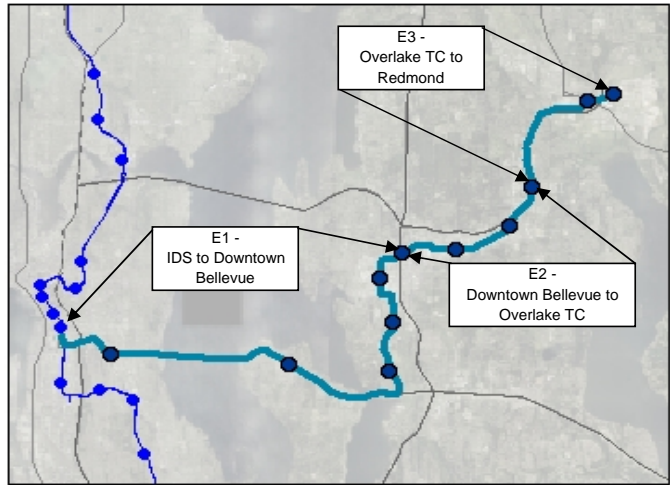


HCT-LRT: Seattle to Downtown Bellevue

Project Number	E1
Subarea	East King
Primary Mode Impacted	Link
Facility Type	Link Service
Version Number	1.0
Date Last Modified	12/8/2005

Project Locator Map



Short Project Description

Construct an East Link project from downtown Seattle to downtown Bellevue and Overlake Hospital via I-90. East Link would connect to Central Link at the International District Station in Seattle and provide stations on I-90 at Rainier Avenue and Mercer Island. In Bellevue, this segment of East Link would have three to four stations which would serve a regional park-and-ride, downtown Bellevue, and Overlake Hospital. The alignment and station locations will be determined through project level design and environmental review. Cost estimates for both aerial and underground alignments in downtown Bellevue are presented here. This project is a 11.4 mile component of the total proposed LRT line from Seattle to Redmond via I-90 and downtown Bellevue.

Project Purpose: Provide reliable High Capacity Transit (HCT) within its own ROW from Seattle to east of downtown Bellevue.

Cost and Schedule

Cost (in Millions of 2005\$)

Schedule

Alignment incl. underground component cost

	Low	High
Agency Admin	\$88.4	\$101.6
Environmental Clearances and PE	\$55.0	\$63.2
Final Design, Specs, Permitting	\$137.4	\$158.1
ROW Acquisition	\$87.3	\$100.4
Construction	\$1,193.0	\$1,372.0
Vehicles	Not Included	Not Included
Contingency	\$151.0	\$173.6
Total Cost	\$1,712.1	\$1,968.9

Proposed Schedule Not Yet Developed

Alignment incl. aerial component cost

	Low	High
Agency Admin	\$72.6	\$83.5
Environmental Clearances and PE	\$40.1	\$46.1
Final Design, Specs, Permitting	\$100.2	\$115.2
ROW Acquisition	\$200.0	\$230.0
Construction	\$869.8	\$1,000.3
Vehicles	Not Included	Not Included
Contingency	\$121.2	\$139.3
Total Cost	\$1,403.9	\$1,614.5

Design Basis

Conceptual

Environmental Documentation Required

- Environmental Impact Statement Required
- Environmental Assessment Required
- Environmental Checklist Required

HCT-LRT: Seattle to Downtown Bellevue

Relationships to Other Projects

<i>Relationship</i>	<i>Project</i>
Dependent on	Construction and implementation of the I-90 R8-A Alternative
Dependent on	D2 Ramp Structural Modifications
Dependent on	I-90 Floating Bridge Structural Modifications
Dependent on	D2 Ramp and I-90 center roadway converted to exclusive light rail use
Dependent on	East Channel Bridge Structural Modifications
Dependent on	Completion of Central Link
Dependent on	Project E4 - Construction of the Maintenance Facility and Vehicle Purchase
Impacted by	Ridership and bus service routing impact by the SR 520 Bridge Replacement Project

Project Partners

Agency

WSDOT
KC Metro
City of Bellevue
City of Seattle
City of Mercer Island

Long Description

This capital project scope and the companion capital cost estimate are intended to include the entire project development cycle (agency and project administration, environmental clearance, design, all aspects of property acquisition permits, agreements, construction, testing, commissioning and contingencies) from project initiation through the start-up of operations.

At this stage of project development, a representative alignment was used to develop a cost estimate. The final alignment and station locations will be determined through project level design and environmental review. The base cost estimate includes design allowance contingency, construction change order contingency, and unallocated contingency. The upper end of the cost range provides for a project reserve of up to 15%.

Assumptions:

- R-8A Project on I-90 will be completed
- Existing I-90 bridge structures can be modified to carry light rail operations
- D-2 ramp and I-90 center roadway are converted to exclusive light rail use
- Fire/life/safety systems and ventilation facilities will be constructed for light rail operations within existing I-90 tunnel and lids
- Existing Bellevue Transit Center provides bus transfer facilities in downtown Bellevue
- Track will be installed using direct fixation
- Modifications to Central Link are generally limited to track, signals, systems and signage work at International District Station
- LRT vehicles and maintenance facility are included in capital cost of Project E4

Representative Alignment Project Elements:

Alignment facilities:

- 6.9 miles of alignment on I-90
- 4.3 miles of new aerial alignment with elevated alternative through downtown Bellevue
- 2.7 miles of new aerial alignment and 1.8 miles new underground alignment with subway alternative through downtown Bellevue

Station facilities:

- Two at-grade stations on I-90 center roadway at Rainier Avenue and Mercer Island
- Four new stations in Bellevue (four aerial with elevated alternative through downtown and two aerial and two underground with subway)
- up to 1,420 structured parking stalls built at existing surface park-and-ride
- kiss-and-ride facilities at up to three stations
- new local bus transfer facilities (four bays) at up to two stations
- 1% of station construction cost to be allocated for art

Utilities:

Utility investigations have not been carried out. Relocation of standard utilities along the alignment has been assumed as part of the scope and has been estimated using an average per route-foot allowance.

HCT-LRT: Seattle to Downtown Bellevue

ROW:

Property interests required for the prototypical alignment include fee acquisitions, partial takes, easements and interagency agreements. Right-of-way requirements include construction staging and contractor laydown areas. No specific provisions are made for contractor parking. Cost estimates include associated relocation, administration and legal costs, and contingency.

Mitigation:

The final project scope will include all mitigation(s) committed to by ST in pertinent, future project-level environmental documents.

Exclusions:

- Maintenance facility will be costed separately (refer to E4 project description)
- Vehicle costs will be costed separately (refer to E4 project description)
- Non-structural architectural and aesthetic elements in excess of the ST art program
- R8-A funding requirements
- Grade separated pedestrian crossings of arterials

Permits:

WSDOT agreements for:

- Transit operations along the D2 Ramps
- Transit operations on I-90 center guideway and associated bridges
- Transit operations on the I-90 East Channel Bridge
- Removal of the HOV connection from I-90 to South Bellevue Way
- Under or over crossing of I-405

BNSF easement:

- For aerial crossing of BNSF
- For underground crossing of BNSF
- Access to the maintenance facility right-of-way requirements

City of Bellevue agreements:

- Transitway agreement to operate within the city streets
- Station Permits

Others:

- Potential operating agreement with King County Metro
- City of Seattle permit for Rainier Avenue Station and connection to Central Link
- Mercer Island permit for Mercer Island Station

Project Dependencies:

- Construction and implementation of the I-90 R8-A Alternative
- D2 Ramp structural modifications
- I-90 Floating Bridge structural modifications
- East Channel Bridge modifications
- Completion of Central Link
- Construction of Project E2 – downtown Bellevue to Overlake Transit Center (or of train turn-back facilities and lead track to the maintenance base)

ST has developed scope definitions for ST2 project proposals for the purposes of developing cost estimates, implementation schedules, a financial plan, and the estimation of project benefits. This scope definition should not be construed as a commitment that all defined features will be included in the final developed project.

Evaluation Measures

Measure	Measurement/ Rating	Notes
Average Weekday Ridership	20,000	
Capital Cost (Underground Align.)	\$1,712.1 - \$1,968.9	in Millions of 2005\$
Capital Cost (Aerial Align.)	\$1,403.9 - \$1,614.5	in Millions of 2005\$
Annual Operating Cost	\$14.8	in Millions of 2005\$
Travel Time & Reliability		
Connectivity & Integration	High	
Land Use & Development		
Customer Experience		
Consistency with Plans		
Public Support		
Risk Avoidance	Low	

HCT-LRT: Seattle to Downtown Bellevue

Key Issues and Benefits

Issues:

- Alignment between I-90 and downtown Bellevue will be determined through project level design and environmental review
- Aerial or subway alignment through downtown Bellevue
- ROW along the alignment
- BNSF interface
- Conversion of D-2 ramp and I-90 center roadway to exclusive light rail use
- Park-and-ride capacity
- Potential wetland, parkland, and historic impacts
- Environmental mitigation

Benefits:

- Provide exclusive right-of-way transit between downtown Seattle and downtown Bellevue, which are the two highest density employment centers in the region
- Provides direct light rail service between the regional growth centers of Northgate, University District, Capitol Hill, downtown Seattle, and downtown Bellevue
- Supports long range transportation and land use plans
- Increases transit reliability, visibility, and simplicity
- Increases job accessibility, particularly from Seattle to the Eastside
- Increases accessibility to special events in Seattle and Bellevue

HCT-LRT: Seattle to Downtown Bellevue

Project Number	E1	Cost	Low	High	
Underground via 108th Ave.		Agency Admin	\$88.4	\$101.6	
		Environmental Clearance and PE	\$55.0	\$63.2	
		Final Design, Specs, Permitting	\$137.4	\$158.1	
		ROW Acquisition	\$87.3	\$100.4	
		Construction	\$1,193.0	\$1,372.0	
		Vehicles	Not Included	Not Included	
		Contingency	\$151.0	\$173.6	
		Total		\$1,712.1	\$1,968.9

Aerial via 110th Ave. NE

Cost	Low	High
Agency Admin	\$72.6	\$83.5
Environmental Clearance and PE	\$40.1	\$46.1
Final Design, Specs, Permitting	\$100.2	\$115.2
ROW Acquisition	\$200.0	\$230.1
Construction	\$869.8	\$1,000.3
Vehicles	Not Included	Not Included
Contingency	\$121.2	\$139.3
Total	\$1,403.9	\$1,614.5

SOUND TRANSIT ST2
HCT Planning
East Corridor: LRT Line and Stations
Capital Cost Estimate
(2005 Dollars in Millions)

Description	ALT E1	
	Seattle - Downtown Bellevue (Underground via 108th Ave.)	Seattle - Downtown Bellevue (Aerial via 110th Ave. NE)
Length (Mile):	11.5	11.2
Number of Stations:	6	6
Number of Revenue Vehicles:	0	0
10 GUIDEWAY & TRACK ELEMENTS	\$462.09	\$300.54
20 STATIONS, STOPS, TERMINALS, INTERMODAL	\$252.77	\$121.60
30 SUPPORT FACILITIES: YARDS, SHOPS, ADMIN. BLDGS	\$60.66	\$60.66
40 SITEWORK & SPECIAL CONDITIONS	\$143.05	\$166.40
50 SYSTEMS	\$81.02	\$79.58
Construction Subtotal (Sum Categories 10 - 50)	\$999.60	\$728.79
Change Order Contingency	\$99.96	\$72.88
Construction Total	\$1,099.56	\$801.67
60 ROW, LAND, EXISTING IMPROVEMENTS	\$87.30	\$200.04
70 VEHICLES	\$0.00	\$0.00
80 PROFESSIONAL SERVICES		
Construction Management	\$93.46	\$68.14
Environmental Clearance and PE	\$54.98	\$40.08
Final Design, Specs, Permitting	\$137.44	\$100.21
Agency Admin (Calculated on subtotal of all items above)	\$88.36	\$72.61
90 UNALLOCATED CONTINGENCY	\$150.96	\$121.17
Total Project Cost	\$1,712.06	\$1,403.92

SOUND TRANSIT ST2
HCT Planning
Light Rail Alternative E1 Seattle to Downtown Bellevue (Underground via 108th Ave.)
Capital Cost Estimate
(2005 Dollars in Millions)

Cat No.	Description	Segment							Yard Lead	Right-Of-Way	Alternative Total
		E1-1 IDS to Mt. Baker Tunnel	E1-2 I-90 Roadway (Bridge)	E1-3 I-90 Roadway (Mercer Island)	E1-4 East Channel Bridge to S. Bellevue Sta.	E1-5 S. Bellevue Sta. to Wilburton Sta.	E1-6 Wilburton Sta. to Bellevue TC Sta. (Underground)	E1-7 Bellevue TC Sta. to Overlake Hospital Sta. (Underground)			
	Length (Mile):	2.4	1.6	3.0	1.0	1.1	1.1	1.3			11.5
	Number of Stations:	1		1	1	1	1	1			6
	Number of Revenue Vehicles:										
10	GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way	\$14.52	\$11.03	\$32.34							\$57.90
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)										\$0.00
10.03	Guideway: At-grade in mixed traffic										\$0.00
10.04	Guideway: Aerial structure				\$36.38	\$40.90	\$17.42				\$94.70
10.05	Guideway: Built-up fill										\$0.00
10.06	Guideway: Underground cut & cover						\$26.74	\$28.00			\$54.74
10.07	Guideway: Underground tunnel	\$16.35					\$49.42	\$116.04			\$181.81
10.08	Guideway: Retained cut or fill			\$1.89							\$1.89
10.09	Track: Direct fixation	\$15.67	\$10.65	\$15.66	\$5.24	\$6.07	\$5.76	\$6.58			\$65.62
10.10	Track: Embedded										\$0.00
10.11	Track: Ballasted										\$0.00
10.12	Track: Special (switches, turnouts)	\$0.95	\$1.07	\$0.62	\$0.62	\$0.62	\$0.62	\$0.95			\$5.43
10.13	Track: Vibration and noise dampening										\$0.00
	Subtotal Category 10	\$47.49	\$22.75	\$50.51	\$42.23	\$47.59	\$99.95	\$151.56			\$462.09
20	STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform	\$6.57		\$4.88							\$11.45
20.02	Aerial station, stop, shelter, mall, terminal, platform				\$18.89	\$18.09					\$36.98
20.03	Underground station, stop, shelter, mall, terminal, platform						\$83.82	\$80.68			\$164.50
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.						\$1.71				\$1.71
20.05	Joint development										\$0.00
20.06	Automobile parking multi-story structure				\$30.00						\$30.00
20.07	Elevators, escalators	\$0.81		\$0.41	\$1.37	\$1.37	\$2.08	\$2.08			\$8.13
	Subtotal Category 20	\$7.39	\$0.00	\$5.29	\$50.27	\$19.46	\$87.61	\$82.76			\$252.77

