Infill Light Rail Station: Graham Street

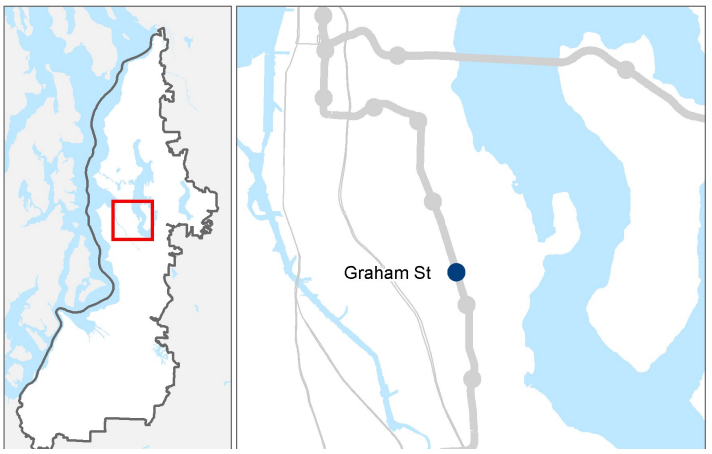
Subarea	North King
Primary Mode	Light Rail
Facility Type	Infill Station
Length	N/A
Date Last Modified	July 1, 2016

SHORT PROJECT DESCRIPTION

This project would provide a new infill station on the Central Link light rail line in the vicinity of Graham Street.

Note: The elements included in this representative project will be refined during future phases of project development and are subject to change.

PROJECT AREA AND REPRESENTATIVE ALIGNMENT



KEY ATTRIBUTES	
REGIONAL LIGHT RAIL SPINE *Does this project help complete the light rail spine?*	No
CAPITAL COST *Cost in Millions of 2014 $*	$65 — $70
RIDERSHIP *2040 daily project riders*	1,500 — 2,500
PROJECT ELEMENTS	• One at-grade station • Station would be approximately 400 feet long to accommodate 4-car trains • Peak headways: 6 minutes • 1 percent for art per Sound Transit policy • Non-motorized access facilities (bicycle/pedestrian), transit-oriented development (TOD)/planning due diligence, and sustainability measures (see separate document titled "Common Project Elements")
NOT INCLUDED	• Parking not included • Light rail vehicles not included • See separate documents titled "Common Project Elements" and "Light Rail Vehicles" • Project costs do not include $10M potential contribution from the City of Seattle included in the voter approved Move Seattle levy.
ISSUES & RISKS	• Additional station would increase travel time along the line • This project would require the construction of a new station while maintaining operations on the existing Central Link line; likely effects during construction would include single track operations of the Central Link line between Othello and Mt. Baker stations, lane closures and detours on Martin Luther King Jr. Way and impacts to local access • Utility relocation and construction • Light rail currently operates in Seattle and specific station area standards are codified; light rail is included in the Comprehensive Plan and other planning documents

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Sound Transit developed a conceptual scope of work for this project for the purpose of generating a representative range of costs, both capital and operating; and benefits, including ridership forecasts, TOD potential, multi-modal access and others. This information was developed to assist the Sound Transit Board as it developed the ST3 system plan, including phasing of investments and financial plan, for voter consideration. Final decisions on project elements (e.g., alignment, profile, station locations, and number of parking stalls) will be determined after completion of system planning, project level environmental review, and preliminary engineering during which additional opportunities for public participation will be provided. Therefore, this scope definition should not be construed as a commitment that all representative features will be included in the final developed project.

Long Description:
This project would construct a new station on Martin Luther King Jr. Way between Graham Street and Morgan Street along the existing Central Link light rail line. This project would affect approximately 1/3 of a mile of Martin Luther King Jr. Way. Key project elements include the following:

- Widening of Martin Luther King Jr. Way to accommodate the station and tapering to the north and south of the station
- Modifications to existing sidewalks, landscaping, drainage, utilities and street lights along Martin Luther King Jr. Way in the station vicinity
- New pedestrian signal
- Modifications to the Martin Luther King Jr. Way/Graham Street intersection

Assumptions:
- No additional parking assumed
- Construction would be accomplished with an active Central Link light rail service
- For non-motorized station access allowances, the Graham Street station is categorized as an Urban station

Environmental:
Sound Transit will complete project-level state and federal environmental reviews as necessary; provide mitigation for significant impacts; obtain and meet the conditions of all required permits and approvals; and strive to exceed compliance and continually improve its environmental performance.

