,48	3,57	0,9	A	793	1190
3 - A20 (S)	0,60	4,41	1,5	A	1049	1573
4 - M26 Off-Slip (w)	0,50	8,53	1,0	A	360	540

Main Results for each time segment

15:00 - 15:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	977	244	500	2578	0,379	974	1017	0,0	0,6	2,324	A
2 - M26 Off-Slip (E)	651	163	581	2303	0,283	649	893	0,0	0,4	2,254	A
3 - A20 (S)	861	215	473	2352	0,366	858	757	0,0	0,6	2,482	A
4 - M26 Off-Slip (w)	295	74	1222	1569	0,188	294	108	0,0	0,2	2,925	A

15:15 - 15:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1167	292	598	2456	0,475	1165	1216	0,6	0,9	2,894	A
2 - M26 Off-Slip (E)	777	194	695	2174	0,357	777	1068	0,4	0,6	2,668	A
3 - A20 (S)	1028	257	566	2246	0,457	1026	906	0,6	0,9	3,042	A
4 - M26 Off-Slip (w)	352	88	1462	1274	0,277	352	130	0,2	0,4	4,040	A

15:30 - 15:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1429	357	731	2290	0,624	1426	1488	0,9	1,7	4,311	A
2 - M26 Off-Slip (E)	952	238	849	1999	0,476	950	1307	0,6	0,9	3,555	A
3 - A20 (S)	1258	315	692	2102	0,599	1256	1107	0,9	1,5	4,380	A
4 - M26 Off-Slip (w)	432	108	1789	873	0,495	429	159	0,4	1,0	8,368	A

15:45 - 16:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1429	357	733	2287	0,625	1429	1491	1,7	1,7	4,355	A
2 - M26 Off-Slip (E)	952	238	852	1996	0,477	952	1310	0,9	0,9	3,573	A
3 - A20 (S)	1258	315	693	2100	0,599	1258	1110	1,5	1,5	4,413	A
4 - M26 Off-Slip (w)	432	108	1793	868	0,497	432	159	1,0	1,0	8,535	A

16:00 - 16:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1167	292	601	2452	0,476	1170	1221	1,7	0,9	2,921	A
2 - M26 Off-Slip (E)	777	194	698	2171	0,358	779	1072	0,9	0,6	2,685	A
3 - A20 (S)	1028	257	567	2245	0,458	1030	909	1,5	0,9	3,065	A
4 - M26 Off-Slip (w)	352	88	1467	1268	0,278	355	130	1,0	0,4	4,095	A

16:15 - 16:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	977	244	502	2575	0,379	978	1021	0,9	0,6	2,342	A
2 - M26 Off-Slip (E)	651	163	583	2301	0,283	652	897	0,6	0,4	2,264	A
3 - A20 (S)	861	215	475	2350	0,366	862	760	0,9	0,6	2,496	A
4 - M26 Off-Slip (w)	295	74	1227	1563	0,189	296	109	0,4	0,2	2,946	A

AM LP High - D7 - 2040 | T&M LP_High | AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A7	AM LP High	✓	✓	D7	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	5,59	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	9	3 - A20 (S)	5,59	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Arm Capacity Adjustments

Arm	Type	Reason	Percentage capacity adjustment (%)
4 - M26 Off-Slip (w)	Percentage		86,00

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D7	2040	T&M LP_High	AM	ONE HOUR	08:00	09:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	998	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	1266	100,000
3 - A20 (S)		ONE HOUR	✓	1249	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	174	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	567	346	85
	2 - M26 Off-Slip (E)	723	0	543	0
	3 - A20 (S)	739	386	0	124
	4 - M26 Off-Slip (w)	54	0	120	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	3	8	2
	2 - M26 Off-Slip (E)	7	0	11	0
	3 - A20 (S)	8	16	0	11
	4 - M26 Off-Slip (w)	20	0	12	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,44	2,67	0,8	A	916	1374
2 - M26 Off-Slip (E)	0,61	4,44	1,7	A	1162	1743
3 - A20 (S)	0,73	7,95	3,0	A	1146	1719
4 - M26 Off-Slip (w)	0,39	13,73	0,7	B	160	239

