



NORWALK

ROUTE 1 CORRIDOR

MASTER PLAN STUDY

Connecticut Ave / Van Buren Ave

FINAL REPORT

Appendix D

Intersection Capacity Analysis

ID	Intersection	Control Type	Conditions	Lane Group	AM Peak Hour					MD Peak Hour					PM Peak Hour					Saturday Peak Hour								
					V/C Ratio	Delay (s)	LOS	Queue Length 50th % (ft)	Queue Length 95th % (ft)	V/C Ratio	Delay (s)	LOS	Queue Length 50th % (ft)	Queue Length 95th % (ft)	V/C Ratio	Delay (s)	LOS	Queue Length 50th % (ft)	Queue Length 95th % (ft)	V/C Ratio	Delay (s)	LOS	Queue Length 50th % (ft)	Queue Length 95th % (ft)				
1	US Route 1 & W Norwalk Rd	Unsignalized	Build Conditions	SB-LR	0.87	55.50	F		205.00	1.11	165.10	F		230.00	1.52	\$ 341.70	F		315.00	2.31	\$ 697	F		467.50				
				EB-LT	0.06	12.20	B		5.00	0.17	13.40	B		15.00	0.25	13.40	B		25.00	0.31	17.10	C		32.50				
				WB-TR																								
2	I-95 NB Exit 13 Off Ramp & US Route 1	Actuated-Coordinated	Build Conditions	NB-L	0.77	65.20	E	90.00	#210	0.74	62.50	E	78.00	#128	0.69	57.80	E	75.00	#146	0.66	55.70	E	67.00	#126				
				NB-TR	0.43	8.60	A	12.00	64.00	0.65	17.80	B	62.00	112.00	0.71	24.30	C	100.00	196.00	0.68	21.60	C	82.00	184.00				
				NB-R	0.42	6.40	A	0.00	48.00	0.64	17.30	B	58.00	108.00	0.69	22.60	C	90.00	186.00	0.68	21.60	C	82.00	184.00				
				SB-L	0.1	42.80	D	6.00	12.00	0.13	43.50	D	7.00	22.00	0.19	45.20	D	11.00	29.00	0.12	43.20	D	7.00	11.00				
				SB-R	0.04	0.20	A	0.00	0.00	0.07	0.60	A	0.00	0.00	0.26	2.40	A	0.00	0.00	0.14	1.10	A	0.00	0.00				
				EB-L	0.27	46.70	D	16.00	42.00	0.13	43.60	D	6.00	23.00	0.10	42.50	D	6.00	22.00	0.10	42.50	D	6.00	22.00				
				EB-T	0.12	8.60	A	25.00	51.00	0.41	10.60	B	116.00	201.00	0.47	12.40	B	135.00	233.00	0.45	10.80	B	134.00	233.00				
				WB-TR	0.8	25.90	C	326.00	#514	0.78	24.00	C	328.00	#568	0.66	22.80	C	220.00	357.00	0.86	27.90	C	411.00	#682				
				Overall		23.30	C				20.70	C				20.90	C				22.50	C						
				NB-L	0.59	48.70	D	51.00	89.00	0.63	44.20	D	85.00	136.00	0.77	55.20	E	102.00	136.00	0.79	62.60	E	86.00	#177				
				NB-TR	0.4	35.30	D	65.00	108.00	0.88	63.80	E	157.00	#258	0.92	70.00	E	174.00	#230	0.87	62.80	E	156.00	#278				
				SB-L	0.44	36.70	D	43.00	84.00	0.73	55.90	E	66.00	#140	0.70	52.60	D	61.00	#134	0.91	78.80	E	93.00	#229				