SOUND TRANSIT ST2
HCT Planning
Light Rail Alternative E1 Seattle to Downtown Bellevue (Underground via 108th Ave.)
Capital Cost Estimate
(2005 Dollars in Millions)

Cat No.	Description	Segment							Yard Lead	Right-Of-Way	Alternative Total	
		E1-1 IDS to Mt. Baker Tunnel	E1-2 I-90 Roadway (Bridge)	E1-3 I-90 Roadway (Mercer Island)	E1-4 East Channel Bridge to S. Bellevue Sta.	E1-5 S. Bellevue Sta. to Wilburton Sta.	E1-6 Wilburton Sta. to Bellevue TC Sta. (Underground)	E1-7 Bellevue TC Sta. to Overlake Hospital Sta. (Underground)				
30	SUPPORT FACILITIES: YARDS, SHOPS, ADMIN. BLDGS											
30.01	Administration Building: Office, sales, storage, revenue counting										\$0.00	
30.02	Light Maintenance Facility										\$0.00	
30.03	Heavy Maintenance Facility										\$0.00	
30.04	Storage or Maintenance of Way Building										\$0.00	
30.05	Yard and Yard Track								\$60.66		\$60.66	
	Subtotal Category 30								\$60.66		\$60.66	
40	SITework & SPECIAL CONDITIONS											
40.01	Demolition, Clearing, Earthwork	\$1.53	\$1.04	\$1.92	\$0.64	\$0.74	\$0.70	\$0.80		\$1.99	\$9.37	
40.02	Site Utilities, Utility Relocation	\$5.05	\$1.76	\$7.83	\$8.35	\$16.35	\$12.91	\$4.42			\$56.68	
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments	\$0.85	\$0.57	\$1.06	\$0.35	\$0.41	\$0.39	\$0.44		\$5.63	\$9.70	
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks	\$3.54	\$2.41	\$4.43	\$1.48	\$1.71	\$1.63	\$1.86			\$17.06	
40.05	Site structures including retaining walls, sound walls					\$3.00					\$3.00	
40.06	Pedestrian / bike access and accommodation, landscaping	\$2.03	\$0.92	\$3.30	\$1.10	\$1.21	\$1.60	\$1.06			\$11.22	
40.07	Automobile, bus, van accessways including roads, parking lots	\$0.04		\$0.10	\$2.47	\$14.07	\$10.74	\$2.31			\$29.72	
40.08	Temporary Facilities and other indirect costs during construction	\$0.63	\$0.33	\$0.91	\$0.70	\$1.83	\$1.37	\$0.53			\$6.30	
	Subtotal Category 40	\$13.67	\$7.03	\$19.54	\$15.09	\$39.33	\$29.34	\$11.43		\$7.62	\$143.05	
50	SYSTEMS											
50.01	Train control and signals	\$5.39	\$3.66	\$6.73	\$2.25	\$2.61	\$2.47	\$2.83			\$25.94	
50.02	Traffic signals and crossing protection	\$0.19			\$0.19	\$0.00					\$0.38	
50.03	Traction power supply: substations	\$2.88	\$1.44	\$2.88	\$1.44	\$1.44	\$1.44	\$1.44			\$12.97	
50.04	Traction power distribution: catenary and third rail	\$4.03	\$2.74	\$5.03	\$1.68	\$1.95	\$1.85	\$2.11			\$19.38	
50.05	Communications	\$4.07	\$2.34	\$4.93	\$2.07	\$2.30	\$2.21	\$2.44			\$20.36	
50.06	Fare collection system and equipment	\$0.26		\$0.26	\$0.26	\$0.26	\$0.48	\$0.48			\$2.00	
50.07	Central Control										\$0.00	
	Subtotal Category 50	\$16.82	\$10.19	\$19.84	\$7.89	\$8.55	\$8.45	\$9.29			\$81.02	
	Subtotal Construction Costs	\$85.36	\$39.97	\$95.17	\$115.48	\$114.94	\$225.35	\$255.04	\$60.66	\$7.62	\$999.60	
	Change Order Contingency	10.0%	\$8.54	\$4.00	\$9.52	\$11.55	\$11.49	\$22.53	\$25.50	\$6.07	\$0.76	\$99.96
	Total Construction Costs	\$93.90	\$43.96	\$104.69	\$127.03	\$126.43	\$247.88	\$280.55	\$66.73	\$8.38	\$1,099.56	

SOUND TRANSIT ST2
HCT Planning
Light Rail Alternative E1 Seattle to Downtown Bellevue (Underground via 108th Ave.)
Capital Cost Estimate
(2005 Dollars in Millions)

Cat No.	Description	Segment							Yard Lead	Right-Of-Way	Alternative Total	
		E1-1 IDS to Mt. Baker Tunnel	E1-2 I-90 Roadway (Bridge)	E1-3 I-90 Roadway (Mercer Island)	E1-4 East Channel Bridge to S. Bellevue Sta.	E1-5 S. Bellevue Sta. to Wilburton Sta.	E1-6 Wilburton Sta. to Bellevue TC Sta. (Underground)	E1-7 Bellevue TC Sta. to Overlake Hospital Sta. (Underground)				
60 ROW, LAND, EXISTING IMPROVEMENTS												
60.01	Purchase or lease of real estate										\$87.30	\$87.30
60.02	Relocation of existing households and businesses											\$0.00
Subtotal Right-of-Way		\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$87.30	\$87.30
70 VEHICLES												
70.01	Light Rail											\$0.00
Subtotal Vehicles												\$0.00
80 PROFESSIONAL SERVICES												
	Construction Management	8.5%	\$7.98	\$3.74	\$8.90	\$10.80	\$10.75	\$21.07	\$23.85	\$5.67	\$0.71	\$93.46
	Environmental Clearance and PE	5.0%	\$4.70	\$2.20	\$5.23	\$6.35	\$6.32	\$12.39	\$14.03	\$3.34	\$0.42	\$54.98
	Final Design and Specs	8.0%	\$7.51	\$3.52	\$8.38	\$10.16	\$10.11	\$19.83	\$22.44	\$5.34	\$0.67	\$87.96
	Design Services during Construction	2.0%	\$1.88	\$0.88	\$2.09	\$2.54	\$2.53	\$4.96	\$5.61	\$1.33	\$0.17	\$21.99
	Design Review by Others	2.0%	\$1.88	\$0.88	\$2.09	\$2.54	\$2.53	\$4.96	\$5.61	\$1.33	\$0.17	\$21.99
	Permitting	0.5%	\$0.47	\$0.22	\$0.52	\$0.64	\$0.63	\$1.24	\$1.40	\$0.33	\$0.04	\$5.50
	Agency Admin (Calculated on subtotal of all items above)	6.0%	\$7.10	\$3.32	\$7.91	\$9.60	\$9.56	\$18.74	\$21.21	\$5.04	\$5.87	\$88.36
Subtotal Professional Services		LS	\$31.51	\$14.75	\$35.13	\$42.63	\$42.43	\$83.19	\$94.15	\$22.39	\$8.05	\$374.25
90 UNALLOCATED CONTINGENCY		10.0%	\$9.39	\$45.40	\$10.47	\$12.70	\$12.64	\$24.79	\$28.05	\$6.67	\$0.84	\$150.96
Project Total			\$134.80	\$104.11	\$150.29	\$182.36	\$181.50	\$355.86	\$402.76	\$95.80	\$104.57	\$1,712.06

SOUND TRANSIT ST2
HCT Planning
Light Rail Alternative E1 Seattle to Downtown Bellevue (Aerial via 100th Ave. NE)
Capital Cost Estimate
(2005 Dollars in Millions)

Cat No.	Description	Segment							Yard Lead	Right-Of-Way	Alternative Total
		E1-1 IDS to Mt. Baker Tunnel	E1-2 I-90 Roadway (Bridge)	E1-3 I-90 Roadway (Mercer Island)	E1-4 East Channel Bridge to S. Bellevue Sta.	E1-5 S. Bellevue Sta. to Wilburton Sta.	E1-8 Wilburton Sta. to Bellevue TC Sta. (Aerial)	E1-9 Bellevue TC Sta. to Overlake Hospital Sta. (Aerial)			
	Length (Mile):	2.4	1.6	3.0	1.0	1.1	1.0	1.1			11.2
	Number of Stations:	1		1	1	1	1	1			6
	Number of Revenue Vehicles:										
10	GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way	\$14.52	\$11.03	\$32.34							\$57.90
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)										\$0.00
10.03	Guideway: At-grade in mixed traffic										\$0.00
10.04	Guideway: Aerial structure				\$36.38	\$40.90	\$35.84	\$41.20			\$154.33
10.05	Guideway: Built-up fill										\$0.00
10.06	Guideway: Underground cut & cover										\$0.00
10.07	Guideway: Underground tunnel	\$16.35									\$16.35
10.08	Guideway: Retained cut or fill			\$1.89							\$1.89
10.09	Track: Direct fixation	\$15.67	\$10.65	\$15.66	\$5.24	\$6.07	\$5.33	\$6.03			\$64.64
10.10	Track: Embedded										\$0.00
10.11	Track: Ballasted										\$0.00
10.12	Track: Special (switches, turnouts)	\$0.95	\$1.07	\$0.62	\$0.62	\$0.62	\$0.62	\$0.95			\$5.43
10.13	Track: Vibration and noise dampening										\$0.00
	Subtotal Category 10	\$47.49	\$22.75	\$50.51	\$42.23	\$47.59	\$41.78	\$48.18			\$300.54
20	STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform	\$6.57		\$4.88							\$11.45
20.02	Aerial station, stop, shelter, mall, terminal, platform				\$18.89	\$18.09	\$17.37	\$17.37			\$71.72
20.03	Underground station, stop, shelter, mall, terminal, platform										\$0.00
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.						\$1.71				\$1.71
20.05	Joint development										\$0.00
20.06	Automobile parking multi-story structure				\$30.00						\$30.00
20.07	Elevators, escalators	\$0.81		\$0.41	\$1.37	\$1.37	\$1.37	\$1.37			\$6.71
	Subtotal Category 20	\$7.39	\$0.00	\$5.29	\$50.27	\$19.46	\$20.45	\$18.74			\$121.60

SOUND TRANSIT ST2
HCT Planning
Light Rail Alternative E1 Seattle to Downtown Bellevue (Aerial via 100th Ave. NE)
Capital Cost Estimate
(2005 Dollars in Millions)

Cat No.	Description	Segment							Yard Lead	Right-Of-Way	Alternative Total	
		E1-1 IDS to Mt. Baker Tunnel	E1-2 I-90 Roadway (Bridge)	E1-3 I-90 Roadway (Mercer Island)	E1-4 East Channel Bridge to S. Bellevue Sta.	E1-5 S. Bellevue Sta. to Wilburton Sta.	E1-8 Wilburton Sta. to Bellevue TC Sta. (Aerial)	E1-9 Bellevue TC Sta. to Overlake Hospital Sta. (Aerial)				
30	SUPPORT FACILITIES: YARDS, SHOPS, ADMIN. BLDGS											
30.01	Administration Building: Office, sales, storage, revenue counting										\$0.00	
30.02	Light Maintenance Facility										\$0.00	
30.03	Heavy Maintenance Facility										\$0.00	
30.04	Storage or Maintenance of Way Building										\$0.00	
30.05	Yard and Yard Track								\$60.66		\$60.66	
	Subtotal Category 30								\$60.66		\$60.66	
40	SITework & SPECIAL CONDITIONS											
40.01	Demolition, Clearing, Earthwork	\$1.53	\$1.04	\$1.92	\$0.64	\$0.74	\$0.65	\$0.74		\$1.52	\$8.79	
40.02	Site Utilities, Utility Relocation	\$5.05	\$1.76	\$7.83	\$8.35	\$16.35	\$15.49	\$14.71			\$69.55	
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments	\$0.85	\$0.57	\$1.06	\$0.35	\$0.41	\$0.36	\$0.41		\$4.32	\$8.32	
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks	\$3.54	\$2.41	\$4.43	\$1.48	\$1.71	\$1.51	\$1.70			\$16.78	
40.05	Site structures including retaining walls, sound walls					\$3.00					\$3.00	
40.06	Pedestrian / bike access and accommodation, landscaping	\$2.03	\$0.92	\$3.30	\$1.10	\$1.21	\$1.10	\$1.20			\$10.86	
40.07	Automobile, bus, van accessways including roads, parking lots	\$0.04		\$0.10	\$2.47	\$14.07	\$16.17	\$8.79			\$41.63	
40.08	Temporary Facilities and other indirect costs during construction	\$0.63	\$0.33	\$0.91	\$0.70	\$1.83	\$1.73	\$1.34			\$7.47	
	Subtotal Category 40	\$13.67	\$7.03	\$19.54	\$15.09	\$39.33	\$37.01	\$28.89		\$5.84	\$166.40	
50	SYSTEMS											
50.01	Train control and signals	\$5.39	\$3.66	\$6.73	\$2.25	\$2.61	\$2.29	\$2.59			\$25.51	
50.02	Traffic signals and crossing protection	\$0.19			\$0.19	\$0.00					\$0.38	
50.03	Traction power supply: substations	\$2.88	\$1.44	\$2.88	\$1.44	\$1.44	\$1.44	\$1.44			\$12.97	
50.04	Traction power distribution: catenary and third rail	\$4.03	\$2.74	\$5.03	\$1.68	\$1.95	\$1.71	\$1.94			\$19.07	
50.05	Communications	\$4.07	\$2.34	\$4.93	\$2.07	\$2.30	\$2.09	\$2.28			\$20.09	
50.06	Fare collection system and equipment	\$0.26		\$0.26	\$0.26	\$0.26	\$0.26	\$0.26			\$1.56	
50.07	Central Control										\$0.00	
	Subtotal Category 50	\$16.82	\$10.19	\$19.84	\$7.89	\$8.55	\$7.79	\$8.51			\$79.58	
	Subtotal Construction Costs	\$85.36	\$39.97	\$95.17	\$115.48	\$114.94	\$107.04	\$104.32	\$60.66	\$5.84	\$728.79	
	Change Order Contingency	10.0%	\$8.54	\$4.00	\$9.52	\$11.55	\$11.49	\$10.70	\$10.43	\$6.07	\$0.58	\$72.88
	Total Construction Costs	\$93.90	\$43.96	\$104.69	\$127.03	\$126.43	\$117.74	\$114.75	\$66.73	\$6.43	\$801.67	

SOUND TRANSIT ST2
HCT Planning
Light Rail Alternative E1 Seattle to Downtown Bellevue (Aerial via 100th Ave. NE)
Capital Cost Estimate
(2005 Dollars in Millions)