Main Results for each time segment

08:00 - 08:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	751	188	380	2728	0,275	750	1138	0,0	0,4	1,901	A
2 - M26 Off-Slip (E)	953	238	414	2493	0,382	950	716	0,0	0,7	2,532	A
3 - A20 (S)	940	235	607	2199	0,428	937	758	0,0	0,8	3,148	A
4 - M26 Off-Slip (w)	131	33	1387	1176	0,111	130	157	0,0	0,1	3,937	A

08:15 - 08:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	897	224	454	2635	0,341	897	1361	0,4	0,5	2,166	A
2 - M26 Off-Slip (E)	1138	285	495	2401	0,474	1137	856	0,7	1,0	3,092	A
3 - A20 (S)	1123	281	726	2063	0,544	1121	906	0,8	1,3	4,219	A
4 - M26 Off-Slip (w)	156	39	1659	888	0,176	156	188	0,1	0,2	5,621	A

08:30 - 08:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1099	275	554	2510	0,438	1098	1663	0,5	0,8	2,665	A
2 - M26 Off-Slip (E)	1394	348	605	2276	0,612	1391	1047	1,0	1,7	4,407	A
3 - A20 (S)	1375	344	888	1878	0,732	1369	1108	1,3	2,9	7,730	A
4 - M26 Off-Slip (w)	192	48	2027	499	0,384	190	229	0,2	0,7	13,238	B

08:45 - 09:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1099	275	557	2506	0,438	1099	1669	0,8	0,8	2,674	A
2 - M26 Off-Slip (E)	1394	348	607	2274	0,613	1394	1049	1,7	1,7	4,444	A
3 - A20 (S)	1375	344	890	1876	0,733	1375	1111	2,9	3,0	7,946	A
4 - M26 Off-Slip (w)	192	48	2034	491	0,390	191	230	0,7	0,7	13,726	B

09:00 - 09:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	897	224	458	2630	0,341	898	1369	0,8	0,5	2,175	A
2 - M26 Off-Slip (E)	1138	285	497	2398	0,475	1141	859	1,7	1,0	3,120	A
3 - A20 (S)	1123	281	728	2060	0,545	1129	910	3,0	1,3	4,310	A
4 - M26 Off-Slip (w)	156	39	1669	878	0,178	158	189	0,7	0,3	5,738	A

09:15 - 09:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	751	188	382	2725	0,276	752	1143	0,5	0,4	1,911	A
2 - M26 Off-Slip (E)	953	238	415	2491	0,383	954	718	1,0	0,7	2,549	A
3 - A20 (S)	940	235	609	2197	0,428	942	761	1,3	0,8	3,180	A
4 - M26 Off-Slip (w)	131	33	1394	1168	0,112	131	158	0,3	0,1	3,974	A

PM LP High - D8 - 2040 | T&M LP_High | PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A8	PM LP High	✓	✓	D8	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	11,08	B

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	-1	4 - M26 Off-Slip (w)	11,08	B

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Arm Capacity Adjustments

Arm	Type	Reason	Percentage capacity adjustment (%)
4 - M26 Off-Slip (w)	Percentage		81,00

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D8	2040	T&M LP_High	PM	ONE HOUR	15:00	16:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	1433	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	1158	100,000
3 - A20 (S)		ONE HOUR	✓	1195	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	349	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	4	807	573	49
	2 - M26 Off-Slip (E)	750	0	408	0
	3 - A20 (S)	513	597	0	85
	4 - M26 Off-Slip (w)	93	0	256	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	4	3	4
	2 - M26 Off-Slip (E)	2	0	6	0
	3 - A20 (S)	7	7	0	6
	4 - M26 Off-Slip (w)	2	0	4	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,78	8,17	3,5	A	1315	1973
2 - M26 Off-Slip (E)	0,68	6,32	2,2	A	1063	1594
3 - A20 (S)	0,70	6,80	2,5	A	1097	1645
4 - M26 Off-Slip (w)	0,86	53,49	5,3	F	320	480

Main Results for each time segment

15:00 - 15:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1079	270	640	2403	0,449	1076	1021	0,0	0,8	2,802	A
2 - M26 Off-Slip (E)	872	218	662	2211	0,394	869	1054	0,0	0,7	2,766	A
3 - A20 (S)	900	225	603	2204	0,408	897	928	0,0	0,7	2,940	A
4 - M26 Off-Slip (w)	263	66	1399	1095	0,240	261	101	0,0	0,3	4,462	A

