Broadview Avenue Extension (North Segment) Municipal Class Environmental Assessment

Preliminary Cost Estimate

Road:	Broadview Avenue	Assumptions:			
From:	Eastern Ave	Pavement Structure:		Asphalt Cycle Path Structure	
To:	Start of Underpass	HL-1	40 mm	HL-8	90 mm
Length:	180 m	HL-8	50 mm	Granular A	150 mm
Width at Underpass:	43 m	Concrete	250 mm	50mm Crushed Aggregate	200 mm
Minimum Width	35 m	Granular A	150 mm		

Description	Units	Quantity	Unit Price	Cost
Full depth asphalt pavement / concrete road base removal	m2	840.00	\$40.80	\$34,272.00
Full depth asphalt pavement / concrete road base removal for SBR slip lane	m2	190.00	\$40.80	\$7,752.00
Earthworks Removal and Disposal	m3	12680	\$120.00	\$1,521,600.00
Removal of concrete curb and gutter	m	80.00	\$34.00	\$2,720.00
Removal of concrete median and traffic island to road base full depth	m2	240	\$47.60	\$11,424.00
Removal of planter and street trees	each	2	\$680.00	\$1,360.00
Removal of light poles	each	11	\$1,360.00	\$14,960.00
Removal of Existing Traffic Signals	each	1	\$54,400.00	\$54,400.00
HL-1	t	280	\$183.60	\$51,408.00
HL-8	t	340	\$142.80	\$48,552.00
Concrete base	t	680	\$170.00	\$115,600.00
Granular A	t	1940	\$34.00	\$65,960.00
Tack coat	m2	2690	\$1.36	\$3,658.40
HL-8 for Cycle Path	t	160	\$142.80	\$22,848.00
Granular A for Cycle Path	t	250	\$34.00	\$8,500.00
50mm Crushed Aggregate for Cycle Path	t	140	\$34.00	\$4,760.00
Concrete Curb and Gutter	m	620	\$122.40	\$75,888.00
Subdrain	m	620	\$47.60	\$29,512.00
Cast-in-place Concrete Sidewalk w/ Paver Band	m2	020	\$163.20	\$0.00
Unit Paving for Layby	m2	0	\$680.00	\$0.00
Unit Paving for Boulevard	m2	1110	\$680.00	\$754,800.00
Concrete Median	m2	590	\$238.00	\$140,420.00
Concrete Median Parapet walls including Foundation		38	\$238.00	\$140,420.00 \$57,000.00
Parapet walls including Foundation Trunk Storm Sewer	m			
	m	180	\$2,040.00	\$367,200.00
Catchbasins	each	4	\$6,800.00	\$27,200.00
Catchbasin Manholes	each	2	\$24,480.00	\$48,960.00
250mm Catchbasin Leads	m	180	\$816.00	\$146,880.00
Bioswale	m	0	\$479.33	\$0.00
Landscaping			4	
Tree	each	21	\$500.00	\$10,500.00
Shrub 2gal pot	each	72	\$35.00	\$2,520.00
Perrennilas 2 gal pot	each	72	\$24.00	\$1,728.00
Nursery Sod	m2	439	\$10.00	\$4,390.00
Concrete curb for planter beds	m	230	\$90.00	\$20,700.00
200mmdia PVC outlet pipe for collecter drain	m2	72	\$55.00	\$3,960.00
Underdrain	m2	450	\$55.00	\$24,750.00
Non-woven geogrid to wrap around side	m2	450	\$30.00	\$13,500.00
Drainage layer(20/50mm unifromly graded gravel)	m3	182.25	\$55.00	\$10,023.75
Chocker layer	m3	81	\$55.00	\$4,455.00
Bio retention filter media	m3	243	\$40.00	\$9,720.00
Soil Cells on boulevard	m2	990	\$612.00	\$605,880.00
Supply and install new benches	each	10	\$680.00	\$6,800.00
Supply and install garbage receptacles	each	10	\$680.00	\$6,800.00
Relocate Bike Rack	each	0	\$122.40	\$0.00
Install Bike Rack	each	10	\$231.20	\$2,312.00
Install TTC Shelter	each	0	\$6,800.00	\$0.00
Construct TTC shelter concrete base	m2	0	\$238.00	\$0.00
Tactile buffer	m	180	\$652.80	\$117,504.00
Tactile Surface	m	45	\$652.80	\$29,376.00
Adjust MH, Valve Chamber, Electrical Handwell	each	43	\$1,326.00	\$0.00
Adjust Min, valve chamber, Electrical Handwell Adjust CB		6	\$6,800.00	\$0.00
Adjust CB Adjust water valves to final grade	each		. ,	
	each	0	\$292.40 \$10,880.00	\$0.00 \$10,880.00
Relocate existing fire hydrant Adjust existing fire hydrant	each	-		
	each	0	\$2,040.00	\$0.00
Watermain	m	180	\$1,000.00	\$180,000.00
Adjust existing sanitary valves and manhole	each	0	\$1,326.00	\$0.00
Pavement markings - white or yellow solid of skip - 10 cm	m	720	\$13.60	\$9,792.00
50mm Stop Bar	m	70	\$68.00	\$4,760.00
Pavement markings - Arrows	each	3	\$673.20	\$2,019.60
Streetprint including 10cm crosswalk lines	m	240	\$272.00	\$65,280.00
Green Paint for Cycle Path	m2	690	\$204.00	\$140,760.00
Arrows for Cycle Path	each	19	\$68.00	\$1,292.00
10cm white 1-1-1 for cycle path	m	182	\$13.60	\$2,475.20
Illumination	each	15	\$19,040.00	\$285,600.00
1x75mm dia PVC rigid electric duct in boulevard	m	360	\$144.47	\$52,010.21
	each	1	\$350,000.00	\$350,000.00
New Traffic Signals	each	1	\$75,000.00	\$75,000.00
New Traffic Signals Temporary Traffic Signals	cucii		TBD	
	m	0	100	
Temporary Traffic Signals Streetcar Tracks		0	100	\$5,713,222.16
Temporary Traffic Signals Streetcar Tracks Sub-total Major Items		0		
Temporary Traffic Signals Streetcar Tracks Sub-total Major Items Minor Items (25% of Major Items)	m	0	TBD	\$1,428,305.54
Temporary Traffic Signals Streetcar Tracks Sub-total Major Items Minor Items (25% of Major Items) Utility Relocations (To be determined by others)	m LS	0		\$1,428,305.54 \$0.00
Temporary Traffic Signals Streetcar Tracks Sub-total Major Items Minor Items (25% of Major Items) Utility Relocations (To be determined by others) Sub-total	m LS LS	0		\$1,428,305.54 \$0.00 \$7,141,527.70
Temporary Traffic Signals Streetcar Tracks Sub-total Major Items Minor Items (25% of Major Items) Utility Relocations (To be determined by others)	m LS	0		\$5,713,222.16 \$1,428,305.54 \$0.00 \$7,141,527.70 \$2,142,458.31 \$1,071,229.15