Cat No.	Description	Segment								Yard Lead	Right-Of-Way	Alternative Total
		E1-1 IDS to Mt. Baker Tunnel	E1-2 I-90 Roadway (Bridge)	E1-3 I-90 Roadway (Mercer Island)	E1-4 East Channel Bridge to S. Bellevue Sta.	E1-5 S. Bellevue Sta. to Wilburton Sta.	E1-8 Wilburton Sta. to Bellevue TC Sta. (Aerial)	E1-9 Bellevue TC Sta. to Overlake Hospital Sta. (Aerial)				
60 ROW, LAND, EXISTING IMPROVEMENTS												
60.01	Purchase or lease of real estate										\$200.04	\$200.04
60.02	Relocation of existing households and businesses											\$0.00
Subtotal Right-of-Way		\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$200.04	\$200.04
70 VEHICLES												
70.01	Light Rail											\$0.00
Subtotal Vehicles												\$0.00
80 PROFESSIONAL SERVICES												
	Construction Management	8.5%	\$7.98	\$3.74	\$8.90	\$10.80	\$10.75	\$10.01	\$9.75	\$5.67	\$0.55	\$68.14
	Environmental Clearance and PE	5.0%	\$4.70	\$2.20	\$5.23	\$6.35	\$6.32	\$5.89	\$5.74	\$3.34	\$0.32	\$40.08
	Final Design and Specs	8.0%	\$7.51	\$3.52	\$8.38	\$10.16	\$10.11	\$9.42	\$9.18	\$5.34	\$0.51	\$64.13
	Design Services during Construction	2.0%	\$1.88	\$0.88	\$2.09	\$2.54	\$2.53	\$2.35	\$2.30	\$1.33	\$0.13	\$16.03
	Design Review by Others	2.0%	\$1.88	\$0.88	\$2.09	\$2.54	\$2.53	\$2.35	\$2.30	\$1.33	\$0.13	\$16.03
	Permitting	0.5%	\$0.47	\$0.22	\$0.52	\$0.64	\$0.63	\$0.59	\$0.57	\$0.33	\$0.03	\$4.01
	Agency Admin (Calculated on subtotal of all items above)	6.0%	\$7.10	\$3.32	\$7.91	\$9.60	\$9.56	\$8.90	\$8.68	\$5.04	\$12.49	\$72.61
Subtotal Professional Services		LS	\$31.51	\$14.75	\$35.13	\$42.63	\$42.43	\$39.52	\$38.51	\$22.39	\$14.16	\$281.04
90 UNALLOCATED CONTINGENCY		10.0%	\$9.39	\$45.40	\$10.47	\$12.70	\$12.64	\$11.77	\$11.48	\$6.67	\$0.64	\$121.17
Project Total			\$134.80	\$104.11	\$150.29	\$182.36	\$181.50	\$169.03	\$164.74	\$95.80	\$221.27	\$1,403.92

SOUND TRANSIT ST2
HCT Planning
Segment E1-1
Sta. 2020+00 to Sta. 2145+00

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way									
	2020+00	- 2056+00	At-Grade Dbl Track on Exist. Structure - Direct Fixation	AG20	3,600	RF	\$692	\$2,492,250	25%	\$3,115,313
	2056+00	- 2094+00	At-Grade Dbl Track in Express Median - Direct Fixation	AG09	3,800	RF	\$1,038	\$3,944,137	25%	\$4,930,171
	2094+00	- 2097+00	At-Grade Dbl Track on Exist. Structure - Direct Fixation	AG20	300	RF	\$692	\$207,688	25%	\$259,609
	2097+00	- 2107+00	At-Grade Dbl Track in Express Median - Direct Fixation	AG09	1,000	RF	\$1,038	\$1,037,931	25%	\$1,297,413
	2142+00	- 2145+00	At-Grade Dbl Track on Exist. Structure - Direct Fixation	AG20	300	RF	\$692	\$207,688	25%	\$259,609
			Bridge Structure, Modification of Existing Superstructure	BR10	100,800	SF	\$37	\$3,729,600	25%	\$4,662,000
			Element Total		9,000	RF		\$11,619,293		\$14,524,116
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)									
			N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic									
			N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure									
			N/A							
			Element Total		0	RF		\$0		\$0
10.05	Guideway: Built-up fill									
			N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover									
			N/A							
			Element Total		0	RF		\$0		\$0
10.07	Guideway: Underground tunnel									
	2107+00	- 2142+00	Dbl Track in Exist. Tunnel - Direct Fixation	TL20	3,500	RF	\$3,460	\$12,109,306	35%	\$16,347,563
			Element Total		3,500	RF		\$12,109,306		\$16,347,563
10.08	Guideway: Retained cut or fill									
			N/A							
			Element Total		0	RF		\$0		\$0
10.09	Track: Direct fixation									
	2020+00	- 2145+00	Direct Fixation - Double Track	TK21	12,500	RF	\$872	\$10,900,000	15%	\$12,535,000
			Allowance for Modifications at IDS		25.0%			\$2,725,000	15%	\$3,133,750
			Element Total		12,500	RF		\$13,625,000		\$15,668,750
10.10	Track: Embedded									
			N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted									
			N/A							
			Element Total		0	RF		\$0		\$0
10.12	Track: Special (switches, turnouts)									
			Direct Fixation - Double Cross-over	SP18	1	EA	\$536,280	\$536,280	15%	\$616,722
			Direct Fixation - Turnout	SP28	2	EA	\$143,880	\$287,760	15%	\$330,924
			Element Total		1	LS		\$824,040		\$947,646
10.13	Track: Vibration and noise dampening									
			N/A							
			Element Total		1	LS		\$0		\$0
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform									

SOUND TRANSIT ST2
HCT Planning
Segment E1-1
Sta. 2020+00 to Sta. 2145+00

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
	IDS Station Mods.		Signage and Systems Mod. to Existing Station	ST90	1	LS	\$612,035	\$612,035	30%	\$795,646
	Rainier Ave. Station		At-Grade - 20 ft. Center Platform - 4 Vehicle	ST08	1	LS	\$2,956,713	\$2,956,713	25%	\$3,695,891
	Access to Rainier Ave.		Station Pedestrian Vertical Access, to 25ft.	PA20	2	EA	\$362,149	\$724,299	15%	\$832,944
	Access to 23rd Ave.		Allowance for Abutment Modifications for Ped Access		50.0%			\$362,149	15%	\$416,472
			Station Pedestrian Vertical Access, to 25ft.	PA20	2	EA	\$362,149	\$724,299	15%	\$832,944
			Element Total		1	LS		\$5,379,495		\$6,573,896
20.02	Aerial station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.03	Underground station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.		N/A							
			Element Total		1	LS		\$0		\$0
20.05	Joint development		N/A							
			Element Total		1	LS		\$0		\$0
20.06	Automobile parking multi-story structure		N/A							
			Element Total		1	LS		\$0		\$0
20.07	Elevators, escalators									
	Access to Rainier Ave.		Pedestrian Vertical Access - Elevator, 25ft.	PA30	2	EA	\$162,410	\$324,820	25%	\$406,025
	Access to 23rd Ave.		Pedestrian Vertical Access - Elevator, 25ft.	PA30	2	EA	\$162,410	\$324,820	25%	\$406,025
			Element Total		1	LS		\$649,640		\$812,050
40	SITWORK & SPECIAL CONDITIONS									
40.01	Demolition, Clearing, Earthwork									
	2020+00 - 2145+00		Demolition Allow. - Guideway	DM80	12,500	RF	\$98	\$1,226,250	25%	\$1,532,813
			Element Total		1	LS		\$1,226,250		\$1,532,813
40.02	Site Utilities, Utility Relocation									
	2020+00 - 2056+00		Utility Modifications Allow. - Level 3	UM03	3,600	RF	\$676	\$2,432,880	30%	\$3,162,744
	2056+00 - 2145+00		Utility Modifications Allow. - Level 1	UM01	8,900	RF	\$164	\$1,455,150	30%	\$1,891,695
			Element Total		1	LS		\$3,888,030		\$5,054,439
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments									
	2020+00 - 2145+00		Hazardous Material Removal Allowance	HM01	12,500	RF	\$52	\$650,000	30%	\$845,000
			Element Total		1	LS		\$650,000		\$845,000
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks									
	2020+00 - 2145+00		Environmental Mitigation Allow. - Level 3	EM03	12,500	RF	\$218	\$2,725,000	30%	\$3,542,500
			Element Total		1	LS		\$2,725,000		\$3,542,500
40.05	Site structures including retaining walls, sound walls		N/A							
			Element Total		1	LS		\$0		\$0
40.06	Pedestrian / bike access and accommodation, landscaping									
	2020+00 - 2145+00		Landscaping Allow. - Guideway	LS10	12,500	RF	\$76	\$953,750	25%	\$1,192,188
	Ped Access on Rainier Ave.		Station Pedestrian Access - Plaza	PA10	18,000	SF	\$27	\$486,000	25%	\$607,500
			Artwork (1% of Guideway & Stations)		1%			\$181,932	25%	\$227,415
			Element Total		1	LS		\$1,621,682		\$2,027,102
40.07	Automobile, bus, van accessways including roads, parking lots									
	Airport Way and D2 Ramp		Roadway Modifications Allow. - Half Intersection	RM02	1	EA	\$20,315	\$20,315	25%	\$25,394
			Allowance for Closing D2 Ramp		50%			\$10,158	25%	\$12,697
			Element Total		1	LS		\$30,473		\$38,091
40.08	Temporary Facilities and other indirect costs during construction									

**SOUND TRANSIT ST2
HCT Planning
Segment E1-1
Sta. 2020+00 to Sta. 2145+00**

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
			Temporary Facilities (5.% of Category 40)		5.0%			\$507,072	25%	\$633,840
			Element Total		1	LS		\$507,072		\$633,840
50 SYSTEMS										
50.01	Train control and signals 2020+00 - 2145+00		Train Control - Double Track	TC02	12,500	RF	\$300	\$3,746,875	15%	\$4,308,906
			Special Trackwork Allowance		25%			\$936,719	15%	\$1,077,227
			Element Total		12,500	RF		\$4,683,594		\$5,386,133
50.02	Traffic signals and crossing protection									
	Airport Way and D2 Ramp		Roadway Modifications Allow. - New Signal	RM21	1	EA	\$163,500	\$163,500	15%	\$188,025
			Element Total		1	EA		\$163,500		\$188,025
50.03	Traction power supply: substations									
			Traction Power, Substation	TP03	2	EA	\$1,253,500	\$2,507,000	15%	\$2,883,050
			Element Total		2	EA		\$2,507,000		\$2,883,050
50.04	Traction power distribution: catenary and third rail 2020+00 - 2145+00		OCS System - Standard, Double Track	TP02	12,500	RF	\$280	\$3,500,000	15%	\$4,025,000
			Element Total		12,500	RF		\$3,500,000		\$4,025,000
50.05	Communications 2020+00 - 2145+00		Communication, Line - Double	CM02	12,500	RF	\$240	\$2,997,500	15%	\$3,447,125
			Communication, Station	CM05	1	EA	\$545,000	\$545,000	15%	\$626,750
			Element Total		12,500	RF		\$3,542,500		\$4,073,875
50.06	Fare collection system and equipment									
			Fare Collection - 1 Entrance	FC01	1	EA	\$226,720	\$226,720	15%	\$260,728
			Element Total		1	LS		\$226,720		\$260,728
50.07	Central Control									
			N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-2
Sta. 2145+00 to Sta. 2230+00

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONGTY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way									
	2145+00	- 2230+00	At-Grade Dbl Track on Exist. Structure - Direct Fixation	AG20	8,500	RF	\$692	\$5,884,479	25%	\$7,355,599
			Allowance for Light Rail Conversion Mitigation		50%			\$2,942,240	25%	\$3,677,800
			Element Total		8,500	RF		\$8,826,719		\$11,033,399
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)									
			N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic									
			N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure									
			N/A							
			Element Total		0	RF		\$0		\$0
10.05	Guideway: Built-up fill									
			N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover									
			N/A							
			Element Total		0	RF		\$0		\$0
10.07	Guideway: Underground tunnel									
			N/A							
			Element Total		0	RF		\$0		\$0
10.08	Guideway: Retained cut or fill									
			N/A							
			Element Total		0	RF		\$0		\$0
10.09	Track: Direct fixation									
	2145+00	- 2230+00	Direct Fixation - Double Track	TK21	8,500	RF	\$872	\$7,412,000	15%	\$8,523,800
			Allowance for Special Flexible Joints		25%			\$1,853,000	15%	\$2,130,950
			Element Total		8,500	RF		\$9,265,000		\$10,654,750
10.10	Track: Embedded									
			N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted									
			N/A							
			Element Total		0	RF		\$0		\$0
10.12	Track: Special (switches, turnouts)									
			Special Trackwork Allowance		10.0%			\$926,500	15%	\$1,065,475
			Element Total		1	LS		\$926,500		\$1,065,475
10.13	Track: Vibration and noise dampening									
			N/A							
			Element Total		1	LS		\$0		\$0
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform									
			N/A							
			Element Total		1	LS		\$0		\$0
20.02	Aerial station, stop, shelter, mall, terminal, platform									
			N/A							
			Element Total		1	LS		\$0		\$0
20.03	Underground station, stop, shelter, mall, terminal, platform									
			N/A							

