



**CITY OF PUYALLUP
ENGINEERING SERVICES
ESTIMATE OF COST**

ON-SITE

DATE: 10.02.2023 **ESTIMATOR:** McInnis Engineering
PROJECT NAME & LOCATION: East Town Crossing **TELEPHONE #:** 253.414.1992
2902 E Pioneer

STREET	UNIT	UNIT COST	PLAN QUANTITY	TOTAL
6" CURB & 18" GUTTER	LF	\$19.00		0.00
DRIVE APPROACH	SY	\$55.00		0.00
SIDEWALK	SY	\$35.00		0.00
WHEEL CHAIR RAMP	LS	\$2,800.00		0.00
MONUMENT	EA	\$650.00		0.00
STREET SIGN	EA	\$280.00		0.00
WARNING SIGN	EA	\$230.00		0.00
PERMANENT BARRICADE	EA	\$850.00		0.00
STREET LIGHT	EA	\$5,500.00		0.00
METER BASE AND PANEL FOR ST LT	EA	\$13,200.00		0.00
ROADWAY EXCAVATION / HAUL	CY	\$35.00		0.00
GRAVEL BASE	TON	\$25.00		0.00
TOP COURSE	TON	\$30.00		0.00
CLASS B ASPHALT CONCRETE	TON	\$95.00		0.00
RAISE M.H. / VALVE BOX TO GRAD	EA	\$425.00		0.00
ROUGH GRADING	CY	\$3.00	33377	100,131.00
MISC. ITEMS				0.00
MISC. ITEMS				0.00
MISC. ITEMS				0.00
STORM DRAINAGE				0.00
48" STORM SEWER MANHOLE	EA	\$3,605.00		0.00
54" STORM SEWER MANHOLE	EA	\$4,265.00		0.00
60" STORM SEWER MANHOLE	EA	\$5,075.00		0.00
72" STORM SEWER MANHOLE	EA	\$7,615.00		0.00
84" STORM SEWER MANHOLE	EA	\$10,150.00		0.00
96" STORM SEWER MANHOLE	EA	\$14,720.00		0.00
FLOW CONTROL MANHOLE	EA	\$4,900.00		0.00
CATCH BASIN TYPE I	EA	\$1,800.00		0.00
CATCH BASIN TYPE II	EA	\$3,550.00		0.00
12" PVC	LF	\$65.00		0.00
18" PVC	LF	\$85.00		0.00
21" PVC	LF	\$100.00		0.00
24" PVC	LF	\$125.00		0.00
30" PVC	LF	\$150.00		0.00
36" RCP	LF	\$275.00		0.00
42" RCP	LF	\$350.00		0.00
48" RCP	LF	\$440.00		0.00
BIOSWALE / DETENTION POND	CF	\$2.00		0.00
COMPOST / COALESCE FILTER	LF	\$7.70		0.00
EROSION CONTROL	SF	\$0.50	379679	189,839.50
SITE STABILIZATION	SF	\$1.70	379679	645,454.30
MISC. ITEMS (R_TANKS)	CF	\$8.37	191078	1,600,087.17
MISC. ITEMS				0.00

WATER		UNIT	UNIT COST	PLAN QUANTITY	TOTAL
3/4" WATER SERVICE / METER	EA	\$850.00			0.00
1" WATER SERVICE / METER	EA	\$1,000.00			0.00
1 1/2" WATER SERVICE / METER	EA	\$1,430.00			0.00
2" WATER SERVICE / METER	EA	\$2,000.00			0.00
FIRE HYDRANT ASSEMBLY	EA	\$3,400.00			0.00
2' BLOW OFF ASSEMBLY	EA	\$2,080.00			0.00
8" GATE VALVE	EA	\$820.00			0.00
10" BUTTERFLY VALVE	EA	\$1,300.00			0.00
12" BUTTERFLY VALVE	EA	\$1,500.00			0.00
AIR RELIEF VALVE	EA	\$2,400.00			0.00
8" D.I.P.	LF	\$85.00			0.00
10" D.I.P.	LF	\$100.00			0.00
12" D.I.P.	LF	\$115.00			0.00
16" D.I.P.	LF	\$145.00			0.00
2" DOUBLE CHECK ASSEMBLY	EA	\$1,950.00			0.00
2" REDUCED PRESSURE ASSEMBLY	EA	\$1,625.00			0.00
2" DOUBLE DETECTOR CHECK	EA	\$1,625.00			0.00
ADJUST WM TO GRADE	EA	\$500.00			0.00
MISC. ITEMS					0.00

