SOUND TRANSIT STAFF REPORT

MOTION NO. M2003-13

Contract for Construction of Exploratory Test Shaft at the Link Beacon Hill Station Site and to Perform Soil Tests as Part of the Beacon Hill Station 710 Final Design Program

Meeting:	Date:	Type of Action:	Staff Contact:	Phone:
Finance Committee	1/30/03	Discussion/Possible Action	Ahmad Fazel, Link Director	(206) 398-5389
			Joe Gildner, Link Deputy	(206) 689-3350
			Director	

Contract/Agreement Type:	3	Requested Action:	3
Competitive Procurement	3	Execute New Contract/Agreement	3
Sole Source		Amend Existing Contract/Agreement	
Memorandum of Agreement		Contingency Funds Required	
Purchase/Sale Agreement		Budget Amendment Required	

⁴ Applicable to proposed transaction.

OBJECTIVE OF ACTION

To award a contract for construction of an exploratory test shaft at the Beacon Hill Station Site
and to perform soil tests under the direction of the Final Designer as an integral part of the
Beacon Hill Station Final Design Program.

ACTION

 Authorize the Executive Director to execute a contract with Frank Coluccio Construction Company, Inc., to provide construction services for an exploratory test shaft as part of the Beacon Hill Final Design Program, in the amount of \$1,761,882 with a 15% contingency of \$268,118, for a total authorized amount not to exceed \$2,030,000.

KEY FEATURES

- Establishes a construction site on the parking lot of the South China Restaurant, including
 construction of a noise wall and removal of an abandoned underground storage tank, and
 constructs a replacement parking lot for the restaurant on adjacent El Centro property.
- Excavates an 18 foot diameter exploratory test shaft to a depth of approximately 150 foot depth at the location of the future station entrance shaft, allowing for monitoring of ground movements, sampling and testing.
- Excavates short test tunnels from the shaft in different soil strata, all within limits of future station excavation, allowing for monitoring, sampling and testing activities.
- Constructs access stairway within the shaft and maintains the shaft for a period of one year after completion or until the site is occupied by the Tunnel contractor.

BUDGET IMPACT SUMMARY

Project Description: Central Link Initial Segment

Current Status: Final Design **Projected Completion Date:** 2009

Action Outside of Adopted Budget:	Y/N	Υ	Requires Comment
This Line of Business	N		
This Project	N		
This Phase	N		
This Task	N		
Budget amendment required	N		
Key Financial Indicators:	Y/N	Υ	Requires Comment
Contingency funds required	N		
Subarea impacts	N		
Funding required from other parties other than what is already assumed in financial plan	N		

N = Action is assumed in current Board-adopted budget. Requires no budget action or adjustment to financial plan

BUDGET DISCUSSION

The 2003 Board-adopted budget for the Central Link Initial Segment is \$2,070 million. Within that budget, the activities considered by this motion are included in the Final Design Phase, set aside from other work, for the Beacon Hill Test Shaft.

Current planning allows for \$2.4 million for construction of the Beacon Hill Test Shaft, and the proposed action is within that amount.

REVENUE, SUBAREA, AND FINANCIAL PLAN IMPACTS

The proposed action is consistent with the current board adopted budget, and is affordable within the agency's current long-term financial plan and sub-area financial capacity. The action will have no new revenue impact on Sound Transit.

SUMMARY FOR BOARD ACTION

Action Item: Frank Coluccio Construction (new contract for construction of test shaft at the Beacon Hill Station Site, and to perform soil tests as part of 710 Final Design)

(Year of Expenditure \$000	0)				
				Total	
	Adopted	Committed To		Committed &	Uncommited
Initial Segmen	t FY2003 Budget	Date	This Action	Action	(Shortfall)
	(A)	(B)	(C)	(D)	(E)
1 Agency Administration	226,780	108,358		108,358	118,422
2 Preliminary Engineering	35,000	33,920		33,920	1,080
— 3 Final Design	123,000	101,204	2,030	103,234	19,766
4 Right of Way	233,016	181,820		181,820	51,196
5 Construction	1,172,633	6,574		6,574	1,166,059
6 Construction Services	82,464	3,107		3,107	79,357
7 Third Party Agreements	58,800	14,330		14,330	44,470
8 Vehicles	138,307	-		-	138,307
9 Contingency				-	-
10 Total Current Budget	2,070,000	449,314	2,030	451,344	1,618,656
Phase Budget Detail					
— 11 Beacon Hill Test Shaft	2,400	-	2,030	2,030	370
12 Beacon Hill Tunnel	12,100	8,845	-	8,845	3,255
13 Other Segments	108,500	92,359	ı	92,359	16,141
► 14 Total Phase	123,000	101,204	2,030	103,234	19,766
	Current			Proposed	
	Approved		Proposed	Total Contract	
Contract Budget	Contract Value	Spent to Date	Action	Value	
	(F)	(G)	(H)	(I)	-
15 Contract Amount	0	0	1,762	1,762	
16 Contingency	0	0	268	268	
—▶17 Total	1 0	0	2.030	2.030	

M/W/DBE - SMALL BUSINESS PARTICIPATION

18 Percent Contingency

The small business goal established by the Sound Transit Diversity Programs Office for this construction contract is 5%.