SOUND TRANSIT ST2
HCT Planning
Segment E1-2
Sta. 2145+00 to Sta. 2230+00

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
			Element Total		1	LS		\$0		\$0
20.04			Other stations, landings, terminals: Intermodal, ferry, trolley, etc.							
			N/A							
			Element Total		1	LS		\$0		\$0
20.05			Joint development							
			N/A							
			Element Total		1	LS		\$0		\$0
20.06			Automobile parking multi-story structure							
			N/A							
			Element Total		1	LS		\$0		\$0
20.07			Elevators, escalators							
			N/A							
			Element Total		1	LS		\$0		\$0
40 SITEWORK & SPECIAL CONDITIONS										
40.01			Demolition, Clearing, Earthwork							
	2145+00	2230+00	Demolition Allow. - Guideway	DM80	8,500	RF	\$98	\$833,850	25%	\$1,042,313
			Element Total		1	LS		\$833,850		\$1,042,313
40.02			Site Utilities, Utility Relocation							
	2145+00	2230+00	Utility Modifications Allow. - Level 1	UM01	3,500	RF	\$164	\$572,250	30%	\$743,925
			Storm Water Management Allowance	UM10	84,000	SF	\$9	\$778,260	30%	\$1,011,738
			Element Total		1	LS		\$1,350,510		\$1,755,663
40.03			Haz. mat'l, contam'd soil removal/mitigation, ground water treatments							
	2145+00	2230+00	Hazardous Material Removal Allowance	HM01	8,500	RF	\$52	\$442,000	30%	\$574,600
			Element Total		1	LS		\$442,000		\$574,600
40.04			Environmental mitigation, e.g. wetlands, historic/archeologic, parks							
	2145+00	2230+00	Enviromental Mitigation Allow. - Level 3	EM03	8,500	RF	\$218	\$1,853,000	30%	\$2,408,900
			Element Total		1	LS		\$1,853,000		\$2,408,900
40.05			Site structures including retaining walls, sound walls							
			N/A							
			Element Total		1	LS		\$0		\$0
40.06			Pedestrian / bike access and accommodation, landscaping							
	2145+00	2230+00	Landscaping Allow. - Guideway	LS10	8,500	RF	\$76	\$648,550	25%	\$810,688
			Artwork (1% of Guideway & Stations)		1%			\$88,267	25%	\$110,334
			Element Total		1	LS		\$736,817		\$921,021
40.07			Automobile, bus, van accessways including roads, parking lots							
			N/A							
			Element Total		1	LS		\$0		\$0
40.08			Temporary Facilities and other indirect costs during construction							
			Temporary Facilities (5.% of Category 40)		5.0%			\$260,809	25%	\$326,011
			Element Total		1	LS		\$260,809		\$326,011
50 SYSTEMS										
50.01			Train control and signals							
	2145+00	2230+00	Train Control - Double Track	TC02	8,500	RF	\$300	\$2,547,875	15%	\$2,930,056
			Special Trackwork Allowance		25%			\$636,969	15%	\$732,514
			Element Total		8,500	RF		\$3,184,844		\$3,662,570
50.02			Traffic signals and crossing protection							
			N/A							
			Element Total		0	EA		\$0		\$0
50.03			Traction power supply: substations							
			Traction Power, Substation	TP03	1	EA	\$1,253,500	\$1,253,500	15%	\$1,441,525
			Element Total		1	EA		\$1,253,500		\$1,441,525
50.04			Traction power distribution: catenary and third rail							
	2145+00	2230+00	OCS System - Standard, Double Track	TP02	8,500	RF	\$280	\$2,380,000	15%	\$2,737,000

SOUND TRANSIT ST2
HCT Planning
Segment E1-2
Sta. 2145+00 to Sta. 2230+00

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
			Element Total		8,500	RF		\$2,380,000		\$2,737,000
50.05	Communications									
	2145+00 -	2230+00	Communication, Line - Double	CM02	8,500	RF	\$240	\$2,038,300	15%	\$2,344,045
			Element Total		8,500	RF		\$2,038,300		\$2,344,045
50.06	Fare collection system and equipment									
			N/A							
			Element Total		1	LS		\$0		\$0
50.07	Central Control									
			N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-3
Sta. 2230+00 to Sta. 2386+18

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way									
	2230+00	2237+00	At-Grade Dbl Track in Express Median - Direct Fixation	AG09	700	RF	\$1,038	\$726,551	25%	\$908,189
	2237+00	2266+00	Dbl Track in Exist. Tunnel - Direct Fixation	TL20	2,900	RF	\$3,460	\$10,033,425	25%	\$12,541,781
	2266+00	2300+00	At-Grade Dbl Track in Express Median - Direct Fixation	AG09	3,400	RF	\$1,038	\$3,528,964	25%	\$4,411,205
	2300+00	2304+00	Dbl Track in Exist. Tunnel - Direct Fixation	TL20	400	RF	\$3,460	\$1,383,921	25%	\$1,729,901
	2304+00	2367+00	At-Grade Dbl Track in Express Median - Direct Fixation	AG09	6,300	RF	\$1,038	\$6,538,963	25%	\$8,173,704
	2367+00	2381+00	At-Grade Dbl Track on Exist. Structure - Direct Fixation	AG20	1,400	RF	\$692	\$969,208	25%	\$1,211,510
			Bridge Structure, Modification of Existing Superstructure	BR10	72,800	SF	\$37	\$2,693,600	25%	\$3,367,000
			Element Total		15,100	RF		\$25,874,633		\$32,343,292
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)									
			N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic									
			N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure									
			N/A							
			Element Total		0	RF		\$0		\$0
10.05	Guideway: Built-up fill									
			N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover									
			N/A							
			Element Total		0	RF		\$0		\$0
10.07	Guideway: Underground tunnel									
			N/A							
			Element Total		0	RF		\$0		\$0
10.08	Guideway: Retained cut or fill									
	2381+00	2386+18	Retained Fill - Two Sides (Avg. 20' Height)	RF22	518	RF	\$2,923	\$1,514,226	25%	\$1,892,783
			Element Total		518	RF		\$1,514,226		\$1,892,783
10.09	Track: Direct fixation									
	2230+00	2386+18	Direct Fixation - Double Track	TK21	15,618	RF	\$872	\$13,618,896	15%	\$15,661,730
			Element Total		15,618	RF		\$13,618,896		\$15,661,730
10.10	Track: Embedded									
			N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted									
			N/A							
			Element Total		0	RF		\$0		\$0
10.12	Track: Special (switches, turnouts)									
			Direct Fixation - Double Cross-over	SP18	1	EA	\$536,280	\$536,280	15%	\$616,722
			Element Total		1	LS		\$536,280		\$616,722
10.13	Track: Vibration and noise dampening									
			N/A							
			Element Total		1	LS		\$0		\$0
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform									
	Mercer Island Sta.		At-Grade - 25 ft. Center Platform - 4 Vehicle Platform	ST10	1	LS	\$3,519,548	\$3,519,548	15%	\$4,047,480

SOUND TRANSIT ST2
HCT Planning
Segment E1-3
Sta. 2230+00 to Sta. 2386+18

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTCY	TOTAL COST
			Station Pedestrian Vertical Access, to 25ft.	PA20	2	EA	\$362,149	\$724,299	15%	\$832,944
			Element Total		1	LS		\$4,243,847		\$4,880,424
20.02	Aerial station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.03	Underground station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.		N/A							
			Element Total		1	LS		\$0		\$0
20.05	Joint development		N/A							
			Element Total		1	LS		\$0		\$0
20.06	Automobile parking multi-story structure		N/A							
			Element Total		1	LS		\$0		\$0
20.07	Elevators, escalators									
	Mercer Island Sta.		Pedestrian Vertical Access - Elevator, 25ft.	PA30	2	EA	\$162,410	\$324,820	25%	\$406,025
			Element Total		1	LS		\$324,820		\$406,025
40 SITEWORK & SPECIAL CONDITIONS										
40.01	Demolition, Clearing, Earthwork									
	2230+00 - 2386+18		Demolition Allow. - Guideway	DM80	15,618	RF	\$98	\$1,532,126	25%	\$1,915,157
			Element Total		1	LS		\$1,532,126		\$1,915,157
40.02	Site Utilities, Utility Relocation									
	2230+00 - 2386+18		Utility Modifications Allow. - Level 1	UM01	15,618	RF	\$164	\$2,553,543	30%	\$3,319,606
			Storm Water Management Allowance	UM10	374,832	SF	\$9	\$3,472,818	30%	\$4,514,664
			Element Total		1	LS		\$6,026,361		\$7,834,270
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments									
	2230+00 - 2386+18		Hazardous Material Removal Allowance	HM01	15,618	RF	\$52	\$812,136	30%	\$1,055,777
			Element Total		1	LS		\$812,136		\$1,055,777
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks									
	2230+00 - 2386+18		Environmental Mitigation Allow. - Level 2	EM03	15,618	RF	\$218	\$3,404,724	30%	\$4,426,141
			Element Total		1	LS		\$3,404,724		\$4,426,141
40.05	Site structures including retaining walls, sound walls		N/A							
			Element Total		1	LS		\$0		\$0
40.06	Pedestrian / bike access and accommodation, landscaping									
	2230+00 - 2386+18		Landscaping Allow. - Guideway	LS10	15,618	RF	\$76	\$1,191,653	25%	\$1,489,567
	Ped Access Improvements		Station Pedestrian Access - Plaza	PA10	41,600	SF	\$27	\$1,123,200	25%	\$1,404,000
			Artwork (1% of Guideway & Stations)		1%		\$322,693	25%	\$403,366	
			Element Total		1	LS		\$2,637,546		\$3,296,933
40.07	Automobile, bus, van accessways including roads, parking lots									
	Kiss & Ride @ P&R Lot		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	2,500	SF	\$32	\$81,044	25%	\$101,305
			Element Total		1	LS		\$81,044		\$101,305
40.08	Temporary Facilities and other indirect costs during construction									
			Temporary Facilities (5.% of Category 40)		5.0%			\$724,697	25%	\$905,871
			Element Total		1	LS		\$724,697		\$905,871
50 SYSTEMS										
50.01	Train control and signals									
	2230+00 - 2386+18		Train Control - Double Track	TC02	15,618	RF	\$300	\$4,681,496	15%	\$5,383,720
			Special Trackwork Allowance		25%		\$1,170,374	15%	\$1,345,930	
			Element Total		15,618	RF		\$5,851,869		\$6,729,650

SOUND TRANSIT ST2
HCT Planning
Segment E1-3
Sta. 2230+00 to Sta. 2386+18

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
50.02	Traffic signals and crossing protection		N/A							
			Element Total		0	EA		\$0		\$0
50.03	Traction power supply: substations									
			Traction Power, Substation	TP03	2	EA	\$1,253,500	\$2,507,000	15%	\$2,883,050
			Element Total		2	EA		\$2,507,000		\$2,883,050
50.04	Traction power distribution: catenary and third rail									
	2230+00	- 2386+18	OCS System - Standard, Double Track	TP02	15,618	RF	\$280	\$4,373,040	15%	\$5,028,996
			Element Total		1	LS		\$4,373,040		\$5,028,996
50.05	Communications									
	2230+00	- 2386+18	Communication, Line - Double	CM02	15,618	RF	\$240	\$3,745,196	15%	\$4,306,976
			Communication, Station	CM05	1	EA	\$545,000	\$545,000	15%	\$626,750
			Element Total		15,618	RF		\$4,290,196		\$4,933,726
50.06	Fare collection system and equipment									
			Fare Collection - 1 Entrance	FC01	1	EA	\$226,720	\$226,720	15%	\$260,728
			Element Total		1	LS		\$226,720		\$260,728
50.07	Central Control		N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-4
Sta. 3020+00 to Sta. 3072+22

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way		N/A							
			Element Total		0	RF		\$0		\$0
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)		N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic		N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure									
	3020+00	- 3021+00	Precast Segmental Box Girder (Avg. Pier 20' Ht.)	EL22	100	RF	\$5,456	\$545,600	25%	\$682,000
	3021+00	- 3023+40	Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL23	240	RF	\$5,574	\$1,337,760	25%	\$1,672,200
	3023+40	- 3030+00	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	660	RF	\$5,712	\$3,769,920	25%	\$4,712,400
	3030+00	- 3032+80	Precast Segmental Box Girder (Avg. Pier 50' Ht.)	EL25	280	RF	\$5,873	\$1,644,440	25%	\$2,055,550
	3032+80	- 3035+30	Precast Segmental Box Girder (Avg. Pier 60' Ht.)	EL26	250	RF	\$6,063	\$1,515,750	25%	\$1,894,688
	3035+30	- 3045+00	Precast Segmental Box Girder (Avg. Pier 70' Ht.)	EL27	970	RF	\$6,280	\$6,091,600	25%	\$7,614,500
	3045+00	- 3054+00	Precast Segmental Box Girder (Avg. Pier 60' Ht.)	EL26	900	RF	\$6,063	\$5,456,700	25%	\$6,820,875
	3054+00	- 3060+00	Precast Segmental Box Girder (Avg. Pier 50' Ht.)	EL25	600	RF	\$5,873	\$3,523,800	25%	\$4,404,750
	3060+00	- 3063+00	Precast Segmental Box Girder, Crossover (Avg. Pier 40' Ht.)	EL54	300	RF	\$6,475	\$1,942,500	25%	\$2,428,125
	3063+00	- 3064+32	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	132	RF	\$5,712	\$753,984	25%	\$942,480
	3064+32	- 3068+32	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL33	400	RF	\$6,149	\$2,459,600	25%	\$3,074,500
	3068+32	- 3072+12	Guideway included in station cost below		380	RF				
	3072+12	- 3072+22	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL33	10	RF	\$6,149	\$61,490	25%	\$76,863
			Element Total		5,222	RF		\$29,103,144		\$36,378,930
10.05	Guideway: Built-up fill		N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover		N/A							
			Element Total		0	RF		\$0		\$0
10.07	Guideway: Underground tunnel		N/A							
			Element Total		0	RF		\$0		\$0
10.08	Guideway: Retained cut or fill		N/A							
			Element Total		0	RF		\$0		\$0
10.09	Track: Direct fixation									
	3020+00	- 3072+22	Direct Fixation - Double Track	TK21	5,222	RF	\$872	\$4,553,584	15%	\$5,236,622
			Element Total		5,222	RF		\$4,553,584		\$5,236,622
10.10	Track: Embedded		N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted		N/A							
			Element Total		0	RF		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-4
Sta. 3020+00 to Sta. 3072+22

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTCY	TOTAL COST
10.12	Track: Special (switches, turnouts)									
			Direct Fixation - Double Cross-over	SP18	1	EA	\$536,280	\$536,280	15%	\$616,722
			Element Total		1	LS		\$536,280		\$616,722
10.13	Track: Vibration and noise dampening									
			N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-4
Sta. 3020+00 to Sta. 3072+22