15:15 - 15:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1289	322	765	2247	0,574	1286	1221	0,8	1,4	3,875	A
2 - M26 Off-Slip (E)	1041	260	791	2065	0,504	1040	1260	0,7	1,0	3,626	A
3 - A20 (S)	1074	269	721	2068	0,519	1073	1110	0,7	1,1	3,860	A
4 - M26 Off-Slip (w)	314	78	1674	822	0,382	313	120	0,3	0,6	7,294	A

15:30 - 15:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1578	395	925	2047	0,771	1570	1489	1,4	3,4	7,703	A
2 - M26 Off-Slip (E)	1275	319	957	1877	0,679	1271	1539	1,0	2,1	6,095	A
3 - A20 (S)	1316	329	881	1885	0,698	1311	1346	1,1	2,4	6,644	A
4 - M26 Off-Slip (w)	384	96	2045	452	0,850	369	147	0,6	4,4	39,534	E

15:45 - 16:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1578	395	937	2033	0,776	1578	1497	3,4	3,5	8,174	A
2 - M26 Off-Slip (E)	1275	319	969	1863	0,684	1275	1545	2,1	2,2	6,316	A
3 - A20 (S)	1316	329	884	1882	0,699	1316	1359	2,4	2,5	6,795	A
4 - M26 Off-Slip (w)	384	96	2052	445	0,864	381	148	4,4	5,3	53,492	F

16:00 - 16:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1289	322	783	2224	0,579	1297	1233	3,5	1,4	4,055	A
2 - M26 Off-Slip (E)	1041	260	810	2043	0,510	1046	1269	2,2	1,1	3,746	A
3 - A20 (S)	1074	269	725	2063	0,521	1079	1131	2,5	1,2	3,933	A
4 - M26 Off-Slip (w)	314	78	1684	812	0,387	332	121	5,3	0,7	8,064	A

16:15 - 16:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1079	270	644	2398	0,450	1081	1026	1,4	0,9	2,837	A
2 - M26 Off-Slip (E)	872	218	666	2206	0,395	873	1059	1,1	0,7	2,796	A
3 - A20 (S)	900	225	606	2200	0,409	901	934	1,2	0,7	2,967	A
4 - M26 Off-Slip (w)	263	66	1406	1088	0,242	264	101	0,7	0,3	4,527	A

AM Forecast BL - D9 - 2042 | Forecast Baseline | AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A9	AM Forecast BL	✓	✓	D9	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	4,99	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	18	4 - M26 Off-Slip (w)	4,99	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Arm Capacity Adjustments

Arm	Type	Reason	Percentage capacity adjustment (%)
4 - M26 Off-Slip (w)	Percentage		82,00

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D9	2042	Forecast Baseline	AM	ONE HOUR	08:00	09:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	1004	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	1207	100,000
3 - A20 (S)		ONE HOUR	✓	1081	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	197	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	441	470	93
	2 - M26 Off-Slip (E)	717	0	490	0
	3 - A20 (S)	618	351	0	112
	4 - M26 Off-Slip (w)	54	0	143	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	5	7	10
	2 - M26 Off-Slip (E)	7	0	16	0
	3 - A20 (S)	10	19	0	12
	4 - M26 Off-Slip (w)	20	0	11	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,44	2,70	0,8	A	921	1382
2 - M26 Off-Slip (E)	0,64	5,29	1,9	A	1108	1661
3 - A20 (S)	0,64	5,95	1,9	A	992	1488
4 - M26 Off-Slip (w)	0,33	9,46	0,6	A	181	271

Main Results for each time segment

08:00 - 08:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	756	189	371	2739	0,276	754	1042	0,0	0,4	1,927	A
2 - M26 Off-Slip (E)	909	227	530	2361	0,385	906	595	0,0	0,7	2,729	A
3 - A20 (S)	814	203	608	2198	0,370	811	828	0,0	0,7	2,929	A
4 - M26 Off-Slip (w)	148	37	1265	1243	0,119	148	154	0,0	0,2	3,722	A

08:15 - 08:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	903	226	443	2648	0,341	902	1247	0,4	0,5	2,193	A
2 - M26 Off-Slip (E)	1085	271	634	2243	0,484	1084	711	0,7	1,0	3,426	A
3 - A20 (S)	972	243	727	2061	0,471	970	990	0,7	1,0	3,723	A
4 - M26 Off-Slip (w)	177	44	1514	993	0,178	177	184	0,2	0,2	4,995	A