				SB-TR	0.94	55.10	E	153.00	#314	0.79	44.00	D	121.00	#230	0.86	50.70	D	142.00	#285	0.95	63.40	E	174.00	#354				
3	Richards Ave & Connecticut Avenue/US Route 1	Actuated-Coordinated	Build Conditions	EB-L	0.6	49.30	D	65.00	113.00	0.62	49.20	D	71.00	122.00	0.80	53.00	D	142.00	221.00	0.89	75.20	E	119.00	#243				
				EB-TR	0.27	16.00	B	77.00	116.00	0.75	25.90	C	286.00	374.00	0.89	32.70	C	371.00	#546	1.00	50.90	D	~416	#579				
				WB-L	0.45	48.10	D	33.00	79.00	0.62	55.00	D	56.00	m#111	0.42	46.80	D	35.00	m#71	0.81	74.30	E	72.00	m#133				
				WB-TR	0.63	27.40	C	211.00	173.00	0.74	27.60	C	170.00	#372	0.73	30.00	C	157.00	#236	0.95	43.90	D	232.00	#470				
				Overall		33.90	C				35.50	D				41.10	D				54.70	D						
				NB-L	0.04	32.80	C	4.00	12.00	0.11	28.90	C	10.00	23.00	0.11	28.90	C	10.00	22.00	0.14	28.70	C	12.00	20.00				
				NB-TR	0.01	0.00	A	0.00	0.00	0.28	8.80	A	3.00	28.00	0.25	9.20	A	3.00	22.00	0.25	8.70	A	4.00	12.00				
				SB-LT						0.75	52.60	D	97.00	141.00	0.75	53.50	D	95.00	150.00	0.82	56.60	E	120.00	167.00				
				SB-R	0.37	11.90	B	14.00	40.00	0.12	5.20	A	0.00	21.00	0.10	6.00	A	0.00	20.00	0.18	10.90	B	17.00	39.00				
				EB-L	0.15	45.70	D	8.00	m#30	0.42	53.50	D	32.00	m#8	0.34	51.00	D	24.00	m#32	0.65	59.30	E	57.00	m#69				
				EB-TR	0.14	3.10	A	0.00	53.00	0.56	7.10	A	95.00	121.00	0.56	5.10	A	83.00	m#111	0.62	7.60	A	103.00	m#126				
				WB-L	0.05	33.00	C	3.00	m7	0.29	38.60	D	19.00	m#4	0.16	39.90	D	9.00	m#23	0.20	41.10	D	11.00	m#25				
				WB-TR	0.35	7.40	A	6.00	205.00	0.54	16.50	B	172.00	273.00	0.50	12.10	B	129.00	228.00	0.71	19.40	B	235.00	322.00				
4	Liquidators Driveway/Walmart Driveway & US Route 1	Actuated-Coordinated	Build Conditions	Overall		7.10	A				15.30	B				12.10	B				17.90	B						
				NB-L	0.34	45.70	D	25.00	57.00	0.48	50.50	D	38.00	77.00	0.50	51.50	D	38.00	70.00	0.55	50.40	D	51.00	94.00				
				NB-TR	0.53	38.70	D	59.00	100.00	0.79	40.10	D	95.00	168.00	0.80	43.90	D	111.00	163.00	0.93	63.00	E	143.00	#272				
				SB-L	0.49	44.90	D	39.00	69.00	0.82	62.50	E	73.00	#120	0.69	52.20	D	59.00	#94	0.79	55.10	E	85.00	#140				
				SB-TR	0.22	22.50	C	22.00	58.00	0.52	29.90	C	73.00	124.00	0.69	41.60	D	125.00	#202	0.57	33.10	C	96.00	169.00				