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTCY	TOTAL COST
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.02	Aerial station, stop, shelter, mall, terminal, platform									
	South Bellevue Sta.		Aerial - 30' Center Platform - 4 Vehicle with Mezz.	ST23	1	LS	\$15,729,107	\$15,729,107	15%	\$18,088,473
			Signage Mod. to Existing Station	PA01	4,000	SF	\$175	\$700,000	15%	\$805,000
			Element Total		1	LS		\$16,429,107		\$18,893,473
20.03	Underground station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.		N/A							
			Element Total		1	LS		\$0		\$0
20.05	Joint development		N/A							
			Element Total		1	LS		\$0		\$0
20.06	Automobile parking multi-story structure									
	South Bellevue Sta.		Station Site Facilities - Parking Garage	SF20	1,420	SP	\$18,372	\$26,088,240	15%	\$30,001,476
			Element Total		1	LS		\$26,088,240		\$30,001,476
20.07	Elevators, escalators									
			Pedestrian Vertical Access - Elevator, 40ft.	PA31	2	EA	\$239,800	\$479,600	15%	\$551,540
			Pedestrian Vertical Access - Escalator, 25ft.	PA35	2	EA	\$212,550	\$425,100	15%	\$488,865
			Pedestrian Vertical Access - Escalator, 40ft.	PA36	1	EA	\$289,940	\$289,940	15%	\$333,431
			Element Total		1	LS		\$1,194,640		\$1,373,836
40 SITEWORK & SPECIAL CONDITIONS										
40.01	Demolition, Clearing, Earthwork									
	3020+00	- 3072+22	Demolition Allow. - Guideway	DM80	5,222	RF	\$98	\$512,278	25%	\$640,348
			Element Total		1	LS		\$512,278		\$640,348
40.02	Site Utilities, Utility Relocation									
	3020+00	- 3050+00	Utility Modifications Allow. - Level 1	UM01	3,000	RF	\$164	\$490,500	30%	\$637,650
	3050+00	- 3072+22	Utility Modifications Allow. - Level 2	UM03	2,222	RF	\$676	\$1,501,628	30%	\$1,952,116
	3050+00	- 3072+22	Utility Undergrounding Allow	UM04	2,222	RF	\$872	\$1,937,584	30%	\$2,518,859
	3050+00	- 3072+22	Utility Undergrounding Allow	UM04	2,222	RF	\$872	\$1,937,584	30%	\$2,518,859
			Storm Water Management Allowance	UM10	60,000	SF	\$9	\$555,900	30%	\$722,670
			Element Total		1	LS		\$6,423,196		\$8,350,154
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments									
	3020+00	- 3072+22	Hazardous Material Removal Allowance	HM01	5,222	RF	\$52	\$271,544	30%	\$353,007
			Element Total		1	LS		\$271,544		\$353,007
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks									
	3020+00	- 3072+22	Environmental Mitigation Allow. - Level 2	EM03	5,222	RF	\$218	\$1,138,396	30%	\$1,479,915
			Element Total		1	LS		\$1,138,396		\$1,479,915
40.05	Site structures including retaining walls, sound walls		N/A							
			Element Total		1	LS		\$0		\$0
40.06	Pedestrian / bike access and accommodation, landscaping									
	3020+00	- 3072+22	Landscaping Allow. - Guideway	LS10	5,222	RF	\$76	\$398,439	25%	\$498,048
			Artwork (1% of Guideway & Stations)		1%			\$479,966	25%	\$599,958
			Element Total		1	LS		\$878,405		\$1,098,006
40.07	Automobile, bus, van accessways including roads, parking lots									
	P&R Access		Roadway Modifications Allow. - Full Intersection	RM01	1	EA	\$28,541	\$28,541	25%	\$35,676

SOUND TRANSIT ST2
HCT Planning
Segment E1-4
Sta. 3020+00 to Sta. 3072+22

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
	South Bellevue Way		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	60,000	SF	\$32	\$1,945,050	25%	\$2,431,313
			Element Total		1	LS		\$1,973,591		\$2,466,989
40.08	Temporary Facilities and other indirect costs during construction		Temporary Facilities (5.% of Category 40)		5.0%			\$559,870	25%	\$699,838
			Element Total		1	LS		\$559,870		\$699,838
50 SYSTEMS										
50.01	Train control and signals		Train Control - Double Track	TC02	5,222	RF	\$300	\$1,565,295	15%	\$1,800,089
	3020+00	3072+22	Special Trackwork Allowance		25%			\$391,324	15%	\$450,022
			Element Total		5,222	RF		\$1,956,618		\$2,250,111
50.02	Traffic signals and crossing protection		Roadway Modifications Allow. - New Signal	RM21	1	EA	\$163,500	\$163,500	15%	\$188,025
			Element Total		1	EA		\$163,500		\$188,025
50.03	Traction power supply: substations		Traction Power, Substation	TP03	1	EA	\$1,253,500	\$1,253,500	15%	\$1,441,525
			Element Total		1	EA		\$1,253,500		\$1,441,525
50.04	Traction power distribution: catenary and third rail		OCS System - Standard, Double Track	TP02	5,222	RF	\$280	\$1,462,160	15%	\$1,681,484
	3020+00	3072+22	Element Total		5,222	RF		\$1,462,160		\$1,681,484
50.05	Communications		Communication, Line - Double	CM02	5,222	RF	\$240	\$1,252,236	15%	\$1,440,071
	3020+00	3072+22	Communication, Station	CM05	1	EA	\$545,000	\$545,000	15%	\$626,750
			Element Total		5,222	RF		\$1,797,236		\$2,066,821
50.06	Fare collection system and equipment		Fare Collection - 1 Entrance	FC01	1	EA	\$226,720	\$226,720	15%	\$260,728
			Element Total		1	LS		\$226,720		\$260,728
50.07	Central Control		N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-5
Sta. 3072+22 to Sta. 3105+72
Sta. 4020+00 to Sta. 4047+00

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way		N/A							
			Element Total		0	RF		\$0		\$0
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)		N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic		N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure									
	3072+22	- 3076+12	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL33	390	RF	\$6,149	\$2,398,110	25%	\$2,997,638
	3076+12	- 3098+00	Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL23	2,188	RF	\$5,574	\$12,195,912	25%	\$15,244,890
	3098+00	- 3105+72	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	772	RF	\$5,712	\$4,409,664	25%	\$5,512,080
	4020+00	- 4035+00	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	1,500	RF	\$5,712	\$8,568,000	25%	\$10,710,000
	4035+00	- 4038+00	Precast Segmental Box Girder, Crossover (Avg. Pier 40' Ht.)	EL54	300	RF	\$6,475	\$1,942,500	25%	\$2,428,125
	4038+00	- 4039+10	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	110	RF	\$5,712	\$628,320	25%	\$785,400
	4039+10	- 4043+10	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL34	400	RF	\$6,295	\$2,518,000	25%	\$3,147,500
	4043+10	- 4046+90	Guideway included in Station Cos		380	RF				
	4046+90	- 4047+00	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL34	10	RF	\$6,295	\$62,950	25%	\$78,688
			Element Total		6,050	RF		\$32,723,456		\$40,904,320
10.05	Guideway: Built-up fill		N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover		N/A							
			Element Total		0	RF		\$0		\$0
10.07	Guideway: Underground tunnel		N/A							
			Element Total		0	RF		\$0		\$0
10.08	Guideway: Retained cut or fill		N/A							
			Element Total		0	RF		\$0		\$0
10.09	Track: Direct fixation									
	3072+22	- 3105+72	Direct Fixation - Double Track	TK21	3,350	RF	\$872	\$2,921,200	15%	\$3,359,380
	4020+00	- 4047+00	Direct Fixation - Double Track	TK21	2,700	RF	\$872	\$2,354,400	15%	\$2,707,560
			Element Total		6,050	RF		\$5,275,600		\$6,066,940
10.10	Track: Embedded		N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted		N/A							
			Element Total		0	RF		\$0		\$0
10.12	Track: Special (switches, turnouts)									
			Direct Fixation - Double Cross-over	SP18	1	EA	\$536,280	\$536,280	15%	\$616,722
			Element Total		1	LS		\$536,280		\$616,722
10.13	Track: Vibration and noise dampening		N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-5
 Sta. 3072+22 to Sta. 3105+72
 Sta. 4020+00 to Sta. 4047+00

TRANSIT MODE: LRT

CAT NO.	STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
	BEGIN	END		ID	QTY					
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-5
Sta. 3072+22 to Sta. 3105+72
Sta. 4020+00 to Sta. 4047+00

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
20.02	Aerial station, stop, shelter, mall, terminal, platform									
	Wilburton Sta.		Aerial - 30' Center Platform - 4 Vehicle with Mezz.	ST23	1	LS	\$15,729,107	\$15,729,107	15%	\$18,088,473
			Element Total		1	LS		\$15,729,107		\$18,088,473
20.03	Underground station, stop, shelter, mall, terminal, platform									
			N/A		1	LS		\$0		\$0
			Element Total		1	LS		\$0		\$0
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.									
			N/A		1	LS		\$0		\$0
			Element Total		1	LS		\$0		\$0
20.05	Joint development									
			N/A		1	LS		\$0		\$0
			Element Total		1	LS		\$0		\$0
20.06	Automobile parking multi-story structure									
			N/A		1	LS		\$0		\$0
			Element Total		1	LS		\$0		\$0
20.07	Elevators, escalators									
			Pedestrian Vertical Access - Elevator, 40ft.	PA31	2	EA	\$239,800	\$479,600	15%	\$551,540
			Pedestrian Vertical Access - Escalator, 25ft.	PA35	2	EA	\$212,550	\$425,100	15%	\$488,865
			Pedestrian Vertical Access - Escalator, 40ft.	PA36	1	EA	\$289,940	\$289,940	15%	\$333,431
			Element Total		1	LS		\$1,194,640		\$1,373,836
40 SITEWORK & SPECIAL CONDITIONS										
40.01	Demolition, Clearing, Earthwork									
	3072+22 - 3105+72		Demolition Allow. - Guideway	DM80	3,350	RF	\$98	\$328,635	25%	\$410,794
	4020+00 - 4047+00		Demolition Allow. - Guideway	DM80	2,700	RF	\$98	\$264,870	25%	\$331,088
			Element Total		1	LS		\$593,505		\$741,881
40.02	Site Utilities, Utility Relocation									
	3072+22 - 3105+72		Utility Modifications Allow. - Level 3	UM03	3,350	RF	\$676	\$2,263,930	30%	\$2,943,109
	4020+00 - 4047+00		Utility Modifications Allow. - Level 3	UM03	2,700	RF	\$676	\$1,824,660	30%	\$2,372,058
	3072+22 - 3105+72		Utility Undergrounding Allow	UM04	3,350	RF	\$872	\$2,921,200	30%	\$3,797,560
	4020+00 - 4047+00		Utility Undergrounding Allow	UM04	2,700	RF	\$872	\$2,354,400	30%	\$3,060,720
			Storm Water Management Allowance	UM10	347,160	SF	\$9	\$3,216,437	30%	\$4,181,369
			Element Total		1	LS		\$12,580,627		\$16,354,816
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments									
	3072+22 - 3105+72		Hazardous Material Removal Allowance	HM01	3,350	RF	\$52	\$174,200	30%	\$226,460
	4020+00 - 4047+00		Hazardous Material Removal Allowance	HM01	2,700	RF	\$52	\$140,400	30%	\$182,520
			Element Total		1	LS		\$314,600		\$408,980
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks									
	3072+22 - 3105+72		Environmental Mitigation Allow. - Level 3	EM03	3,350	RF	\$218	\$730,300	30%	\$949,390
	4020+00 - 4047+00		Environmental Mitigation Allow. - Level 3	EM03	2,700	RF	\$218	\$588,600	30%	\$765,180
			Element Total		1	LS		\$1,318,900		\$1,714,570
40.05	Site structures including retaining walls, sound walls									
	South Bellevue Way		Retaining Wall - Secant Pile < 30ft.	RW03	7,000	SF	\$330	\$2,307,312	30%	\$2,999,506
			Element Total		1	LS		\$2,307,312		\$2,999,506
40.06	Pedestrian / bike access and accommodation, landscaping									
	3072+22 - 3105+72		Landscaping Allow. - Guideway	LS10	3,350	RF	\$76	\$255,605	25%	\$319,506
	4020+00 - 4047+00		Landscaping Allow. - Guideway	LS10	2,700	RF	\$76	\$206,010	25%	\$257,513
			Artwork (1% of Guideway & Stations)		1%			\$508,119	25%	\$635,149
			Element Total		1	LS		\$969,734		\$1,212,168
40.07	Automobile, bus, van accessways including roads, parking lots									
	South Bellevue Way		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	192,000	SF	\$32	\$6,224,161	25%	\$7,780,201
	112th Ave. SE		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	155,160	SF	\$32	\$5,029,900	25%	\$6,287,375
			Element Total		1	LS		\$11,254,061		\$14,067,576

SOUND TRANSIT ST2
HCT Planning
Segment E1-5
Sta. 3072+22 to Sta. 3105+72
Sta. 4020+00 to Sta. 4047+00

TRANSIT MODE: LRT

CAT NO.	STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
	BEGIN	END		ID	QTY					
40.08	Temporary Facilities and other indirect costs during construction									
			Temporary Facilities (5.% of Category 40)		5.0%			\$1,466,937	25%	\$1,833,671
			Element Total			1	LS	\$1,466,937		\$1,833,671

SOUND TRANSIT ST2
HCT Planning
Segment E1-5
Sta. 3072+22 to Sta. 3105+72
Sta. 4020+00 to Sta. 4047+00

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
50 SYSTEMS										
50.01	Train control and signals									
	3072+22	- 3105+72	Train Control - Double Track	TC02	3,350	RF	\$300	\$1,004,163	15%	\$1,154,787
	4020+00	- 4047+00	Train Control - Double Track	TC02	2,700	RF	\$300	\$809,325	15%	\$930,724
			Special Trackwork Allowance			25%		\$453,372	15%	\$521,378
			Element Total		6,050	RF		\$2,266,859		\$2,606,888
50.02	Traffic signals and crossing protection									
			N/A							
			Element Total		0	EA		\$0		\$0
50.03	Traction power supply: substations									
			Traction Power, Substation	TP03	1	EA	\$1,253,500	\$1,253,500	15%	\$1,441,525
			Element Total		1	EA		\$1,253,500		\$1,441,525
50.04	Traction power distribution: catenary and third rail									
	3072+22	- 3105+72	OCS System - Standard, Double Track	TP02	3,350	RF	\$280	\$938,000	15%	\$1,078,700
	4020+00	- 4047+00	OCS System - Standard, Double Track	TP02	2,700	RF	\$280	\$756,000	15%	\$869,400
			Element Total		6,050	RF		\$1,694,000		\$1,948,100
50.05	Communications									
	3072+22	- 3105+72	Communication, Line - Double	CM02	3,350	RF	\$240	\$803,330	15%	\$923,830
	4020+00	- 4047+00	Communication, Line - Double	CM02	2,700	RF	\$240	\$647,460	15%	\$744,579
			Communication, Station	CM05	1	EA	\$545,000	\$545,000	15%	\$626,750
			Element Total		6,050	RF		\$1,995,790		\$2,295,159
50.06	Fare collection system and equipment									
			Fare Collection - 1 Entrance	FC01	1	EA	\$226,720	\$226,720	15%	\$260,728
			Element Total		1	LS		\$226,720		\$260,728
50.07	Central Control									
			N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-6
Sta. 4047+00 to Sta. 4104+40
(Underground Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way		N/A							
			Element Total		0	RF		\$0		\$0
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)		N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic		N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure									
	4047+00	- 4050+90	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL34	390	RF	\$6,295	\$2,455,050	25%	\$3,068,813
	4050+90	- 4051+50	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	60	RF	\$5,712	\$342,720	25%	\$428,400
	4051+50	- 4071+00	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	1,950	RF	\$5,712	\$11,138,400	25%	\$13,923,000
			Element Total		2,400	RF		\$13,936,170		\$17,420,213
10.05	Guideway: Built-up fill		N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover									
	4071+00	- 4079+00	Cut and Cover Box (Avg. 35' Depth)	CC03	800	RF	\$24,757	\$19,805,884	35%	\$26,737,944
			Element Total		800	RF		\$19,805,884		\$26,737,944
10.07	Guideway: Underground tunnel									
	4079+00	- 4099+00	TBM Tunnel - Twin Bore (18'-10" I.D.)	TL05	2,000	RF	\$15,917	\$31,834,257	35%	\$42,976,246
	4099+00	- 4104+40	Guideway included in Station Cos		540	RF				
			Allowance for Bldg Fndt Stabilizator		15%			\$4,775,138	35%	\$6,446,437
			Element Total		2,540	RF		\$36,609,395		\$49,422,683
10.08	Guideway: Retained cut or fill		N/A							
			Element Total		0	RF		\$0		\$0
10.09	Track: Direct fixation									
	4047+00	- 4104+40	Direct Fixation - Double Track	TK21	5,740	RF	\$872	\$5,005,280	15%	\$5,756,072
			Element Total		5,740	RF		\$5,005,280		\$5,756,072
10.10	Track: Embedded		N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted		N/A							
			Element Total		0	RF		\$0		\$0
10.12	Track: Special (switches, turnouts)									
			Direct Fixation - Double Cross-over	SP18	1	EA	\$536,280	\$536,280	15%	\$616,722
			Element Total		1	LS		\$536,280		\$616,722
10.13	Track: Vibration and noise dampening		N/A							
			Element Total		1	LS		\$0		\$0
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.02	Aerial station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
 HCT Planning
 Segment E1-6
 Sta. 4047+00 to Sta. 4104+40
 (Underground Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
	BEGIN	END		ID	QTY					