08:30 - 08:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1105	276	542	2525	0,438	1104	1525	0,5	0,8	2,695	A
2 - M26 Off-Slip (E)	1329	332	776	2082	0,638	1325	870	1,0	1,9	5,229	A
3 - A20 (S)	1190	298	890	1876	0,635	1186	1212	1,0	1,9	5,870	A
4 - M26 Off-Slip (w)	217	54	1851	653	0,332	216	225	0,2	0,6	9,295	A

08:45 - 09:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1105	276	544	2523	0,438	1105	1529	0,8	0,8	2,701	A
2 - M26 Off-Slip (E)	1329	332	777	2081	0,639	1329	872	1,9	1,9	5,291	A
3 - A20 (S)	1190	298	892	1873	0,635	1190	1214	1,9	1,9	5,952	A
4 - M26 Off-Slip (w)	217	54	1856	648	0,335	217	226	0,6	0,6	9,461	A

09:00 - 09:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	903	226	446	2645	0,341	904	1253	0,8	0,6	2,200	A
2 - M26 Off-Slip (E)	1085	271	636	2240	0,484	1089	714	1,9	1,0	3,462	A
3 - A20 (S)	972	243	730	2058	0,472	976	994	1,9	1,0	3,770	A
4 - M26 Off-Slip (w)	177	44	1521	986	0,180	178	185	0,6	0,2	5,063	A

09:15 - 09:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	756	189	373	2736	0,276	756	1047	0,6	0,4	1,934	A
2 - M26 Off-Slip (E)	909	227	532	2359	0,385	910	597	1,0	0,7	2,750	A
3 - A20 (S)	814	203	611	2195	0,371	815	832	1,0	0,7	2,953	A
4 - M26 Off-Slip (w)	148	37	1271	1237	0,120	149	155	0,2	0,2	3,751	A

PM Forecast BL - D10 - 2042 | Forecast Baseline | PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - A20 (N) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	2 - M26 Off-Slip (E) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Geometry	3 - A20 (S) - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.
Warning	Large Roundabout	1 - A20 (N) - Large roundabout data	Large Roundabout Circulating Flow is zero for one or more arms.

Analysis Set Details

ID	Name	Include in report	Use specific Demand Set(s)	Specific Demand Set(s)	Network flow scaling factor (%)	Network capacity scaling factor (%)
A10	PM Forecast BL	✓	✓	D10	100,000	100,000

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	M26 J2a	Large Roundabout		1, 2, 3, 4	4,87	A

Junction Network

Driving side	Lighting	Network residual capacity (%)	First arm reaching threshold	Network delay (s)	Network LOS
Left	Normal/unknown	15	4 - M26 Off-Slip (w)	4,87	A

Arms

Arms

Arm	Name	Description	No give-way line
1	A20 (N)		
2	M26 Off-Slip (E)		
3	A20 (S)		
4	M26 Off-Slip (w)		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	l' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - A20 (N)	3,60	7,73	109,0	751,0	113,0	7,0		
2 - M26 Off-Slip (E)	5,57	7,23	36,4	75,0	166,0	26,0		
3 - A20 (S)	4,80	6,60	189,0	75,0	130,0	11,0		
4 - M26 Off-Slip (w)	7,52	7,52	0,0	42,0	136,0	11,0		

Large Roundabout Data

Arm	Circulating flow (PCU/hr)	Has entry-to-exit separation	Entry-to-exit separation (m)
1 - A20 (N)	0	✓	73,00
2 - M26 Off-Slip (E)	0	✓	65,00
3 - A20 (S)	0	✓	75,00
4 - M26 Off-Slip (w)	0	✓	133,00

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - A20 (N)	1,248	3201
2 - M26 Off-Slip (E)	1,134	2962
3 - A20 (S)	1,144	2893
4 - M26 Off-Slip (w)	1,229	3071

The slope and intercept shown above include any corrections and adjustments.

