

Victoria Square Boulevard Class  
Environmental Assessment

Woodbine Avenue (north  
connection) to Woodbine Avenue  
(south connection)

Environmental Study Report

Appendix

**N**

Preliminary Cost  
Estimate

**HDR Computation**

Project VICTORIA SQUARE BOULEVARD EA  
 Subject CLASS EA, OPINION OF PROBABLE COST  
 Task VICTORIA SQUARE BOULEVARD

Computed Masoud S.  
 Checked A. Reitmeier  
 Sheet 1

Date 28/10/2017  
 Date 19/03/2018  
 of 1

From: Woodbine Avenue (South Connection) To: Woodbine Avenue (North Connection)  
 Length: 2.7 kilometres

Component/ Category	Item Description	Units	2015 Unit Price	Quantity	Total
<b>Utility Conflicts</b>	Hydro Pole Relocation	each	\$10,000.00	40	\$400,000
	Water Main Relocation	m	\$1,200.00		\$0
	Gas Main Relocation	m	\$250.00	1000	\$250,000
	Underground Bell relocation	m	\$100.00		\$0
	Sanitary relocation	m	\$250.00		\$0
	Contingency (20%)				\$130,000
	<b>Sub Total</b>				\$780,000
<b>Road Work</b>	Excavation/Earthworks	m3	\$18.00	29281	\$527,058
	Install storm sewer	m	\$350.00	2400	\$840,000
	Granular 'A'	tonne	\$25.00	11720	\$293,000
	Granular 'B'	tonne	\$20.00	23466	\$469,320
	Asphalt Base (SP 19)	tonne	\$75.00	7534	\$565,050
	Asphalt Top (SP 12.5)	tonne	\$90.00	3768	\$339,120
	Install curb and gutter	m	\$50.00	5400	\$270,000
	Install MUP/ sidewalk/ cycle track	m2	\$60.00	16200	\$972,000
	Install subdrains	m	\$26.00	5400	\$140,400
	Install catch basin and leads	each	\$2,500.00	90	\$225,000
	Install manhole	each	\$5,000.00	25	\$125,000
	Oil-Grit Separator	each	\$60,000.00	3	\$180,000
	Full Depth Asphalt removal	m2	\$3.00	34580	\$103,740
	Permanent Pavement Marking	m	\$26.00	8100	\$210,600
	Contingency (20%)				\$1,052,058
	<b>Sub Total</b>				\$6,312,346
<b>Illumination</b>	Both sides (assume 50m spacing)	each	\$5,000.00	95	\$475,000
	Contingency (20 %)				\$95,000
	<b>Sub Total</b>				\$570,000
<b>Traffic Signals</b>	Permanent (intersection)	each	\$250,000.00	2	\$500,000
	Temporary (intersection)	each	\$100,000.00	0	\$0
	Contingency (20 %)				\$100,000
	<b>Sub Total</b>				\$600,000
<b>Culverts</b>	Removal of existing	m	\$80.00	550	\$44,000
	8,500 x 1500 mm Concrete Box Culvert	m	\$6,500.00	20	\$130,000
	Wingwalls	m	\$2,400.00	28	\$67,200
	Contingency (20%)				\$34,800
	<b>Sub Total</b>				\$276,000
<b>Channel Works</b>	Channel Realignment and Restoration	m	\$1,500.00	90	\$135,000
	Contingency (20%)				\$27,000
	<b>Sub Total</b>		0	0	\$162,000
<b>Landscaping</b>	Street Landscaping (5% of road work cost)	LS	\$270,000.00	1	\$270,000
	Contingency (20%)				\$54,000
	<b>Sub Total</b>				\$324,000
<b>Traffic control</b>	Traffic Control and Staging Plan	LS	\$250,000.00	1	\$250,000
	Contingency (20%)				\$50,000
	<b>Sub Total</b>				\$300,000
<b>Engineering</b>	Design and Contract Administration (30% of construction cost)	LS	\$2,340,000.00	1	\$2,340,000

**TOTAL****\$11,670,000**