

Concrete Paving

School Name: Hensel Phelps

Owner: Sound Transit

		Labor				Material		Subcontract		Equipment		
Description	Quantity	MH/Unit	Hours	MH Cost	Amount	Unit cost	Amount	Unit cost	Amount	Unit cost	Amount	Amount
1 Earthwork												
Fine grading, fine grade for slab on grade, machine	75,828 sf	0.002	151.7	58.0	8,796	0.10	7,583			0.10	7,583	\$23,962
4" crushed base	75,828 sf							1.5	113,742			\$113,742
	Earthwork		152		\$8,796		\$7,583		\$113,742		\$7,583	\$137,704
	Sales Tax 10%						\$758		\$11,374		\$758	\$12,891
	Earthwork Subtotal											\$150,594
2 Formwork												
Curved infill edge forms at pour breaks	430 If	0.185	79.6	70	5,569	6	2,580					\$8,149
Install steel edge forms at pour breaks	4,517 If	0.160	722.7	70	50,590	1.5	6,776					\$57,366
Purchase steel edge forms (\$30/LF, Pacific District to pay half)	900 If					15	13,500					\$13,500
Slab blockout forms - 4' Diameter	53 each	0.750	39.8	70	2,783	35	1,855					\$4,638
Slab blockout forms - 2' Diameter	18 each	0.650	11.7	70	819	20	360					\$1,179
Slab blockout forms	431 If	0.200	86.2	70	6,034	5	2,155					\$8,189
Isolation Joint at Building	1,024 If	0.050	51.2	70	3,584	5	5,120					\$8,704
Expansion at Blockouts	1,210 If	0.100	121.0	70	8,468	5	6,049					\$14,517
Small Tools	6,079 mh					2	12,159					\$12,159
Set & Grout MH/Drains to Elevation	49 each	2.500	122.5	70	8,575	25	1,225					\$9,800
	Formwork		1,235		\$86,421		\$51,778					\$138,199
Sales Tax 10%							\$5,178					\$5,178
	Formwork Subtotal											\$143,377
3 Reinforcing Steel												
Reinforcing, slab on grade	8 tons							1500	12,615			\$12,615
Dowel Basket at Transverse Contraction/Construction Joints	9,962 If	0.100	996.2	58	57,780	8.78	87,466					\$145,246
Dowel Basket at Longitudinal Contraction/Construction Joints	1,078 If	0.100	107.8	58	6,252	4.08	4,398					\$10,651
Set Smooth Dowels at Forms	3,695 each	0.150	554.25	58	32,147	4.94	18,253					\$50,400
	Reinforcing Steel		1,658		\$96,179		\$110,118		\$12,615			\$218,911
Sales Tax 10%							\$11,012		\$1,262			\$12,273
	Reinforcing Steel Subtotal											\$231,185
4 Place & Finish Concrete												
Concrete Paving Concrete Ready Mix	1,966 cy					132	259,459					\$259,459
Place Paving	1,872 cy	0.400	748.8	58	43,430					2	3,744	\$47,174
Finish concrete, machine trowel	75,828 sf	0.012	909.9	69	62,786							\$62,786
Tooled Joints at Formwork	7,390 If	0.050	369.5	69	25,496							\$25,496
Protect & Cure, sprayed membrane	75,828 sf	0.003	227.5	58	13,194	0.05	3,791					\$16,985
Sawcut contraction/construction joints	11,040 If	0.030	331.2	58	19,210					1	11,040	\$30,250
Concrete Pumping	908 cy							26	23,608			\$23,608
Concrete washout	6 wk Total Place & Finish Concrete					1200	7,200					\$7,200
		2,587		\$164,115		\$270,451		\$23,608		\$14,784	\$472,958	
						\$27,045		\$2,361		\$1,478	\$30,884	

										\$503,842		
5 Unassigned												
Curing Blankets	2,000	sf	0.040	80	69	5,520	0.75	1,500				\$7,020
Concrete Tenting Protection - Set	46	placements	4.000	184	70	12,880	50	2,300				\$15,180
Concrete Tenting Protection - Remove	46	placements	4.000	184	70	12,880						\$12,880
Joint Sealants at Joints	15,126	lf							2.2	33,277		\$33,277
Unassigned				448		\$31,280		\$3,800		\$33,277		\$68,357
Sales Tax 10%								\$380		\$3,328		\$3,708
Place & Finish Concrete Subtotal												\$72,065
Bulletin 0032 Construction Costs Subtotal				6,079		\$386,791		\$488,102		\$201,566	\$24,603	\$1,101,063
Insurance and Bond Fees at 5%												\$55,053
HP Markup at 10%												\$115,612
HP Estimate Total												\$1,271,728