SOUND TRANSIT ST2
HCT Planning
Segment E1-6
Sta. 4047+00 to Sta. 4104+40
(Underground Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
20.03 Underground station, stop, shelter, mall, terminal, platform										
	Bellevue TC Sta.		Cut & Cover - 30' Center Platform - 4 Vehicle Allowance for Restrictive Site	ST30	1	LS	\$48,308,799	\$48,308,799	30%	\$62,801,439
					5%			\$2,415,440	30%	\$3,140,072
	Sta. East Access		Station Pedestrian Access Cut & Cover Box	PA05	125	LF	\$55,004	\$6,875,500	30%	\$8,938,150
	Sta. West Access		Station Pedestrian Access Cut & Cover Box	PA05	125	LF	\$55,004	\$6,875,500	30%	\$8,938,150
			Element Total		1	LS		\$64,475,239		\$83,817,811
20.04 Other stations, landings, terminals: Intermodal, ferry, trolley, etc.										
	Upgrade Exist. Bellevue TC		Station Site Facilities - Intermodal Facility	SF10	55,000	SF	\$27	\$1,485,000	15%	\$1,707,750
			Element Total		1	LS		\$1,485,000		\$1,707,750
20.05 Joint development										
			N/A							
			Element Total		1	LS		\$0		\$0
20.06 Automobile parking multi-story structure										
			N/A							
			Element Total		1	LS		\$0		\$0
20.07 Elevators, escalators										
	Bellevue TC Sta.		Pedestrian Vertical Access - Elevator, 25ft.	PA30	2	EA	\$162,410	\$324,820	15%	\$373,543
			Pedestrian Vertical Access - Elevator, 40ft.	PA31	2	EA	\$239,800	\$479,600	15%	\$551,540
			Pedestrian Vertical Access - Escalator, 25ft.	PA35	2	EA	\$212,550	\$425,100	15%	\$488,865
			Pedestrian Vertical Access - Escalator, 40ft.	PA36	2	EA	\$289,940	\$579,880	15%	\$666,862
			Element Total		1	LS		\$1,809,400		\$2,080,810
40 SITEWORK & SPECIAL CONDITIONS										
40.01 Demolition, Clearing, Earthwork										
	4047+00 - 4104+40		Demolition Allow. - Guideway	DM80	5,740	RF	\$98	\$563,094	25%	\$703,868
			Element Total		1	LS		\$563,094		\$703,868
40.02 Site Utilities, Utility Relocation										
	4047+00 - 4079+00		Utility Modifications Allow. - Level 3	UM03	3,200	RF	\$676	\$2,162,560	30%	\$2,811,328
	4047+00 - 4079+00		Utility Undergrounding Allow	UM04	3,200	RF	\$872	\$2,790,400	30%	\$3,627,520
	4079+00 - 4099+00		Utility Modifications Allow. - Level 2	UM02	2,000	RF	\$403	\$806,600	30%	\$1,048,580
	4079+00 - 4104+40		Utility Modifications Allow. - Level 3	UM03	2,540	RF	\$676	\$1,716,532	30%	\$2,231,492
			Storm Water Management Allowance	UM10	265,000	SF	\$9	\$2,455,225	30%	\$3,191,793
			Element Total		1	LS		\$9,931,317		\$12,910,712
40.03 Haz. mat'l, contam'd soil removal/mitigation, ground water treatments										
	4047+00 - 4104+40		Hazardous Material Removal Allowance	HM01	5,740	RF	\$52	\$298,480	30%	\$388,024
			Element Total		1	LS		\$298,480		\$388,024
40.04 Environmental mitigation, e.g. wetlands, historic/archeologic, parks										
	4047+00 - 4104+40		Enviromental Mitigation Allow. - Level 3	EM03	5,740	RF	\$218	\$1,251,320	30%	\$1,626,716
			Element Total		1	LS		\$1,251,320		\$1,626,716
40.05 Site structures including retaining walls, sound walls										
			N/A							
			Element Total		1	LS		\$0		\$0
40.06 Pedestrian / bike access and accommodation, landscaping										
	4047+00 - 4079+00		Landscaping Allow. - Guideway	LS10	3,200	RF	\$76	\$244,160	25%	\$305,200
	4099+00 - 4104+40		Landscaping Allow. - Guideway	LS10	540	RF	\$76	\$41,202	25%	\$51,503
			Artwork (1% of Guideway & Stations)		1%			\$994,617	25%	\$1,243,272
			Element Total		1	LS		\$1,279,979		\$1,599,974
40.07 Automobile, bus, van accessways including roads, parking lots										
	112th Ave. SE		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	208,000	SF	\$32	\$6,742,841	25%	\$8,428,551
	108th Ave. SE		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	57,000	SF	\$32	\$1,847,798	25%	\$2,309,747
			Element Total		1	LS		\$8,590,639		\$10,738,298

SOUND TRANSIT ST2
HCT Planning
Segment E1-6
Sta. 4047+00 to Sta. 4104+40
(Underground Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
40.08			Temporary Facilities and other indirect costs during construction							
			Temporary Facilities (5.% of Category 40)		5.0%			\$1,095,741	25%	\$1,369,677
			Element Total		1	LS		\$1,095,741		\$1,369,677
50 SYSTEMS										
50.01			Train control and signals							
	4047+00	4104+40	Train Control - Double Track	TC02	5,740	RF	\$300	\$1,720,565	15%	\$1,978,650
			Special Trackwork Allowance		25%			\$430,141	15%	\$494,662
			Element Total		5,740	RF		\$2,150,706		\$2,473,312
50.02			Traffic signals and crossing protection							
			N/A							
			Element Total		0	EA		\$0		\$0
50.03			Traction power supply: substations							
			Traction Power, Substation	TP03	1	EA	\$1,253,500	\$1,253,500	15%	\$1,441,525
			Element Total		1	EA		\$1,253,500		\$1,441,525
50.04			Traction power distribution: catenary and third rail							
	4047+00	4104+40	OCS System - Standard, Double Track	TP02	5,740	RF	\$280	\$1,607,200	15%	\$1,848,280
			Element Total		5,740	RF		\$1,607,200		\$1,848,280
50.05			Communications							
	4047+00	4104+40	Communication, Line - Double	CM02	5,740	RF	\$240	\$1,376,452	15%	\$1,582,920
			Communication, Station	CM05	1	EA	\$545,000	\$545,000	15%	\$626,750
			Element Total		5,740	RF		\$1,921,452		\$2,209,670
50.06			Fare collection system and equipment							
			Fare Collection - 2 Entrance	FC02	1	EA	\$414,200	\$414,200	15%	\$476,330
			Element Total		1	LS		\$414,200		\$476,330
50.07			Central Control							
			N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-7
Sta. 4104+40 to Sta. 4170+00
(Underground Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way		N/A							
			Element Total		0	RF		\$0		\$0
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)		N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic		N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure		N/A							
			Element Total		0	RF		\$0		\$0
10.05	Guideway: Built-up fill		N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover									
	4155+50	- 4157+00	Cut and Cover Box (Avg. 55' Depth)	CC05	150	RF	\$28,712	\$4,306,745	35%	\$5,814,106
	4164+00	- 4165+50	Cut and Cover Box (Avg. 55' Depth)	CC05	150	RF	\$28,712	\$4,306,745	35%	\$5,814,106
			Allowance for Turnout Special Box		20%			\$1,722,698	35%	\$2,325,642
	4137+42	- 4140+62	Cut and Cover Box (Avg. 75' Depth)	CC07	320	RF	\$32,513	\$10,404,261	35%	\$14,045,752
			Element Total		620	RF		\$20,740,450		\$27,999,607
10.07	Guideway: Underground tunnel									
	4104+40	- 4137+42	TBM Tunnel - Twin Bore (18'-10" I.D.)	TL05	3,302	RF	\$15,917	\$52,558,358	35%	\$70,953,783
	4137+42	- 4146+02	Guideway included in Station Cos		860	RF				
	4146+02	- 4155+50	TBM Tunnel - Twin Bore (18'-10" I.D.)	TL05	948	RF	\$15,917	\$15,089,438	35%	\$20,370,741
	4157+00	- 4164+00	TBM Tunnel - Twin Bore (18'-10" I.D.)	TL05	700	RF	\$15,917	\$11,141,990	35%	\$15,041,686
	4165+50	- 4170+00	TBM Tunnel - Twin Bore (18'-10" I.D.)	TL05	450	RF	\$15,917	\$7,162,708	35%	\$9,669,655
			Element Total		6,260	RF		\$85,952,493		\$116,035,865
10.08	Guideway: Retained cut or fill		N/A							
			Element Total		0	RF		\$0		\$0
10.09	Track: Direct fixation									
	4104+40	- 4170+00	Direct Fixation - Double Track	TK21	6,560	RF	\$872	\$5,720,320	15%	\$6,578,368
			Element Total		6,560	RF		\$5,720,320		\$6,578,368
10.10	Track: Embedded		N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted		N/A							
			Element Total		0	RF		\$0		\$0
10.12	Track: Special (switches, turnouts)									
			Direct Fixation - Double Cross-over	SP18	1	EA	\$536,280	\$536,280	15%	\$616,722
			Direct Fixation - Turnout	SP28	2	EA	\$143,880	\$287,760	15%	\$330,924
			Element Total		1	LS		\$824,040		\$947,646
10.13	Track: Vibration and noise dampening		N/A							
			Element Total		1	LS		\$0		\$0
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.02	Aerial station, stop, shelter, mall, terminal, platform		N/A							

SOUND TRANSIT ST2
HCT Planning
Segment E1-7
Sta. 4104+40 to Sta. 4170+00
(Underground Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTCY	TOTAL COST
			Element Total		1	LS		\$0		\$0
20.03	Underground station, stop, shelter, mall, terminal, platform									
	Overlake Hospital Sta.		Cut & Cover - 30' Center Platform - 4 Vehicle	ST30	1	LS	\$48,308,799	\$48,308,799	30%	\$62,801,439
	Sta. North Access		Station Pedestrian Access Cut & Cover Box	PA05	100	LF	\$55,004	\$5,500,400	30%	\$7,150,520
	Sta. South Access		Station Pedestrian Access Cut & Cover Box	PA05	150	LF	\$55,004	\$8,250,600	30%	\$10,725,780
			Element Total		1	LS		\$62,059,799		\$80,677,739
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.									
			N/A							
			Element Total		1	LS		\$0		\$0
20.05	Joint development									
			N/A							
			Element Total		1	LS		\$0		\$0
20.06	Automobile parking multi-story structure									
			N/A							
			Element Total		1	LS		\$0		\$0
20.07	Elevators, escalators									
	Overlake Hospital Sta.		Pedestrian Vertical Access - Elevator, 25ft.	PA30	2	EA	\$162,410	\$324,820	15%	\$373,543
			Pedestrian Vertical Access - Elevator, 40ft.	PA31	2	EA	\$239,800	\$479,600	15%	\$551,540
			Pedestrian Vertical Access - Escalator, 25ft.	PA35	2	EA	\$212,550	\$425,100	15%	\$488,865
			Pedestrian Vertical Access - Escalator, 40ft.	PA36	2	EA	\$289,940	\$579,880	15%	\$666,862
			Element Total		1	LS		\$1,809,400		\$2,080,810
40	SITWORK & SPECIAL CONDITIONS									
40.01	Demolition, Clearing, Earthwork									
	4104+40 - 4170+00		Demolition Allow. - Guideway	DM80	6,560	RF	\$98	\$643,536	25%	\$804,420
			Element Total		1	LS		\$643,536		\$804,420
40.02	Site Utilities, Utility Relocation									
	4104+40 - 4140+62		Utility Modifications Allow. - Level 2	UM02	3,622	RF	\$403	\$1,460,753	30%	\$1,898,978
	4140+62 - 4146+02		Utility Modifications Allow. - Level 3	UM03	540	RF	\$676	\$364,932	30%	\$474,412
	4146+02 - 4155+50		Utility Modifications Allow. - Level 2	UM02	948	RF	\$403	\$382,328	30%	\$497,027
	4155+50 - 4157+00		Utility Modifications Allow. - Level 3	UM03	150	RF	\$676	\$101,370	30%	\$131,781
	4157+00 - 4164+00		Utility Modifications Allow. - Level 2	UM02	700	RF	\$403	\$282,310	30%	\$367,003
	4164+00 - 4165+50		Utility Modifications Allow. - Level 3	UM03	150	RF	\$676	\$101,370	30%	\$131,781
	4165+50 - 4170+00		Utility Modifications Allow. - Level 2	UM02	450	RF	\$403	\$181,485	30%	\$235,931
			Storm Water Management Allowance	UM10	57,000	SF	\$9	\$528,105	30%	\$686,537
			Element Total		1	LS		\$3,402,653		\$4,423,449
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments									
	4104+40 - 4170+00		Hazardous Material Removal Allowance	HM01	6,560	RF	\$52	\$341,120	30%	\$443,456
			Element Total		1	LS		\$341,120		\$443,456
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks									
	4104+40 - 4170+00		Enviromental Mitigation Allow. - Level 3	EM03	6,560	RF	\$218	\$1,430,080	30%	\$1,859,104
			Element Total		1	LS		\$1,430,080		\$1,859,104
40.05	Site structures including retaining walls, sound walls									
			N/A							
			Element Total		1	LS		\$0		\$0
40.06	Pedestrian / bike access and accommodation, landscaping									
	4140+62 - 4146+02		Landscaping Allow. - Guideway	LS10	540	RF	\$76	\$41,202	25%	\$51,503
			Artwork (1% of Guideway & Stations)		1%			\$806,777	25%	\$1,008,472
			Element Total		1	LS		\$847,979		\$1,059,974
40.07	Automobile, bus, van accessways including roads, parking lots									
	108th Ave. SE		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	27,000	SF	\$32	\$875,273	25%	\$1,094,091