SANITARY 0.00

SANITARY SEWER MANHOLE	EA	\$4,000.00		0	0.00
DROP MANHOLE	EA	\$5,000.00			0.00
TERMINAL CLEAN OUT	EA	\$425.00			0.00
SIDE SEWER	LF	\$60.00			0.00
8" SANITARY PVC	LF	\$70.00		0	0.00
10" SANITARY PVC	LF	\$75.00			0.00
12" SANITARY PVC	LF	\$90.00			0.00
18" SANITARY PVC	LF	\$100.00			0.00
GREASE INTERCEPTOR	GALLON	\$6.90			0.00
MISC. ITEMS					0.00

RETAINING WALLS 0.00

ROCK RETAINING WALL	S.Y./ FACE	\$250.00			0.00
POURED IN PLACE RETAINING WALL	S.Y./ FACE	\$250.00			0.00
KEYSTONE WALL	S.F./FACE	\$35.00			0.00
MISC. ITEMS					0.00

MISCELLANEOUS 0.00

RELOCATE POWER POLE/TRANSFORMER					0.00
PRIVATE UTILITY TRENCHING	FT	\$3.00			0.00
MISC. ITEMS					0.00
MISC. ITEMS					0.00
MISC. ITEMS					0.00
MISC. ITEMS					0.00

TOTAL	2,535,511.97
20%CONTINGENCY	507,102.39
GRAND TOTAL	3,042,614.37

For City use only:	Total Valuat
	Engineering
	Performance



**CITY OF PUYALLUP
ENGINEERING SERVICES
ESTIMATE OF COST**

OFF-SITE

DATE: _____ ESTIMATOR: _____
 PROJECT NAME & LOCATION: _____
 TELEPHONE #: _____

Conversions
 SY to SF 1SY=9SF

STREET	UNIT	UNIT COST	PLAN QUANTITY	TOTAL
6" CURB & 18" GUTTER	LF	\$19.00		0.00
DRIVE APPROACH	SY	\$55.00		0.00
SIDEWALK	SY	\$35.00		0.00
WHEEL CHAIR RAMP	LS	\$2,800.00		0.00
MONUMENT	EA	\$650.00		0.00
STREET SIGN	EA	\$280.00		0.00
WARNING SIGN	EA	\$230.00		0.00
PERMANENT BARRICADE	EA	\$850.00		0.00
STREET LIGHT	EA	\$5,500.00		0.00
METER BASE AND PANEL FOR ST LT	EA	\$13,200.00		0.00
ROADWAY EXCAVATION / HAUL	CY	\$35.00		0.00
GRAVEL BASE	TON	\$25.00		0.00
TOP COURSE	TON	\$30.00		0.00
CLASS B ASPHALT CONCRETE	TON	\$95.00		0.00
RAISE M.H. / VALVE BOX TO GRAD	EA	\$425.00		0.00
ROUGH GRADING	CY	\$3.00		0.00
MISC. ITEMS				0.00
MISC. ITEMS				0.00
MISC. ITEMS				0.00
STORM DRAINAGE				0.00
48" STORM SEWER MANHOLE	EA	\$3,605.00		0.00
54" STORM SEWER MANHOLE	EA	\$4,265.00		0.00
60" STORM SEWER MANHOLE	EA	\$5,075.00		0.00
72" STORM SEWER MANHOLE	EA	\$7,615.00		0.00
84" STORM SEWER MANHOLE	EA	\$10,150.00		0.00
96" STORM SEWER MANHOLE	EA	\$14,720.00		0.00
FLOW CONTROL MANHOLE	EA	\$4,900.00		0.00
CATCH BASIN TYPE I	EA	\$1,800.00		0.00
CATCH BASIN TYPE II	EA	\$3,550.00		0.00
12" PVC	LF	\$65.00		0.00
18" PVC	LF	\$85.00		0.00
21" PVC	LF	\$100.00		0.00
24" PVC	LF	\$125.00		0.00
30" PVC	LF	\$150.00		0.00
36" RCP	LF	\$275.00		0.00
42" RCP	LF	\$350.00		0.00
48" RCP	LF	\$440.00		0.00
BIOSWALE / DETENTION POND	CF	\$2.00		0.00
COMPOST / COALESCE FILTER	LF	\$7.70		0.00
EROSION CONTROL	SF	\$0.50		0.00
SITE STABILIZATION	SF	\$1.70		0.00
MISC. ITEMS				0.00
MISC. ITEMS				0.00

