

**Appendix E: Washington Street at Hanover Street,
Existing Conditions**

Washington St at Hanover St
Existing Conditions

AM
09/22/2023

Intersection												
Int Delay, s/veh	7.6											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕				
Traffic Vol, veh/h	67	370	77	131	294	41	19	96	25	0	0	0
Future Vol, veh/h	67	370	77	131	294	41	19	96	25	0	0	0
Conflicting Peds, #/hr	17	0	28	33	0	22	28	0	33	0	0	0
Sign Control	Free	Free	Free	Free	Free	Free	Stop	Stop	Stop	Stop	Stop	Stop
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	73	402	84	142	320	45	21	104	27	0	0	0

Major/Minor	Major1			Major2			Minor1		
Conflicting Flow All	387	0	0	519	0	0	1278	1294	510
Stage 1	-	-	-	-	-	-	623	623	-
Stage 2	-	-	-	-	-	-	655	671	-
Critical Hdwy	4.12	-	-	4.12	-	-	6.42	6.52	6.22
Critical Hdwy Stg 1	-	-	-	-	-	-	5.42	5.52	-
Critical Hdwy Stg 2	-	-	-	-	-	-	5.42	5.52	-
Follow-up Hdwy	2.218	-	-	2.218	-	-	3.518	4.018	3.318
Pot Cap-1 Maneuver	1171	-	-	1047	-	-	183	163	563
Stage 1	-	-	-	-	-	-	535	478	-
Stage 2	-	-	-	-	-	-	517	455	-
Platoon blocked, %	-	-	-	-	-	-	-	-	-
Mov Cap-1 Maneuver	1171	-	-	1014	-	-	130	0	528
Mov Cap-2 Maneuver	-	-	-	-	-	-	130	0	-
Stage 1	-	-	-	-	-	-	474	0	-
Stage 2	-	-	-	-	-	-	414	0	-

Approach	EB			WB			NB		
HCM Control Delay, s	1.1			2.6			48.1		
HCM LOS							E		

Minor Lane/Major Mvmt	NBLn1	EBL	EBT	EBR	WBL	WBT	WBR
Capacity (veh/h)	227	1171	-	-	1014	-	-
HCM Lane V/C Ratio	0.67	0.062	-	-	0.14	-	-
HCM Control Delay (s)	48.1	8.3	0	-	9.1	0	-
HCM Lane LOS	E	A	A	-	A	A	-
HCM 95th %tile Q(veh)	4.2	0.2	-	-	0.5	-	-

Washington St at Hanover St
Existing Condition

PM
09/22/2023

Intersection												
Int Delay, s/veh	16											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕				
Traffic Vol, veh/h	77	309	63	80	386	82	22	180	48	0	0	0
Future Vol, veh/h	77	309	63	80	386	82	22	180	48	0	0	0
Conflicting Peds, #/hr	29	0	32	36	0	33	32	0	36	0	0	0
Sign Control	Free	Free	Free	Free	Free	Free	Stop	Stop	Stop	Stop	Stop	Stop
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	84	336	68	87	420	89	24	196	52	0	0	0

Major/Minor	Major1			Major2			Minor1		
Conflicting Flow All	542	0	0	440	0	0	1245	1290	442
Stage 1	-	-	-	-	-	-	574	574	-
Stage 2	-	-	-	-	-	-	671	716	-
Critical Hdwy	4.12	-	-	4.12	-	-	6.42	6.52	6.22
Critical Hdwy Stg 1	-	-	-	-	-	-	5.42	5.52	-
Critical Hdwy Stg 2	-	-	-	-	-	-	5.42	5.52	-
Follow-up Hdwy	2.218	-	-	2.218	-	-	3.518	4.018	3.318
Pot Cap-1 Maneuver	1027	-	-	1120	-	-	192	163	615
Stage 1	-	-	-	-	-	-	563	503	-
Stage 2	-	-	-	-	-	-	508	434	-
Platoon blocked, %	-	-	-	-	-	-	-	-	-
Mov Cap-1 Maneuver	1027	-	-	1082	-	-	142	0	574
Mov Cap-2 Maneuver	-	-	-	-	-	-	142	0	-
Stage 1	-	-	-	-	-	-	486	0	-
Stage 2	-	-	-	-	-	-	436	0	-

Approach	EB			WB			NB		
HCM Control Delay, s	1.5			1.3			74.4		
HCM LOS	F			F			F		

Minor Lane/Major Mvmt	NBLn1	EBL	EBT	EBR	WBL	WBT	WBR
Capacity (veh/h)	293	1027	-	-	1082	-	-
HCM Lane V/C Ratio	0.927	0.081	-	-	0.08	-	-
HCM Control Delay (s)	74.4	8.8	0	-	8.6	0	-
HCM Lane LOS	F	A	A	-	A	A	-
HCM 95th %tile Q(veh)	8.9	0.3	-	-	0.3	-	-

Notes
 -: Volume exceeds capacity \$: Delay exceeds 300s +: Computation Not Defined *: All major volume in platoon