SOUND TRANSIT ST2
HCT Planning
Segment E1-7
Sta. 4104+40 to Sta. 4170+00
(Underground Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
	Sta. South Access		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	12,000	SF	\$32	\$389,010	25%	\$486,263
	C&C Box		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	18,000	SF	\$32	\$583,515	25%	\$729,394
			Element Total		1	LS		\$1,847,798		\$2,309,747
40.08	Temporary Facilities and other indirect costs during construction		Temporary Facilities (5.% of Category 40)		5.0%			\$425,658	25%	\$532,073
			Element Total		1	LS		\$425,658		\$532,073
50 SYSTEMS										
50.01	Train control and signals		Train Control - Double Track	TC02	6,560	RF	\$300	\$1,966,360	15%	\$2,261,314
	4104+40	4170+00	Special Trackwork Allowance		25%			\$491,590	15%	\$565,329
			Element Total		6,560	RF		\$2,457,950		\$2,826,643
50.02	Traffic signals and crossing protection		N/A							
			Element Total		0	EA		\$0		\$0
50.03	Traction power supply: substations		Traction Power, Substation	TP03	1	EA	\$1,253,500	\$1,253,500	15%	\$1,441,525
			Element Total		1	EA		\$1,253,500		\$1,441,525
50.04	Traction power distribution: catenary and third rail		OCS System - Standard, Double Track	TP02	6,560	RF	\$280	\$1,836,800	15%	\$2,112,320
	4104+40	4170+00	Element Total		6,560	RF		\$1,836,800		\$2,112,320
50.05	Communications		Communication, Line - Double	CM02	6,560	RF	\$240	\$1,573,088	15%	\$1,809,051
	4104+40	4170+00	Communication, Station	CM05	1	EA	\$545,000	\$545,000	15%	\$626,750
			Element Total		6,560	RF		\$2,118,088		\$2,435,801
50.06	Fare collection system and equipment		Fare Collection - 2 Entrance	FC02	1	EA	\$414,200	\$414,200	15%	\$476,330
			Element Total		1	LS		\$414,200		\$476,330
50.07	Central Control		N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-8
Sta. 4047+00 to Sta. 4100+12
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way		N/A							
			Element Total		0	RF		\$0		\$0
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)		N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic		N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure									
	4047+00	- 4050+90	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL34	390	RF	\$6,295	\$2,455,050	25%	\$3,068,813
	4050+90	- 4051+50	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	60	RF	\$5,712	\$342,720	25%	\$428,400
	4051+50	- 4071+00	Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL23	1,950	RF	\$5,574	\$10,869,300	25%	\$13,586,625
	4071+00	- 4081+00	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	1,000	RF	\$5,712	\$5,712,000	25%	\$7,140,000
	4081+00	- 4084+00	Precast Segmental Box Girder (Avg. Pier 50' Ht.)	EL25	300	RF	\$5,873	\$1,761,900	25%	\$2,202,375
	4084+00	- 4086+00	Precast Segmental Box Girder (Avg. Pier 60' Ht.)	EL26	200	RF	\$6,063	\$1,212,600	25%	\$1,515,750
	4086+00	- 4088+00	Precast Segmental Box Girder (Avg. Pier 50' Ht.)	EL25	200	RF	\$5,873	\$1,174,600	25%	\$1,468,250
	4088+00	- 4091+00	Precast Segmental Box Girder, Crossover (Avg. Pier 40' Ht.)	EL54	300	RF	\$6,475	\$1,942,500	25%	\$2,428,125
	4091+00	- 4092+22	Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL23	122	RF	\$5,574	\$680,028	25%	\$850,035
	4092+22	- 4096+22	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL33	400	RF	\$6,149	\$2,459,600	25%	\$3,074,500
	4096+22	- 4100+02	Guideway included in station cost below		380	RF				
	4100+02	- 4100+12	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL33	10	RF	\$6,149	\$61,490	25%	\$76,863
			Element Total		5,312	RF		\$28,671,788		\$35,839,735
10.05	Guideway: Built-up fill		N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover		N/A							
			Element Total		0	RF		\$0		\$0
10.07	Guideway: Underground tunnel		N/A							
			Element Total		0	RF		\$0		\$0
10.08	Guideway: Retained cut or fill		N/A							
			Element Total		0	RF		\$0		\$0
10.09	Track: Direct fixation									
	4047+00	- 4100+12	Direct Fixation - Double Track	TK21	5,312	RF	\$872	\$4,632,064	15%	\$5,326,874
			Element Total		5,312	RF		\$4,632,064		\$5,326,874
10.10	Track: Embedded		N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted		N/A							
			Element Total		0	RF		\$0		\$0
10.12	Track: Special (switches, turnouts)									
			Direct Fixation - Double Cross-over	SP18	1	EA	\$536,280	\$536,280	15%	\$616,722

SOUND TRANSIT ST2
HCT Planning
Segment E1-8
Sta. 4047+00 to Sta. 4100+12
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
	BEGIN	END		ID	QTY					
			Element Total		1	LS		\$536,280		\$616,722
10.13	Track: Vibration and noise dampening									
		N/A								
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-8
Sta. 4047+00 to Sta. 4100+12
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.02	Aerial station, stop, shelter, mall, terminal, platform		Aerial - 28' Center Platform - 4 Vehicle with Mezz.	ST21	1	LS	\$15,104,128	\$15,104,128	15%	\$17,369,747
	Bellevue TC Sta.		Element Total		1	LS		\$15,104,128		\$17,369,747
20.03	Underground station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.		Station Site Facilities - Intermodal Facility	SF10	55,000	SF	\$27	\$1,485,000	15%	\$1,707,750
	Upgrade Exist. Bellevue TC		Element Total		1	LS		\$1,485,000		\$1,707,750
20.05	Joint development		N/A							
			Element Total		1	LS		\$0		\$0
20.06	Automobile parking multi-story structure		N/A							
			Element Total		1	LS		\$0		\$0
20.07	Elevators, escalators		Pedestrian Vertical Access - Elevator, 40ft.	PA31	2	EA	\$239,800	\$479,600	15%	\$551,540
			Pedestrian Vertical Access - Escalator, 25ft.	PA35	2	EA	\$212,550	\$425,100	15%	\$488,865
			Pedestrian Vertical Access - Escalator, 40ft.	PA36	1	EA	\$289,940	\$289,940	15%	\$333,431
			Element Total		1	LS		\$1,194,640		\$1,373,836
40 SITEWORK & SPECIAL CONDITIONS										
40.01	Demolition, Clearing, Earthwork		Demolition Allow. - Guideway	DM80	5,312	RF	\$98	\$521,107	25%	\$651,384
	4047+00 - 4100+12		Element Total		1	LS		\$521,107		\$651,384
40.02	Site Utilities, Utility Relocation		Utility Modifications Allow. - Level 3	UM03	5,312	RF	\$676	\$3,589,850	30%	\$4,666,804
	4047+00 - 4100+12		Utility Undergrounding Allow	UM04	5,312	RF	\$872	\$4,632,064	30%	\$6,021,683
	4047+00 - 4100+12		Storm Water Management Allowance	UM10	399,000	SF	\$9	\$3,696,735	30%	\$4,805,756
			Element Total		1	LS		\$11,918,649		\$15,494,243
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments		Hazardous Material Removal Allowance	HM01	5,312	RF	\$52	\$276,224	30%	\$359,091
	4047+00 - 4100+12		Element Total		1	LS		\$276,224		\$359,091
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks		Enviromental Mitigation Allow. - Level 3	EM03	5,312	RF	\$218	\$1,158,016	30%	\$1,505,421
	4047+00 - 4100+12		Element Total		1	LS		\$1,158,016		\$1,505,421
40.05	Site structures including retaining walls, sound walls		N/A							
			Element Total		1	LS		\$0		\$0
40.06	Pedestrian / bike access and accommodation, landscaping		Landscaping Allow. - Guideway	LS10	5,312	RF	\$76	\$405,306	25%	\$506,632
	4047+00 - 4100+12		Artwork (1% of Guideway & Stations)		1%			\$477,493	25%	\$596,866
			Element Total		1	LS		\$882,798		\$1,103,498
40.07	Automobile, bus, van accessways including roads, parking lots		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	312,000	SF	\$32	\$10,114,261	25%	\$12,642,827
	112th Ave. SE		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	36,000	SF	\$32	\$1,167,030	25%	\$1,458,788
	NE 4th Ave.		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	51,000	SF	\$32	\$1,653,293	25%	\$2,066,616
	110th Ave.		Element Total							

SOUND TRANSIT ST2
HCT Planning
Segment E1-8
Sta. 4047+00 to Sta. 4100+12
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
	BEGIN	END		ID	QTY					
			Element Total		1	LS		\$12,934,584		\$16,168,230
40.08			Temporary Facilities and other indirect costs during construction							
			Temporary Facilities (5.% of Category 40)		5.0%			\$1,384,569	25%	\$1,730,711
			Element Total		1	LS		\$1,384,569		\$1,730,711

SOUND TRANSIT ST2
HCT Planning
Segment E1-8
Sta. 4047+00 to Sta. 4100+12
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
50 SYSTEMS										
50.01	Train control and signals 4047+00 - 4100+12		Train Control - Double Track	TC02	5,312	RF	\$300	\$1,592,272	15%	\$1,831,113
			Special Trackwork Allowance					\$398,068	15%	\$457,778
			Element Total		5,312	RF		\$1,990,340		\$2,288,891
50.02	Traffic signals and crossing protection		N/A							
			Element Total		0	EA		\$0		\$0
50.03	Traction power supply: substations		Traction Power, Substation	TP03	1	EA	\$1,253,500	\$1,253,500	15%	\$1,441,525
			Element Total		1	EA		\$1,253,500		\$1,441,525
50.04	Traction power distribution: catenary and third rail 4047+00 - 4100+12		OCS System - Standard, Double Track	TP02	5,312	RF	\$280	\$1,487,360	15%	\$1,710,464
			Element Total		5,312	RF		\$1,487,360		\$1,710,464
50.05	Communications 4047+00 - 4100+12		Communication, Line - Double	CM02	5,312	RF	\$240	\$1,273,818	15%	\$1,464,890
			Communication, Station	CM05	1	EA	\$545,000	\$545,000	15%	\$626,750
			Element Total		5,312	RF		\$1,818,818		\$2,091,640
50.06	Fare collection system and equipment		Fare Collection - 1 Entrance	FC01	1	EA	\$226,720	\$226,720	15%	\$260,728
			Element Total		1	LS		\$226,720		\$260,728
50.07	Central Control		N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-9
Sta. 4100+12 to Sta. 4160+22
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
10 GUIDEWAY & TRACK ELEMENTS										
10.01	Guideway: At-grade exclusive right-of-way		N/A							
			Element Total		0	RF		\$0		\$0
10.02	Guideway: At-grade semi-exclusive (allows cross-traffic)		N/A							
			Element Total		0	RF		\$0		\$0
10.03	Guideway: At-grade in mixed traffic		N/A							
			Element Total		0	RF		\$0		\$0
10.04	Guideway: Aerial structure									
	4100+12	- 4104+02	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL33	390	RF	\$6,149	\$2,398,110	25%	\$2,997,638
	4104+02	- 4124+00	Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL23	1,998	RF	\$5,574	\$11,136,852	25%	\$13,921,065
	4124+00	- 4127+00	Precast Segmental Box Girder, Crossover (Avg. Pier 30' Ht.)	EL53	300	RF	\$6,337	\$1,901,100	25%	\$2,376,375
	4127+00	- 4127+34	Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL23	34	RF	\$5,574	\$189,516	25%	\$236,895
	4127+34	- 4131+34	Precast Segmental Box Girder, Long Span (Avg. Pier 40' Ht.)	EL44	400	RF	\$6,005	\$2,402,000	25%	\$3,002,500
	4131+34	- 4132+34	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL33	100	RF	\$6,149	\$614,900	25%	\$768,625
	4132+34	- 4136+14	Guideway included in station cost below		380	RF				
	4136+14	- 4136+24	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL33	10	RF	\$6,149	\$61,490	25%	\$76,863
	4136+24	- 4140+14	Twin-Sgl. Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL34	390	RF	\$6,295	\$2,455,050	25%	\$3,068,813
	4140+14	- 4145+00	Precast Segmental Box Girder (Avg. Pier 50' Ht.)	EL25	486	RF	\$5,873	\$2,854,278	25%	\$3,567,848
	4145+00	- 4150+00	Precast Segmental Box Girder (Avg. Pier 60' Ht.)	EL26	500	RF	\$6,063	\$3,031,500	25%	\$3,789,375
	4150+00	- 4155+00	Precast Segmental Box Girder (Avg. Pier 50' Ht.)	EL25	500	RF	\$5,873	\$2,936,500	25%	\$3,670,625
	4155+00	- 4160+22	Precast Segmental Box Girder (Avg. Pier 40' Ht.)	EL24	522	RF	\$5,712	\$2,981,664	25%	\$3,727,080
			Element Total		6,010	RF		\$32,962,960		\$41,203,700
10.05	Guideway: Built-up fill		N/A							
			Element Total		0	RF		\$0		\$0
10.06	Guideway: Underground cut & cover		N/A							
			Element Total		0	RF		\$0		\$0
10.07	Guideway: Underground tunnel		N/A							
			Element Total		0	RF		\$0		\$0
10.08	Guideway: Retained cut or fill		N/A							
			Element Total		0	RF		\$0		\$0
10.09	Track: Direct fixation									
	4100+12	- 4160+22	Direct Fixation - Double Track	TK21	6,010	RF	\$872	\$5,240,720	15%	\$6,026,828
			Element Total		6,010	RF		\$5,240,720		\$6,026,828
10.10	Track: Embedded		N/A							
			Element Total		0	RF		\$0		\$0
10.11	Track: Ballasted		N/A							
			Element Total		0	RF		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-9
Sta. 4100+12 to Sta. 4160+22
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
	BEGIN	END		ID	QTY					
10.12	Track: Special (switches, turnouts)									
			Direct Fixation - Double Cross-over	SP18	1	EA	\$536,280	\$536,280	15%	\$616,722
			Direct Fixation - Turnout	SP28	2	EA	\$143,880	\$287,760	15%	\$330,924
			Element Total		1	LS		\$824,040		\$947,646
10.13	Track: Vibration and noise dampening									
			N/A							
			Element Total		1	LS		\$0		\$0