620.02

The
pav

Exhibit 620

Bal
Cru
Cru
Scr
*G
Per
*3,
gra
tor
apl

Not

•
•
•
•

WATER		UNIT	UNIT COST	PLAN QUANTITY	TOTAL
3/4" WATER SERVICE / METER	EA	\$850.00		0.00	
1" WATER SERVICE / METER	EA	\$1,000.00		0.00	
1 1/2" WATER SERVICE / METER	EA	\$1,430.00		0.00	
2" WATER SERVICE / METER	EA	\$2,000.00		0.00	
FIRE HYDRANT ASSEMBLY	EA	\$3,400.00		0.00	
2' BLOW OFF ASSEMBLY	EA	\$2,080.00		0.00	
8" GATE VALVE	EA	\$820.00		0.00	
10" BUTTERFLY VALVE	EA	\$1,300.00		0.00	
12" BUTTERFLY VALVE	EA	\$1,500.00		0.00	
AIR RELIEF VALVE	EA	\$2,400.00		0.00	
8" D.I.P.	LF	\$85.00		0.00	
10" D.I.P.	LF	\$100.00		0.00	
12" D.I.P.	LF	\$115.00		0.00	
16" D.I.P.	LF	\$145.00		0.00	
2" DOUBLE CHECK ASSEMBLY	EA	\$1,950.00		0.00	
2" REDUCED PRESSURE ASSEMBLY	EA	\$1,625.00		0.00	
2" DOUBLE DETECTOR CHECK	EA	\$1,625.00		0.00	
ADJUST WM TO GRADE	EA	\$500.00		0.00	
MISC. ITEMS				0.00	
SANITARY					0.00
SANITARY SEWER MANHOLE	EA	\$4,000.00		0.00	
DROP MANHOLE	EA	\$5,000.00		0.00	
TERMINAL CLEAN OUT	EA	\$425.00		0.00	
SIDE SEWER	LF	\$60.00		0.00	
8" SANITARY PVC	LF	\$70.00		0.00	
10" SANITARY PVC	LF	\$75.00		0.00	
12" SANITARY PVC	LF	\$90.00		0.00	
18" SANITARY PVC	LF	\$100.00		0.00	
GREASE INTERCEPTOR	GALLON	\$6.90		0.00	
MISC. ITEMS				0.00	
RETAINING WALLS					0.00
ROCK RETAINING WALL	S.Y./FACE	\$250.00		0.00	
POURED IN PLACE RETAINING WALL	S.Y./FACE	\$250.00		0.00	
KEYSTONE WALL	S.F./FACE	\$35.00		0.00	
MISC. ITEMS				0.00	
MISCELLANEOUS					0.00
RELOCATE POWER POLE/TRANSFORMER				0.00	
PRIVATE UTILITY TRENCHING	FT	\$3.00		0.00	
MISC. ITEMS				0.00	
MISC. ITEMS				0.00	
MISC. ITEMS				0.00	
MISC. ITEMS				0.00	
				TOTAL	0.00
				20%CONTINGENCY	0.00
				GRAND TOTAL	0.00

tion	#####
Inspection Fee (3%)	91,278.43
TOTAL	#####
Bond Amount Required (150%)	0.00

Estimating Tables

Tables in Exhibits 620-1 through 620-5h are for developing estimates of quantities for pavement sections, shoulder sections, stockpiles, asphalt distribution, and fog seal.

D-1 Estimating: Miscellaneous Tables

Unit Dry Weight – Gravel Base and Surfacing				
Type of Material	Truck Measure		Compacted on Roadway	
	lb/cy	T/cy	lb/cy	T/cy
Ballast	3,100	1.55	3,900	1.95
Crushed Surfacing Top Course	2,850	1.43	3,700	1.85
Crushed Surfacing Base Course	2,950	1.48	3,700	1.85
Screened Gravel Surfacing			3,700	1.85
Gravel Base			3,400 – 3,800	1.70 – 1.90
Permeable Ballast			2,800	1.40

3,700 lb/cy (1.85 tons/cy) is recommended as the most suitable factor; however, if the grading approaches the coarseness of ballast, the factor would approach 3,800 lb/cy (1.90 tons/cy), and if the grading contains more than 45% sand, the factor would decrease, approaching 3,400 lb/cy (1.70 tons/cy) for material that is essentially all sand.

Notes:

Weights shown are dry weights and corrections are required for water contents.

The tabulated weights for the materials are reasonably close; however, apply corrections in the following order:

$$\text{For specific gravity: } \text{Wt.} = \frac{\text{tabular wt.} \times \text{specific gravity on surface report}}{2.65}$$

$$\text{For water content: } \text{Wt.} = \text{tabular wt.} \times (1 + \text{free water \% in decimals})$$

If material is to be stockpiled, increase required quantities by 10% to allow for waste.

Consider the inclusion of crushed surfacing top course material for keystone when estimating quantities for projects having ballast course.