Utilities:
Utility relocation as needed to complete the project, including fiber optics, sewer, water, overhead electric/communications, etc.

Right-of-Way and Property Acquisition:
Property acquisition required for this proposed infill station.

Potential Permits/Approvals Needed:
- Building permits: Electrical, Mechanical, Plumbing
- Utility connection permits
- Construction-related permits (clearing and grading, stormwater management, street use, haul routes, use of city right-of-way)
- Land use approvals (Conditional use, design review, site plans, Comprehensive Plan or development code consistency, Special Use Permits)
- All required local, state, and federal environmental permits
- NEPA/SEPA and related regulations

Project Dependencies:
N/A

Potential Project Partners:
- City of Seattle
- Transit partner serving this project: King County Metro
- King County
- FTA

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Cost:
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In Millions of 2014$

ITEM	COST	COST WITH RESERVE
Agency Administration	$3.51	$3.75
Preliminary Engineering & Environmental Review	$1.71	$1.83
Final Design & Specifications	$3.38	$3.62
Property Acquisition & Permits	$14.92	$15.97
Construction	$34.52	$36.94
Construction Management	$3.05	$3.26
Third Parties	$0.88	$0.94
Vehicles	$0.00	$0.00
Contingency	$3.38	$3.62
Total	**$65.36**	**$69.93**

Design Basis: Conceptual

The costs expressed above include allowances for TOD planning and due diligence, Sustainability, Bus/rail integration facilities, and Non-Motorized Access. These allowances, as well as the costs for Parking Access included above, are reflected in the following table. Property acquisition costs are not included in the table below, but are included within the total project cost above. For cost allowances that are not applicable for this project, "N/A" is indicated.

ITEM	COST	COST WITH RESERVE
TOD planning and due diligence	$0.22	$0.23
Sustainability	$1.82	$1.95
Parking access	N/A	N/A
Non-motorized (bicycle/pedestrian) access	$4.39	$4.70
Bus/rail integration facilities	N/A	N/A

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Evaluation Measures:

MEASURE		MEASUREMENT/RATING	NOTES
	**Regional Light Rail Spine** *Does project help complete regional light rail spine?*	No	Adds a new station to the light rail spine
	**Ridership** *2040 daily project riders*	1,500 — 2,500	Reflects a reduction in ridership at adjacent stations
	**Capital Cost** *Cost in Millions of 2014 $*	$65 — $70	Capital cost estimate does not include $10M contribution from the City of Seattle (Move Seattle)
	**Annual O&M Cost** *Cost in Millions of 2014 $*	$1	
	**Travel Time** *In-vehicle travel time along the project (segment)*	1 min	Approximate travel time added to corridor due to additional station
	**Reliability** *Quantitative/qualitative assessment of alignment/route in exclusive right-of-way*	N/A	
	**System Integration** *Qualitative assessment of issues and effects related to connections to existing local bus service and potential future integration opportunities*	Medium-High	Medium-low number of existing daily transit connections vicinity of Graham Street on Rainier Avenue
	**Ease of Non-motorized Access** *Qualitative assessment of issues and effects related to non-motorized modes*	Medium	Medium intersection density providing non-motorized access with some large parcels as barriers
	Percent of Non-motorized Mode of Access *Percent of daily boardings*	70-80%	
	**Connections to PSRC-designated Regional Centers** *Number of PSRC-designated regional growth and manufacturing/industrial centers served*	0 centers	
	**Land Use and Development/TOD Potential** *Quantitative/qualitative assessment of adopted Plans & Policies and zoning compatible with transit-supportive development within 0.5 mile of potential stations* *Qualitative assessment of real estate market support for development within 1 mile of potential corridor* *Density of activity units (population and employment for 2014 and 2040) within 0.5 mile of potential station areas*	Medium Medium Pop/acre: 2014: 17; 2040: 16 Emp/acre: 2014: 3; 2040: 3 Pop+Emp/acre: 2014: 20; 2040: 19	Moderate support in local and regional plans; approx. 25% land is compatibly zoned Moderate market support
	**Socioeconomic Benefits** *Existing minority / low-income populations within 0.5 mile of potential station areas* *2014 and 2040 population within 0.5 mile of potential station areas* *2014 and 2040 employment within 0.5 mile of potential station areas*	81% Minority; 25% Low-Income Pop: 2014: 8,500; 2040: 7,900 Emp: 2014: 1,500; 2040: 1,600	

For additional information on evaluation measures, see http://soundtransit3.org/document-library