Existing Layout

M1 Junction 22 Roundabout LinSig Results – Base

APPROACH	AM PEAK 08:00 – 09:00			PM PEAK 17:00 – 18:00		
	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)
2025 Baseline						
Southern Circulatory	75.6	11	10	73.3	10	11
M1 NB Off-Slip	71.9	7	26	70.9	7	25
Western Circulatory	75.1	3	9	71.5	3	9
A511	74.8	10	19	73.3	10	18
Northern Circulatory	73.4	9	13	72.4	8	11
M1 SB Off-Slip	69.9	8	19	63.6	6	17
Eastern Circulatory	74.1	4	9	71.3	1	6
A50 WB	69.3	9	15	65.2	8	13
Cliffe Lane	42.8	2	16	31.6	1	13
Cycle Time (s) (C1 and C2)	60/57			60/51		
PRC (%)	19.1			22.7		
Delay (PCU/Hr)	47.46			40.93		
2028 Future Base						
Southern Circulatory	83.7	14	11	82.4	13	11
M1 NB Off-Slip	82.8	9	32	83.7	9	31
Western Circulatory	83.4	8	8	82.7	2	6
A511	84.6	13	23	78.8	11	21

APPROACH	AM PEAK 08:00 – 09:00			PM PEAK 17:00 – 18:00		
	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)
Northern Circulatory	84.5	10	15	81.9	8	14
M1 SB Off-Slip	77.8	10	25	70.6	8	20
Eastern Circulatory	82.5	7	16	77.4	5	11
A50 WB	74.5	10	16	67.5	8	13
Cliffe Lane	59.0	2	27	49.4	2	23
Cycle Time (s) (C1 and C2)	60/57			60/51		
PRC (%)	6.4			7.3		
Delay (PCU/Hr)	58.03			48.77		
2030 Future Base						
Southern Circulatory	88.1	15	11	87.6	15	12
M1 NB Off-Slip	82.6	9	32	84.8	10	32
Western Circulatory	87.3	8	8	87.3	8	8
A511	85.3	14	24	72.6	10	17
Northern Circulatory	85.1	10	15	81.9	8	14
M1 SB Off-Slip	78.5	11	25	72.0	8	20
Eastern Circulatory	86.4	7	17	86.8	6	11
A50 WB	73.2	10	15	69.6	8	11
Cliffe Lane	64.8	3	32	60.5	2	29
Cycle Time (s) (C1 and C2)	60/57			60/51		

APPROACH	AM PEAK 08:00 – 09:00			PM PEAK 17:00 – 18:00		
	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)
PRC (%)	2.1			2.8		
Delay (PCU/Hr)	59.52			49.45		
2036 Future Base						
Southern Circulatory	89.1	16	11	88.0	15	11
M1 NB Off-Slip	90.0	11	40	90.4	12	39
Western Circulatory	87.2	8	8	90.4	8	8
A511	87.2	14	26	71.9	10	18
Northern Circulatory	88.3	11	16	87.9	8	16
M1 SB Off-Slip	83.7	12	27	75.7	10	20
Eastern Circulatory	88.8	7	8	86.0	6	10
A50 WB	81.3	12	24	71.7	9	12
Cliffe Lane	73.5	4	42	83.4	5	57
Cycle Time (s) (C1 and C2)	60/57			60/51		
PRC (%)	0.0			-0.5		
Delay (PCU/Hr)	68.13			55.19		

Proposed Layout

M1 Junction 22 Roundabout LinSig Results – Proposed Layout

APPROACH	AM PEAK 08:00 – 09:00			PM PEAK 17:00 – 18:00		
	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)
2028 Future Base + Proposed Development						
Southern Circulatory	87.7	13	13	87.1	13	13
M1 NB Off-Slip	67.5	7	22	72.4	8	23
Western Circulatory	96.1	2	4	89.5	2	4
A511	97.9	24	55	86.1	13	27
Northern Circulatory	94.1	12	16	88.9	9	15
M1 SB Off-Slip	85.2	13	23	65.8	7	15
Eastern Circulatory	97.4	8	12	84.0	1	3
A50 WB	78.2	12	17	82.2	12	21
Cliffe Lane	51.8	2	22	46.4	2	21
A50 EB Exit	70.1	19	5	58.6	12	4
Cycle Time (s) (C1, C2 and C3)	60/57/228			60/51/228		
PRC (%)	-8.8			0.6		
Delay (PCU/Hr)	82.49			58.39		
2028 Future Base + Proposed Development (Sensitivity Test)						
Southern Circulatory	88.5	14	14	87.8	14	13
M1 NB Off-Slip	67.5	7	22	72.9	8	24
Western Circulatory	96.9	2	4	88.6	2	4