Arm Capacity Adjustments

Arm	Type	Reason	Percentage capacity adjustment (%)
4 - M26 Off-Slip (w)	Percentage		88,00

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)	Run automatically
D10	2042	Forecast Baseline	PM	ONE HOUR	15:00	16:30	15	✓

Demand overview (Traffic)

Arm	Linked arm	Profile type	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
1 - A20 (N)		ONE HOUR	✓	1253	100,000
2 - M26 Off-Slip (E)		ONE HOUR	✓	887	100,000
3 - A20 (S)		ONE HOUR	✓	1178	100,000
4 - M26 Off-Slip (w)		ONE HOUR	✓	335	100,000

Origin-Destination Data

Demand (PCU/hr)

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	712	498	43
	2 - M26 Off-Slip (E)	510	0	377	0
	3 - A20 (S)	513	576	0	89
	4 - M26 Off-Slip (w)	110	0	225	0

Vehicle Mix

HV data entry mode	PCU Factor for a HV (PCU)
HV Percentages	2,00

Heavy Vehicle %

		To			
		1 - A20 (N)	**2 - M26 Off-Slip (E)**	**3 - A20 (S)**	**4 - M26 Off-Slip (w)**
From	**1 - A20 (N)**	0	5	4	4
	2 - M26 Off-Slip (E)	4	0	7	0
	3 - A20 (S)	8	8	0	5
	4 - M26 Off-Slip (w)	2	0	5	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS	Average Demand (PCU/hr)	Total Junction Arrivals (PCU)
1 - A20 (N)	0,66	5,21	2,0	A	1149	1724
2 - M26 Off-Slip (E)	0,49	3,68	1,0	A	814	1221
3 - A20 (S)	0,59	4,31	1,5	A	1081	1621
4 - M26 Off-Slip (w)	0,46	8,70	0,9	A	307	461

Main Results for each time segment

15:00 - 15:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	943	236	601	2451	0,385	940	851	0,0	0,7	2,487	A
2 - M26 Off-Slip (E)	668	167	575	2310	0,289	666	967	0,0	0,4	2,302	A
3 - A20 (S)	887	222	415	2419	0,367	884	826	0,0	0,6	2,524	A
4 - M26 Off-Slip (w)	252	63	1201	1404	0,180	251	99	0,0	0,2	3,242	A

15:15 - 15:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1126	281	719	2304	0,489	1125	1017	0,7	1,0	3,189	A
2 - M26 Off-Slip (E)	797	199	687	2183	0,365	797	1157	0,4	0,6	2,732	A
3 - A20 (S)	1059	265	496	2326	0,455	1058	988	0,6	0,9	3,057	A
4 - M26 Off-Slip (w)	301	75	1436	1150	0,262	301	118	0,2	0,4	4,406	A

15:30 - 15:45

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1379	345	879	2104	0,655	1375	1245	1,0	2,0	5,138	A
2 - M26 Off-Slip (E)	977	244	840	2010	0,486	975	1415	0,6	1,0	3,658	A
3 - A20 (S)	1297	324	607	2199	0,590	1294	1208	0,9	1,5	4,279	A
4 - M26 Off-Slip (w)	369	92	1757	802	0,460	367	144	0,4	0,9	8,557	A

15:45 - 16:00

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1379	345	882	2101	0,656	1379	1247	2,0	2,0	5,212	A
2 - M26 Off-Slip (E)	977	244	843	2006	0,487	977	1418	1,0	1,0	3,679	A
3 - A20 (S)	1297	324	608	2197	0,590	1297	1211	1,5	1,5	4,308	A
4 - M26 Off-Slip (w)	369	92	1760	799	0,462	369	145	0,9	0,9	8,700	A

16:00 - 16:15

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	1126	281	723	2300	0,490	1130	1021	2,0	1,0	3,228	A
2 - M26 Off-Slip (E)	797	199	691	2178	0,366	799	1161	1,0	0,6	2,752	A
3 - A20 (S)	1059	265	498	2324	0,456	1062	992	1,5	0,9	3,078	A
4 - M26 Off-Slip (w)	301	75	1441	1145	0,263	303	119	0,9	0,4	4,459	A

16:15 - 16:30

Arm	Total Demand (PCU/hr)	Junction Arrivals (PCU)	Circulating flow (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	Throughput (exit side) (PCU/hr)	Start queue (PCU)	End queue (PCU)	Delay (s)	Unsignalised level of service
1 - A20 (N)	943	236	604	2448	0,385	944	854	1,0	0,7	2,505	A
2 - M26 Off-Slip (E)	668	167	577	2307	0,289	669	971	0,6	0,4	2,314	A
3 - A20 (S)	887	222	416	2417	0,367	888	829	0,9	0,6	2,540	A
4 - M26 Off-Slip (w)	252	63	1205	1399	0,180	253	99	0,4	0,2	3,269	A