SOUND TRANSIT ST2
HCT Planning
Segment E1-9
Sta. 4100+12 to Sta. 4160+22
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	STATIONING END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
20 STATIONS, STOPS, TERMINALS, INTERMODAL										
20.01	At-grade station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.02	Aerial station, stop, shelter, mall, terminal, platform		Aerial - 28' Center Platform - 4 Vehicle with Mezz.	ST21	1	LS	\$15,104,128	\$15,104,128	15%	\$17,369,747
	Overlake Hospital Sta.		Element Total		1	LS		\$15,104,128		\$17,369,747
20.03	Underground station, stop, shelter, mall, terminal, platform		N/A							
			Element Total		1	LS		\$0		\$0
20.04	Other stations, landings, terminals: Intermodal, ferry, trolley, etc.		N/A							
			Element Total		1	LS		\$0		\$0
20.05	Joint development		N/A							
			Element Total		1	LS		\$0		\$0
20.06	Automobile parking multi-story structure		N/A							
			Element Total		1	LS		\$0		\$0
20.07	Elevators, escalators									
			Pedestrian Vertical Access - Elevator, 40ft.	PA31	2	EA	\$239,800	\$479,600	15%	\$551,540
			Pedestrian Vertical Access - Escalator, 25ft.	PA35	2	EA	\$212,550	\$425,100	15%	\$488,865
			Pedestrian Vertical Access - Escalator, 40ft.	PA36	1	EA	\$289,940	\$289,940	15%	\$333,431
			Element Total		1	LS		\$1,194,640		\$1,373,836
40 SITEWORK & SPECIAL CONDITIONS										
40.01	Demolition, Clearing, Earthwork									
	4100+12 - 4160+22		Demolition Allow. - Guideway	DM80	6,010	RF	\$98	\$589,581	25%	\$736,976
			Element Total		1	LS		\$589,581		\$736,976
40.02	Site Utilities, Utility Relocation									
	4100+12 - 4160+22		Utility Modifications Allow. - Level 3	UM03	6,010	RF	\$676	\$4,061,558	30%	\$5,280,025
	4100+12 - 4160+22		Utility Undergrounding Allow	UM04	6,010	RF	\$872	\$5,240,720	30%	\$6,812,936
			Storm Water Management Allowance	UM10	216,900	SF	\$9	\$2,009,579	30%	\$2,612,452
			Element Total		1	LS		\$11,311,857		\$14,705,413
40.03	Haz. mat'l, contam'd soil removal/mitigation, ground water treatments									
	4100+12 - 4160+22		Hazardous Material Removal Allowance	HM01	6,010	RF	\$52	\$312,520	30%	\$406,276
			Element Total		1	LS		\$312,520		\$406,276
40.04	Environmental mitigation, e.g. wetlands, historic/archeologic, parks									
	4100+12 - 4160+22		Enviromental Mitigation Allow. - Level 3	EM03	6,010	RF	\$218	\$1,310,180	30%	\$1,703,234
			Element Total		1	LS		\$1,310,180		\$1,703,234
40.05	Site structures including retaining walls, sound walls		N/A							
			Element Total		1	LS		\$0		\$0
40.06	Pedestrian / bike access and accommodation, landscaping									
	4100+12 - 4160+22		Landscaping Allow. - Guideway	LS10	6,010	RF	\$76	\$458,563	25%	\$573,204
			Artwork (1% of Guideway & Stations)		1%			\$503,327	25%	\$629,159
			Element Total		1	LS		\$961,890		\$1,202,363
40.07	Automobile, bus, van accessways including roads, parking lots									
	NE 12th St.		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	115,500	SF	\$32	\$3,744,222	25%	\$4,680,277
	110th Ave.		Roadway Modifications Allow. - AC Paving (incl. Curb & Sidewalk)	RM82	101,400	SF	\$32	\$3,287,135	25%	\$4,108,919
			Element Total		1	LS		\$7,031,357		\$8,789,196

SOUND TRANSIT ST2
HCT Planning
Segment E1-9
Sta. 4100+12 to Sta. 4160+22
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
	BEGIN	END		ID	QTY					
40.08	Temporary Facilities and other indirect costs during construction									
	Temporary Facilities (5.% of Category 40)			5.0%				\$1,075,869	25%	\$1,344,837
	Element Total				1	LS		\$1,075,869		\$1,344,837

SOUND TRANSIT ST2
HCT Planning
Segment E1-9
Sta. 4100+12 to Sta. 4160+22
(Aerial Alignment)

TRANSIT MODE: LRT

CAT NO.	STATIONING BEGIN	END	DESCRIPTION	COST ID	QTY	UNIT	UNIT COST	BASE COST	ALLCTD CONTRY	TOTAL COST
50 SYSTEMS										
50.01	Train control and signals 4100+12 - 4160+22		Train Control - Double Track	TC02	6,010	RF	\$300	\$1,801,498	15%	\$2,071,722
			Special Trackwork Allowance		25%			\$450,374	15%	\$517,931
			Element Total		6,010	RF		\$2,251,872		\$2,589,653
50.02	Traffic signals and crossing protection		N/A							
			Element Total		0	EA		\$0		\$0
50.03	Traction power supply: substations		Traction Power, Substation	TP03	1	EA	\$1,253,500	\$1,253,500	15%	\$1,441,525
			Element Total		1	EA		\$1,253,500		\$1,441,525
50.04	Traction power distribution: catenary and third rail 4100+12 - 4160+22		OCS System - Standard, Double Track	TP02	6,010	RF	\$280	\$1,682,800	15%	\$1,935,220
			Element Total		6,010	RF		\$1,682,800		\$1,935,220
50.05	Communications 4100+12 - 4160+22		Communication, Line - Double	CM02	6,010	RF	\$240	\$1,441,198	15%	\$1,657,378
			Communication, Station	CM05	1	EA	\$545,000	\$545,000	15%	\$626,750
			Element Total		6,010	RF		\$1,986,198		\$2,284,128
50.06	Fare collection system and equipment		Fare Collection - 1 Entrance	FC01	1	EA	\$226,720	\$226,720	15%	\$260,728
			Element Total		1	LS		\$226,720		\$260,728
50.07	Central Control		N/A							
			Element Total		1	LS		\$0		\$0

**SOUND TRANSIT ST2
HCT Planning
SUPPORT FACILITIES: YARDS, SHOPS, ADMIN. BLDGS**

TRANSIT MODE: LRT (Underground Alignment)

STATIONING		DESCRIPTION	COST		UNIT	BASE COST	ALLCTD CONTGY	TOTAL COST		
BEGIN	END		ID	QTY						
30 SUPPORT FACILITIES: YARDS, SHOPS, ADMIN. BLDGS										
30.01 Administration Building: Office, sales, storage, revenue counting										
		N/A								
		Element Total		1	LS	\$0		\$0		
30.02 Light Maintenance Facility										
		N/A								
		Element Total		1	LS	\$0		\$0		
30.03 Heavy Maintenance Facility										
		N/A								
		Element Total		1	LS	\$0		\$0		
30.04 Storage or Maintenance of Way Building										
		N/A								
		Element Total		1	LS	\$0		\$0		
30.05 Yard and Yard Track										
		Yard Lead, Eastbound Tk	TBM Tunnel - Single Bore (18'-10" I.D.)	TL01	500	RF	\$7,618	\$3,808,972	35%	\$5,142,113
		Yard Lead, Westbound Tk	TBM Tunnel - Single Bore (18'-10" I.D.)	TL01	800	RF	\$7,618	\$6,094,356	35%	\$8,227,380
		Yard Lead	Cut and Cover Box (Avg. 45' Depth)	CC04	300	RF	\$26,773	\$8,031,797	35%	\$10,842,926
		Yard Lead	Retained Cut - Two Side (Avg. 30' Depth)	RC13	1,000	RF	\$23,023	\$23,022,544	25%	\$28,778,180
		Yard Lead	At-Grade Dbl Ballasted Track	AG02	1,100	RF	\$452	\$496,770	25%	\$620,962
		Yard Lead	Direct Fixation - Single Track	TK20	1,300	RF	\$436	\$566,800	15%	\$651,820
		Yard Lead	Direct Fixation - Double Track	TK21	2,400	RF	\$872	\$2,092,800	15%	\$2,406,720
		Yard Lead	Direct Fixation - Turnout	SP28	4	EA	\$143,880	\$575,520	15%	\$661,848
		Yard Lead	Train Control - Single Track	TC01	1,300	RF	\$240	\$311,740	15%	\$358,501
		Yard Lead	Train Control - Double Track	TC02	2,400	RF	\$300	\$719,400	15%	\$827,310
		Yard Lead	OCS System Standard, Single Track	TP01	1,300	RF	\$236	\$306,800	15%	\$352,820
		Yard Lead	OCS System - Standard, Double Track	TP02	2,400	RF	\$280	\$672,000	15%	\$772,800
		Yard Lead	Communication, Line - Single	CM01	1,300	RF	\$240	\$311,740	15%	\$358,501
		Yard Lead	Communication, Line - Double	CM02	2,400	RF	\$240	\$575,520	15%	\$661,848
		Element Total			1	LS		\$47,586,759		\$60,663,729

SOUND TRANSIT ST2
HCT Planning
SUPPORT FACILITIES: YARDS, SHOPS, ADMIN. BLDGS

TRANSIT MODE: LRT (Aerial Alignment)

STATIONING		DESCRIPTION	COST		UNIT	BASE COST	ALLCTD CONTGY	TOTAL COST	
BEGIN	END		ID	QTY					
30 SUPPORT FACILITIES: YARDS, SHOPS, ADMIN. BLDGS									
30.01 Administration Building: Office, sales, storage, revenue counting									
		N/A							
		Element Total		1	LS	\$0		\$0	
30.02 Light Maintenance Facility									
		N/A							
		Element Total		1	LS	\$0		\$0	
30.03 Heavy Maintenance Facility									
		N/A							
		Element Total		1	LS	\$0		\$0	
30.04 Storage or Maintenance of Way Building									
		N/A							
		Element Total		1	LS	\$0		\$0	
30.05 Yard and Yard Track									
		Precast Single Segmental Box Girder (Avg. Pier 40' Ht.)	EL14	500	RF	\$4,884	\$2,442,000	35%	\$3,296,700
Yard Lead, Eastbound Tk		Precast Single Segmental Box Girder (Avg. Pier 40' Ht.)	EL14	800	RF	\$4,884	\$3,907,200	35%	\$5,274,720
Yard Lead, Westbound Tk		Precast Segmental Box Girder (Avg. Pier 30' Ht.)	EL23	300	RF	\$5,574	\$1,672,200	35%	\$2,257,470
Yard Lead		Retained Fill - Two Sides (Avg. 20' Height)	RF22	1,000	RF	\$2,923	\$2,923,217	25%	\$3,654,021
Yard Lead		At-Grade Dbl Ballasted Track	AG02	1,100	RF	\$452	\$496,770	25%	\$620,962
Yard Lead		Direct Fixation - Single Track	TK20	1,300	RF	\$436	\$566,800	15%	\$651,820
Yard Lead		Direct Fixation - Double Track	TK21	2,400	RF	\$872	\$2,092,800	15%	\$2,406,720
Yard Lead		Direct Fixation - Turnout	SP28	4	EA	\$143,880	\$575,520	15%	\$661,848
Yard Lead		Train Control - Single Track	TC01	1,300	RF	\$240	\$311,740	15%	\$358,501
Yard Lead		Train Control - Double Track	TC02	2,400	RF	\$300	\$719,400	15%	\$827,310
Yard Lead		OCS System Standard, Single Track	TP01	1,300	RF	\$236	\$306,800	15%	\$352,820
Yard Lead		OCS System - Standard, Double Track	TP02	2,400	RF	\$280	\$672,000	15%	\$772,800
Yard Lead		Communication, Line - Single	CM01	1,300	RF	\$240	\$311,740	15%	\$358,501
Yard Lead		Communication, Line - Double	CM02	2,400	RF	\$240	\$575,520	15%	\$661,848
		Element Total		1	LS		\$17,573,706		\$22,156,041

**SOUND TRANSIT ST2
HCT Planning
Right of Way**

TRANSIT MODE: LRT

(Underground Alignment)

STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
BEGIN	END		ID	QTY					
40 SITEWORK & SPECIAL CONDITIONS									
40.01 Demolition, Clearing, Earthwork									
	IDS to Main St/112th	Demolition Allow. - Existing Building	DM06	7,360	SF	\$10	\$70,276	25%	\$87,845
	Bellevue CBD to OLH	Demolition Allow. - Existing Building	DM06	159,297	SF	\$10	\$1,521,031	25%	\$1,901,289
		Element Total		1	LS		\$1,591,308		\$1,989,135
40.03 Haz. mat'l, contam'd soil removal/mitigation, ground water treatments									
	IDS to Main St/112th	Hazardous Material Removal Allowance	HM05	7,360	SF	\$26	\$191,360	30%	\$248,768
	Bellevue CBD to OLH	Hazardous Material Removal Allowance	HM05	159,297	SF	\$26	\$4,141,722	30%	\$5,384,239
		Element Total		1	LS		\$4,333,082		\$5,633,007
60 ROW, LAND, EXISTING IMPROVEMENTS									
60.01 Purchase or lease of real estate									
		Alignment Total (See separate cost estimate)		1	LS		\$65,472,492	33%	\$87,296,656
		Element Total		1	LS		\$65,472,492		\$87,296,656

**SOUND TRANSIT ST2
HCT Planning
Right of Way**

TRANSIT MODE: LRT

(Aerial Alignment)

STATIONING		DESCRIPTION	COST		UNIT	UNIT COST	BASE COST	ALLCTD CONTGY	TOTAL COST
BEGIN	END		ID	QTY					
40 SITEWORK & SPECIAL CONDITIONS									
40.01 Demolition, Clearing, Earthwork									
	IDS to Main St/112th	Demolition Allow. - Existing Building	DM06	7,360	SF	\$10	\$70,276	25%	\$87,845
	Bellevue CBD to OLH	Demolition Allow. - Existing Building	DM06	120,403	SF	\$10	\$1,149,656	25%	\$1,437,070
		Element Total		1	LS		\$1,219,932		\$1,524,915
40.03 Haz. mat'l, contam'd soil removal/mitigation, ground water treatments									
	IDS to Main St/112th	Hazardous Material Removal Allowance	HM05	7,360	SF	\$26	\$191,360	30%	\$248,768
	Bellevue CBD to OLH	Hazardous Material Removal Allowance	HM05	120,403	SF	\$26	\$3,130,478	30%	\$4,069,621
		Element Total		1	LS		\$3,321,838		\$4,318,389
60 ROW, LAND, EXISTING IMPROVEMENTS									
60.01 Purchase or lease of real estate									
		Alignment Total (See separate cost estimate)		1	LS		\$150,032,822	33%	\$200,043,762
		Element Total		1	LS		\$150,032,822		\$200,043,762