APPROACH	AM PEAK 08:00 – 09:00			PM PEAK 17:00 – 18:00		
	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)
A511	98.4	26	59	87.2	14	28
Northern Circulatory	94.5	12	16	85.6	9	14
M1 SB Off-Slip	85.8	13	24	70.8	8	16
Eastern Circulatory	95.8	8	12	84.0	1	4
A50 WB	78.9	12	18	83.0	12	22
Cliffe Lane	56.2	2	24	48.5	2	22
A50 EB Exit	70.6	19	5	59.8	13	4
Cycle Time (s) (C1, C2 and C3)	60/57/228			60/51/228		
PRC (%)	-9.3			1.5		
Delay (PCU/Hr)	85.61			60.43		
2030 Future Base + Proposed Development						
Southern Circulatory	89.5	14	14	87.2	14	13
M1 NB Off-Slip	67.5	7	22	76.7	9	26
Western Circulatory	96.0	1	4	90.0	8	4
A511	98.0	25	56	89.4	14	32
Northern Circulatory	94.7	12	16	88.0	9	15
M1 SB Off-Slip	86.9	14	24	67.6	8	15
Eastern Circulatory	96.6	8	12	86.0	1	3
A50 WB	79.5	13	18	84.8	13	23
Cliffe Lane	52.9	2	22	56.9	2	26

APPROACH	AM PEAK 08:00 – 09:00			PM PEAK 17:00 – 18:00		
	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)
A50 EB Exit	70.8	20	5	58.9	12	4
Cycle Time (s) (C1, C2 and C3)	60/57/228			60/51/228		
PRC (%)	-8.9			0.0		
Delay (PCU/Hr)	84.90			62.46		
2030 Future Base + Proposed Development (Sensitivity Test)						
Southern Circulatory	90.7	14	14	89.5	14	14
M1 NB Off-Slip	67.5	7	22	73.2	8	24
Western Circulatory	99.7	3	5	91.8	2	4
A511	98.8	27	61	90.4	15	33
Northern Circulatory	99.3	13	17	89.3	9	15
M1 SB Off-Slip	83.9	13	21	69.4	8	15
Eastern Circulatory	99.1	8	12	86.2	6	10
A50 WB	80.1	13	18	80.7	12	19
Cliffe Lane	58.0	3	25	56.5	2	25
A50 EB Exit	71.2	20	6	60.2	13	4
Cycle Time (s) (C1, C2 and C3)	60/57/228			60/51/228		
PRC (%)	-10.8			-2.0		
Delay (PCU/Hr)	87.52			63.09		
2036 Future Base + Proposed Development						

APPROACH	AM PEAK 08:00 – 09:00			PM PEAK 17:00 – 18:00		
	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)
Southern Circulatory	94.3	16	14	87.9	15	12
M1 NB Off-Slip	71.5	8	24	86.8	10	33
Western Circulatory	95.2	3	5	90.6	8	4
A511	98.1	25	56	88.5	14	31
Northern Circulatory	94.1	12	16	87.2	9	15
M1 SB Off-Slip	92.4	17	31	71.8	9	16
Eastern Circulatory	97.1	8	10	89.7	6	10
A50 WB	88.4	16	28	82.4	12	19
Cliffe Lane	55.9	3	26	77.3	4	46
A50 EB Exit	73.0	21	6	60.5	13	4
Cycle Time (s) (C1, C2 and C3)	60/57/228			60/51/228		
PRC (%)	-9.0			-0.7		
Delay (PCU/Hr)	97.09			65.99		
2036 Future Base + Proposed Development (Sensitivity)						
Southern Circulatory	97.9	17	15	91.1	15	13
M1 NB Off-Slip	67.6	7	22	82.2	9	29
Western Circulatory	99.8	3	4	93.1	8	4
A511	99.1	28	63	90.0	15	32
Northern Circulatory	98.6	13	17	88.4	9	15

APPROACH	AM PEAK 08:00 – 09:00			PM PEAK 17:00 – 18:00		
	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)	DOS (%)	QUEUE (PCU)	DELAY (S/PCU)
M1 SB Off-Slip	89.4	15	26	74.3	9	20
Eastern Circulatory	98.1	11	11	90.2	6	10
A50 WB	87.8	16	24	83.1	13	19
Cliffe Lane	58.0	3	27	76.0	4	44
A50 EB Exit	73.3	22	6	61.9	14	4
Cycle Time (s) (C1, C2 and C3)	60/57/228			60/51/228		
PRC (%)	-10.9			-3.5		
Delay (PCU/Hr)	98.10			67.30		