



Metro

**CONSTRUCTION COMMITTEE
SEPTEMBER 16, 2004**

PROJECT: METRO GREEN LINE PROJECT

CONTRACT: PS-8310-0566, DESIGN VERIFICATION SERVICES SYSTRA CONSULTING, INC.

ACTION: CONTRACT MODIFICATION IN THE AMOUNT NOT TO EXCEED \$143,860

RECOMMENDATION

Authorize the Chief Executive Officer to execute Change Order No. 5 to Contract No. PS-8310-0566, with SYSTRA Consulting, Inc. (SYSTRA), to provide design verification services until October 2004, on the Metro Green Line in the amount not-to-exceed \$143,860, increasing the total Contract Value from \$2,383,349 to \$2,527,209.

Within Construction Committee authority: Yes No N/A

RATIONALE

SYSTRA was the original designer of the train control system for the Metro Green Line (MGL). As the designer, SYSTRA has been performing all design support to construction services for the MGL, including safety certification. SYSTRA's services are essential, in that it is the only engineering consultant retained by the MTA to perform the review and verify the Automatic Train Control test results on the project. This change order provides funding for SYSTRA to continue services through October 2004, at which time the global settlement for all activity under the Automatic Train Control Contract H1100 with Union Switch & Signal (US&S) will be presented to the Board.

The principal activities in which SYSTRA is involved are the review of submittals (currently there are approximately 50 submittals awaiting review by SYSTRA) and witnessing the testing of base contract work yet to be completed by US&S:

- Making the Train to Wayside Communications fully operational;
- Demonstrating the full functionality of the automated portions of the Central Control Facility;
- Control Line Changes;

- Fine-tuning the car-borne Automatic Train Control to provide for more accurate station stopping;
- The reliability Demonstration Test; and
- Documentation of the final safety certification.

IMPACTS TO OTHER CONTRACTS

There is no impact to any other MTA contract, although this contract is impacted by the performance of the train control contractor, Union Switch & Signal (US&S) on the H1100 contract.

FINANCIAL IMPACT

The funding of \$143,860 for this action is included in the FY05 budget in Cost Center 8510, Construction Contracts/Procurement under Project 800023, Metro Green Line Project and is within the approved MGL life of project budget.

Potential for Cost Recovery: Yes No N/A

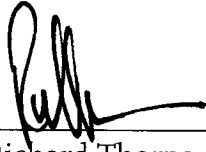
ALTERNATIVES CONSIDERED

The MTA Board may reject the recommendation. However, this alternative is not recommended because the services are essential to review and approval of the final designs for Train-to-Wayside and auto-routing functions required by the H1100 contract. The continuity of effort by the retention of SYSTRA is very important, because of the requirement for specialized technical knowledge and the history of technical decisions on the train control contract. SYSTRA has been involved with the Metro Green Line from the time that the original specifications were prepared. If another consultant were retained to perform this work, there would be a steep learning curve to familiarize others with the work, and such a transition would take additional time.

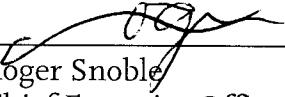
ATTACHMENTS

- A. Procurement Summary
- A-1 Procurement History

Prepared by: Joel Sandberg, Deputy Executive Officer, Project Manager



Richard Thorpe
Chief Capital Management Officer,
Construction Project Management



Roger Snoble
Chief Executive Officer

**BOARD REPORT ATTACHMENT A
PROCUREMENT SUMMARY**

1.	Contract Number: PS-8310-0566		
2.	Recommended Vendors: SYSTRA Consulting, Inc.		
3.	Cost/Price Analysis Information:		
	A. Bid/Proposed Price: \$143,860	Recommended Price: \$143,860	
	B. Details of Significant Variances: N/A		
4.	Contract Type: Cost-Plus-Fixed-Fee (CPFF)		
5.	Procurement Dates: Not Applicable to Contract Modifications		
	A. Issued: N/A		
	B. Advertised: N/A		
	C. Pre-proposal Conference: N/A		
	D. Proposals Due: N/A		
	E. Pre-Qualification Completed: N/A		
	F. Conflict of Interest Form Submitted to Ethics: N/A		
6.	Small Business Participation:		
	A. Bid Goal: N/A	Date Small Business Evaluation Completed: N/A	
	B. Small Business Commitment: N/A		
7.	Invitation for Bid/Request for Proposal Data: Not Applicable to Contract Modifications		
	Notifications Sent: N/A	Bids/Proposals Picked up: N/A	Bids/Proposals Received: N/A
8.	Evaluation Information:		
	A. <u>Bidders/Proposers Names:</u> See 2 above	<u>Proposal Amount:</u> \$143,860	<u>Best and Final Offer Amount:</u> \$143,860
	B. Evaluation Methodology: Cost Analysis		
9.	Protest Information: Not Applicable to Contract Modifications		
	A. Protest Period End Date: N/A		
	B. Protest Receipt Date: N/A		
	C. Disposition of Protest Date: N/A		
10.	Contract Administrator: DonCosta E. Seawell	Telephone Number: 922-1056	
11.	Project Manager: Joel Sandberg	Telephone Number: 922-7223	