				EB-L	0.19	50.00	D	15.00	31.00	0.52	61.30	E	43.00	m#91	0.60	63.40	E	59.00	m#110	0.91	87.00	F	120.00	m#246				
				EB-TR	0.24	9.00	A	42.00	60.00	0.79	21.40	C	210.00	#309	0.93	32.60	C	288.00	#494	1.01	49.00	D	~318	#482				
				WB-L	0.3	29.10	C	21.00	41.00	0.76	53.00	D	69.00	#195	0.77	54.50	D	85.00	#175	0.95	77.80	E	100.00	#251				
				WB-T	0.46	25.70	C	215.00	327.00	0.63	33.00	C	258.00	360.00	0.45	29.40	C	187.00	264.00	0.65	34.10	C	230.00	305.00				
				WB-R	0.2	11.30	B	30.00	109.00	0.30	12.10	B	37.00	131.00	0.25	13.80	B	52.00	123.00	0.47	14.30	B	111.00	198.00				
				Overall		23.90	C				32.50	C				36.30	D				47.00	D						
				5	Keeler Ave & US Route 1	Actuated-Coordinated	Build Conditions	NB-L	0.57	46.00	D	63.00	102.00	0.71	51.50	D	87.00	147.00	0.72	51.00	D	91.00	142.00	0.71	51.40	D	86.00	146.00
								NB-TR	0.1	0.30	A	0.00	0.00	0.32	10.30	B	8.00	51.00	0.33	9.50	A	6.00	44.00	0.40	9.00	A	5.00	54.00
SB-L	0.07	30.80	C					7.00	9.00	0.17	31.10	C	17.00	38.00	0.18	31.50	C	19.00	37.00	0.18	31.80	C	16.00	33.00				
SB-TR	0.03	0.20	A					0.00	0.00	0.23	12.10	B	9.00	38.00	0.15	13.70	B	6.00	26.00	0.23	12.40	B	9.00	33.00				
EB-L	0.05	50.20	D					3.00	m15	0.31	56.30	E	21.00	m#50	0.24	54.50	D	16.00	m0	0.35	54.30	D	23.00	m0				
EB-TR	0.26	5.40	A					42.00	58.00	0.70	8.90	A	85.00	62.00	0.85	11.40	B	83.00	#67	0.88	14.70	B	177.00	#64				
WB-L	0.42	44.60	D					24.00	56.00	0.67	53.80	D	51.00	#128	0.71	54.00	D	59.00	#183	0.71	47.50	D	75.00	m#175				
WB-TR	0.39	10.50	B					123.00	381.00	0.62	20.80	C	346.00	440.00	0.41	15.30	B	157.00	350.00	0.60	21.90	C	403.00	481.00				
Overall		12.00	B								18.60	B				17.30	B				21.00	C						
SB-L	0.38	38.10	D					42.00	60.00	0.37	37.90	D	42.00	60.00	0.66	40.30	D	104.00	137.00	0.69	40.40	D	116.00	144.00				
SB-R	0.35	11.10	B					0.00	35.00	0.35	11.10	B	0.00	35.00	0.44	8.60	A	0.00	48.00	0.48	8.20	A	0.00	43.00				
EB-L	0.54	40.90	D					35.00	68.00	0.54	56.80	E	37.00	m#51	0.77	45.40	D	92.00	m101	0.80	46.30	D	101.00	m117				
EB-T	0.19	3.60	A					69.00	136.00	0.45	2.50	A	5.00	176.00	0.50	4.00	A	8.00	190.00	0.52	4.20	A	75.00	m187				
WB-T	0.45	2.30	A	32.00	53.00	0.51	1.8																					

