

## Signal Justification Calculation for Forecasted Volumes (OTM Book 12 - Justification 7)

Horizon Year: 2021 (Total Traffic)  
 Region/City/Township: Town of Halton Hills  
 Major Street: Steeles Avenue  
 Minor Street: Sixth Line South/"Street A"

North/South?: N

Number of Approach Lanes: 2 or more  
 Tee Intersection?: N  
 Flow Conditions: Free  
 PM Forecast Only? N

Warrant Results		
150% Satisfied	No	Justification for new intersections with forecast traffic
120% Satisfied	No	Justification for existing intersections with forecast traffic

Time Period	Major Street Steeles Avenue						Minor Street Sixth Line South/"Street A"						Peds Crossing
	Eastbound			Westbound			Northbound			Southbound			
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right	
AM Peak Hour	40	1045	30	80	470	15	10	10	35	5	0	10	
PM Peak Hour	60	430	15	260	960	5	25	5	85	25	25	30	
Average Hourly Volume	25	369	11	85	358	5	9	4	30	8	6	10	0

Warrant	AHV
1A - All	919
1B - Minor	66
2A - Major	853
2B - Cross	23

### Warrant 1 - Minimum Vehicular Volume

Warrant	Approach Lanes	1		2 or more		Average Hourly Volume
		Free	Restricted	Free	Restricted	
1A	Flow Conditions	Free	Restricted	X	Restricted	919
	All Approaches	480	720	600	900	153.1%
		% Fulfilled				
1B	Flow Conditions	Free	Restricted	X	Restricted	66
	Minor Street Approaches	120	170	120	170	55.2%
		% Fulfilled				

### Warrant 2 - Delay To Cross Traffic

Warrant	Approach Lanes	1		2 or more		Average Hourly Volume
		Free	Restricted	Free	Restricted	
2A	Flow Conditions	Free	Restricted	X	Restricted	853
	Major Street Approaches	480	720	600	900	142.1%
		% Fulfilled				
2B	Flow Conditions	Free	Restricted	X	Restricted	23
	Traffic Crossing Major Street	50	75	50	75	45.0%
		% Fulfilled				

## Signal Justification Calculation for Forecasted Volumes (OTM Book 12 - Justification 7)

Horizon Year: 2021 (Total Traffic)  
 Region/City/Township: Town of Halton Hills

Major Street: Trafalgar Road North/South?: Y  
 Minor Street: Hornby Road

Number of Approach Lanes: 1  
 Tee Intersection?: Y  
 Flow Conditions: Free  
 PM Forecast Only? N

Warrant Results		
150% Satisfied	No	Justification for new intersections with forecast traffic
120% Satisfied	No	Justification for existing intersections with forecast traffic

Time Period	Major Street Trafalgar Road						Minor Street Hornby Road						Peds Crossing
	Northbound			Southbound			Eastbound			Westbound			
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right	
AM Peak Hour	5	350	0	0	1485	65	25	0	10	0	0	0	0
PM Peak Hour	5	1155	0	0	380	80	80	0	5	0	0	0	0
Average Hourly Volume	3	376	0	0	466	36	26	0	4	0	0	0	0

Warrant	AHV
1A - All	911
1B - Minor	30
2A - Major	881
2B - Cross	26

### Warrant 1 - Minimum Vehicular Volume

Warrant	Approach Lanes	1		2 or more		Average Hourly Volume
		Free	Restricted	Free	Restricted	
1A	Flow Conditions	X				911
	All Approaches	480	720	600	900	189.8%
		% Fulfilled				
1B	Flow Conditions	X				30
	Minor Street Approaches	180	255	180	255	16.7%
		% Fulfilled				

### Warrant 2 - Delay To Cross Traffic

Warrant	Approach Lanes	1		2 or more		Average Hourly Volume
		Free	Restricted	Free	Restricted	
2A	Flow Conditions	X				881
	Major Street Approaches	480	720	600	900	183.6%
		% Fulfilled				
2B	Flow Conditions	X				26
	Traffic Crossing Major Street	50	75	50	75	52.5%
		% Fulfilled				

## Signal Justification Calculation for Forecasted Volumes (OTM Book 12 - Justification 7)

Horizon Year: 2021 (Total Traffic)  
 Region/City/Township: Town of Halton Hills

Major Street: Trafalgar Road      North/South?: Y  
 Minor Street: "Street B"

Number of Approach Lanes: 1  
 Tee Intersection?: N  
 Flow Conditions: Free  
 PM Forecast Only? N

Warrant Results		
150% Satisfied	No	Justification for new intersections with forecast traffic
120% Satisfied	No	Justification for existing intersections with forecast traffic

Time Period	Major Street Trafalgar Road						Minor Street "Street B"						Peds Crossing
	Northbound			Southbound			Eastbound			Westbound			
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right	
AM Peak Hour	10	345	45	15	1480	10	5	0	5	10	0	5	
PM Peak Hour	10	345	45	15	1480	10	5	0	5	10	0	5	
Average Hourly Volume	5	173	23	8	740	5	3	0	3	5	0	3	0

Warrant	AHV
1A - All	965
1B - Minor	13
2A - Major	953
2B - Cross	8

### Warrant 1 - Minimum Vehicular Volume

Warrant	Approach Lanes	1		2 or more		Average Hourly Volume
		Free	Restricted	Free	Restricted	
1A	Flow Conditions	X				965
	All Approaches	480	720	600	900	201.0%
		% Fulfilled				
1B	Flow Conditions	X				13
	Minor Street Approaches	120	170	120	170	10.4%
		% Fulfilled				

### Warrant 2 - Delay To Cross Traffic

Warrant	Approach Lanes	1		2 or more		Average Hourly Volume
		Free	Restricted	Free	Restricted	
2A	Flow Conditions	X				953
	Major Street Approaches	480	720	600	900	198.4%
		% Fulfilled				
2B	Flow Conditions	X				8
	Traffic Crossing Major Street	50	75	50	75	15.0%
		% Fulfilled				