BOARD REPORT ATTACHMENT A-1 PROCUREMENT HISTORY

A. BACKGROUND ON CONTRACTOR

SYSTRA Consulting, Inc. has been involved with the train control and systems contracts at the MTA since 1986 when SYSTRA prepared the specifications for the LB-LA MBL train control system. At that time SYSTRA was known as Rail Transportation Systems, Inc. (RTS). As a result of a 1999 merger, RTS became SYSTRA Consulting, Inc. (SYSTRA). SYSTRA also prepared the Contract H1100 specifications for the MGL automatic train control system, and has been involved with the progress of the contract continuously since then. The H1100 contract is currently scheduled for completion in March, 2004 and the MTA will require the services of SYSTRA through the completion of the contract. SYSTRA is especially well qualified to perform this work, because they have been involved in the technical discussions, with the contractor that resulted in contract definition. SYSTRA has also successfully worked with the contractor and others within the MTA to ensure that the MTA receives a safe, effective, and efficient operating train control system. The accumulated knowledge on the H1100 contract plus the general knowledge about other train control systems makes it very desirable to retain the services of SYSTRA. SYSTRA has established an excellent working relationship with the H1100 contractor, and any disruption of this on-going effort could needlessly produce adverse technical and financial impacts upon the project.

B. PROCUREMENT BACKGROUND

Contract No. PS-8310-0566, is a cost-plus-fixed-fee locally funded contract, to provide design verification services on the Metro Green Line Project. SYSTRA is the design engineer retained by the MTA to review the progress of the Automatic Train Control Contract (H1100) on the Metro Green Line (MGL).

SYSTRA contracted as a prime to MTA in July 1999 during the time period when MTA was phasing out the EMC for these design services. Prior to June 1999 SYSTRA was a sub-consultant to EMC and was performing the same MGL design and design support services. At that time SYSTRA was known as Rail Transportation Systems, Inc. (RTS). As a result of a 1999 merger, RTS became SYSTRA Consulting, Inc.

The contract provided for a provisional indirect cost rate of 125% until actual audited data was available. Following an MASD audit of the actual indirect costs for FY99, SYSTRA challenged the audit findings. In order to avoid a protracted dispute, the parties agreed to resolve the matter by negotiating a fixed indirect rate of 139.5% for the life of the contract. In order to allow SYSTRA to perform the design review functions for contract H1100 while the discussions of SYSTRA's overhead rate were taking place, the MTA issued two Limited Notices to Proceed (LNTP) each for \$80,000, totaling \$160,000 in LNTP funding. The original Change Notice, negotiated for a total value of \$955,745, included a small amount for METRO Blue Line (MBL)

work. Subsequently, Project Management determined that the MBL work would be excluded and procured from other sources. This resulted in renegotiating the reduced scope at \$899,620. In order to complete the remaining support effort, SYSTRA requires another \$143,860.

The Diversity and Economic Opportunity Department did not recommend a goal for this procurement, due to the highly technical nature of the effort and the limited opportunity for subcontracting.

C. EVALUATION OF PROPOSAL

The MTA Project Office, Office of Procurement and County Counsel have reviewed the facts underlying each change notice and concur that they have been merited under the terms and conditions of the Contract and Public Utilities Code §130243.

D. COST/PRICE ANALYSIS EXPLANATION OF VARIANCES

PROPOSED AMOUNT	TECHNICAL ESTIMATE	FINAL AMOUNT
\$ 143,860	\$ 143,860	\$ 143,860

The final negotiated amount has been determined to be fair and reasonable, based upon compliance with all requirements of MTA Procurement, including fact-finding, clarifications, cost analysis, legal and pre-award audit.