				Overall		14.20	B				10.20	B				11.60	B							
15	Van Buren Ave & Maple St	Actuated-Coordinated	Build Conditions	NB-L	0.48	12.80	B	30.00	60.00	0.35	9.70	A	20.00	45.00	0.47	14.20	B	21.00	#50	0.31	8.50	A	15.00	39.00
				NB-TR	0.33	9.40	A	75.00	136.00	0.53	11.50	B	137.00	247.00	0.54	12.10	B	149.00	261.00	0.55	10.90	B	152.00	310.00
				SB-L	0.1	13.00	B	12.00	30.00	0.08	12.80	B	9.00	25.00	0.22	14.90	B	25.00	56.00	0.13	12.90	B	13.00	37.00
				SB-TR	0.77	24.50	C	243.00	#435	0.75	23.50	C	267.00	#443	0.88	33.10	C	356.00	#606	0.76	23.20	C	293.00	#566
				EB-L	0.83	54.50	D	81.00	#124	0.58	34.60	C	61.00	97.00	0.73	42.70	D	79.00	#135	0.55	34.90	C	55.00	91.00
				EB-TR	0.6	26.10	C	76.00	120.00	0.56	28.30	C	72.00	122.00	0.61	31.30	C	90.00	156.00	0.45	23.50	C	47.00	94.00
				WB-L	0.3	24.80	C	23.00	44.00	0.30	25.60	C	25.00	43.00	0.39	27.70	C	30.00	49.00	0.17	23.90	C	15.00	34.00
				WB-TR	0.67	38.20	D	81.00	124.00	0.57	31.20	C	54.00	85.00	0.55	33.90	C	65.00	94.00	0.46	29.70	C	41.00	81.00
				Overall		25.40	C				21.10	C				26.60	C				19.50	B		
				NB-LTR	0.63	25.70	C	179.00	278.00	0.85	26.90	C	347.00	230.00	0.99	50.00	D	438.00	#551	0.89	32.90	C	372.00	#544
16	Van Buren Ave & Grandview Ave/US 7	Actuated-Coordinated	Build Conditions	SB-L	0.47	19.20	B	63.00	89.00	0.49	12.40	B	45.00	85.00	0.63	19.10	B	50.00	#97	0.67	19.60	B	51.00	m93
				SB-TR	0.59	20.70	C	210.00	278.00	0.48	10.80	B	160.00	220.00	0.68	15.30	B	232.00	382.00	0.68	15.60	B	236.00	374.00
				EB-LTR	0.86	53.20	D	169.00	222.00	0.66	47.90	D	79.00	112.00	0.88	68.50	E	126.00	#197	0.81	60.20	E	112.00	#213
				WB-L	0.67	25.10	C	114.00	152.00	0.62	33.10	C	105.00	139.00	0.73	38.50	D	118.00	#190	0.58	30.90	C	92.00	154.00
				WB-TR	0.36	5.40	A	20.00	47.00	0.41	8.60	A	21.00	52.00	0.58	19.50	B	94.00	171.00	0.41	8.30	A	21.00	79.00
				Overall		25.80	C				21.90	C				34.90	C				26.90	C		
				NB-LT	0.22	12.10	B	44.00	m79	0.36	7.80	A	46.00	m110	0.43	11.90	B	65.00	m134	0.51	12.70	B	91.00	m154
17	Van Buren Ave/Riverside Ave & Spring Hill Ave/Belden Ave	Actuated-Coordinated	Build Conditions	NB-R	0.39	1.20	A	5.00	m11	0.38	0.70	A	0.00	m0	0.46	0.90	A	0.00	m12	0.40	1.00	A	0.00	m13
				SB-L	0.14	17.10	B	23.00	54.00	0.14	15.50	B	18.00	45.00	0.26	19.90	B	32.00	82.00	0.26	22.20	C	30.00	57.00
				SB-TR	0.21	16.70	B	55.00	105.00	0.36	16.00	B	112.00	189.00	0.46	20.40	C	147.00	274.00	0.60	25.60	C	202.00	256.00
				EB-LT	0.57	48.60	D	56.00	103.00	0.38	42.90	D	33.00	60.00	0.58	48.30	D	62.00	95.00	0.62	49.60	D	68.00	110.00
				EB-R	0.34	11.40	B	0.00	39.00	0.22	7.60	A	0.00	15.00	0.38	11.40	B	0.00	31.00	0.14	3.80	A	0.00	6.00
				WB-L	0.66	24.10	C	145.00	175.00	0.66	27.60	C	141.00	175.00	0.68	24.10	C	154.00	191.00	0.77	25.30	C	194.00	220.00
				WB-TR	0.68	24.50	C	210.00	249.00	0.34	17.10	B	69.00	98.00	0.48	18.30	B	131.00	167.00	0.38	14.30	B	94.00	117.00
				Overall		17.50	B				13.70	B				16.00	B				18.10	B		
				NB-LTR	0.22	12.10	B	44.00	m79	0.36	7.80	A	46.00	m110	0.43	11.90	B	65.00	m134	0.51	12.70	B	91.00	m154
				SB-L	0.14	17.10	B	23.00	54.00	0.14	15.50	B	18.00	45.00	0.26	19.90	B	32.00	82.00	0.26	22.20	C	30.00	57.00
				SB-TR	0.21	16.70	B	55.00	105.00	0.36	16.00	B	112.00	189.00	0.46	20.40	C	147.00	274.00	0.60	25.60	C	202.00	256.00
				EB-LT	0.57	48.60	D	56.00	103.00	0.38	42.90	D	33.00	60.00	0.58	48.30	D	62.00	95.00	0.62	49.60	D	68.00	110.00
				EB-R	0.34	11.40	B	0.00	39.00	0.22	7.60	A	0.00	15.00	0.38	11.40	B	0.00	31.00	0.14	3.80	A	0.00	6.00
				WB-L	0.66	24.10	C	145.00	175.00	0.66	27.60	C	141.00	175.00	0.68	24.10	C	154.00	191.00	0.77	25.30	C	194.00	220.00
				WB-TR	0.68	24.50	C	210.00	249.00	0.34	17.10	B	69.00	98.00	0.48	18.30	B	131.00	167.00	0.38	14.30	B	94.00	117.00
				Overall		17.50	B				13.70	B				16.00	B				18.10	B		