Frank Coluccio Construction Company Inc. has committed to a small business participation plan of 25.45%.

The company has identified seven businesses as being either Small Businesses or Minority/Disadvantaged Businesses, as show below:

Advanced Electric and Alarm Systems	Small Business	.42%
Crux Subsurface, Inc.	MBE/DBE	.91%
Hot Mix Pavers, Inc.	MBE/DBE	.23%
LRL Construction Co. Inc.	Small Business	19.80%
Qualify Fence Builders, Inc.	Small Business	0.17%*
Salinas Construction, Inc.	MBE/DBE	0.18%
TLC Trucking	MBE/DBE	1.92%

HISTORY OF PROJECT

In March 2002, the geotechnical exploration for final design at the Beacon Hill station location identified soils at tunnel depth that could potentially provide adverse tunneling conditions. As a result, Sound Transit's independent Tunnel Peer Review Team recommended that (as an element of the final design program) an exploratory test shaft be excavated down to platform level at the location of the future station entrance shaft to better examine these soils and their anticipated behavior during tunneling. It was the opinion of the Tunnel Peer Review Team, with Sound Transit staff concurrence, that the exploratory shaft and associated testing program would allow the tunneling risks to be better evaluated and the design to be modified appropriately as required.

Of equal importance, the tunnel contractors bidding on the construction would be able to inspect the ground at tunnel depths and could be invited to observe the ground's behavior during test shaft construction. They could thus be better able to estimate the tunneling risks involved and would have increased confidence in submitting competitive bids, avoiding the addition of unnecessary construction contingencies. The FTA (whose Project Management Oversight Consultant attended the peer review meeting) subsequently confirmed that such test shafts had been installed with beneficial results during final design of other FTA tunnel projects around the country, as a means of reducing construction risks and costs.

Consequently, on Sound Transit staff recommendation, the Board authorized the Executive Director to direct the Tunnel Final Designer to design the test shaft facility and the testing program. Contract documents were subsequently prepared and bids taken for construction of the test shaft facility as an element of the tunnel final design program.

Frank Coluccio Construction Company, Inc., the lowest responsive and responsible bidder, has been selected to provide construction services for the exploratory test shaft. Accordingly, staff is seeking Finance Committee authorization to award the contract.

Prior Board or Committee Actions and Relevant Board Policies

Motion or Resolution Number	Summary of Action	Date of Action
M2002-98	Authorized the Executive Director to execute a contract amendment with the Hatch Mott MacDonald/Sverdrup Joint Venture to provide additional civil engineering final design services for the Beacon Hill Station, in the amount of \$2,571,701 for a new total authorized contract amount not to exceed \$12,016,263.	9/12/02
M2002-09	Authorized the Executive Director to execute a contract amendment with Hatch Mott MacDonald/Sverdrup Joint Venture to provide additional Civil Engineering Final Design Services in the amount of \$3,355,269 plus a contingency of \$287,293 for a total of \$3,642,562 and for a new total authorized contract amount not to exceed \$9,444,562.	

CONSEQUENCES OF DELAY

Significant delay with initiating the test shaft program would prevent information obtained from the test program from being incorporated into the Beacon Hill Tunnel construction contract documents without a similar delay to the bid schedule.

REGIONAL PARTNERSHIP AND COOPERATION

N/A

PUBLIC INVOLVEMENT

During 2002, staff presented information on the test shaft to the North Beacon Hill Community Council and Chamber of Commerce and held several public meetings on Beacon Hill regarding Link. Staff will present information door to door before and during test shaft construction.

LEGAL REVIEW

MB 1/28/03

SOUND TRANSIT

MOTION NO. M2003-13

A motion of the Finance Committee of the Central Puget Sound Regional Transit Authority authorizing the Executive Director to execute a contract with Frank Coluccio Construction Company, Inc., to provide construction services for an exploratory test shaft as part of the Beacon Hill Final Design Program, in the amount of \$1,761,882 with a 15% contingency of \$268,118, for a total authorized amount not to exceed \$2,030,000.

Background:

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Motion:

It is hereby moved by the Finance Committee of the Central Puget Sound Regional Transit Authority that the Executive Director is authorized to execute a contract with Frank Coluccio Construction Company, Inc., to provide construction services for an exploratory test shaft as part of the Beacon Hill Final Design Program, in the amount of \$1,761,882 plus a 15% contingency of \$268,118, for a total authorized amount not to exceed \$2,030,000.

APPROVED by the Finance Committee of the Central Puget Sound Regional Transit Authority at a regular meeting thereof held on January 30, 2003.

Jáck Ⅺ. Crawford

Finance Committee Vice Chair

ATTEST:

Marcia Walker

Board Administrator

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