




June 10, 2021

To: Transit Committee

From: Darrell E. Johnson, Chief Executive Officer 

Subject: Amendment to Agreement for the Design of the OC Streetcar Project

Overview

On September 14, 2015, the Orange County Transportation Authority Board of Directors approved an agreement with HNTB Corporation for preparation of plans, specifications, and estimates for the OC Streetcar project. An amendment to the agreement is necessary for additional design support services.

Recommendation

Authorize the Chief Executive Officer to negotiate and execute Amendment No. 11 to Agreement No. C-5-3337 between the Orange County Transportation Authority and HNTB Corporation, in the amount of \$2,500,000, and extend the agreement term through September 30, 2022, for continued OC Streetcar project design support services during construction. This will increase the maximum cumulative obligation of the agreement to a total contract value of \$26,083,841.

Discussion

On February 1, 2016, the Orange County Transportation Authority (OCTA) entered into Agreement No. C-5-3337 with HNTB Corporation (HNTB) for the design of the OC Streetcar project (Project). HNTB produced final plans, specifications, and estimates for the release of an invitation for bids for construction of the Project on December 11, 2017.

Construction activities have been underway since issuance of the Notice to Proceed to Walsh Construction Company II, LLC (Walsh), on March 4, 2019. The focus to date has been on underground utility relocations within City of Santa Ana streets, completion of bridges across the Santa Ana River and Westminster Avenue, work on the maintenance and storage facility (MSF), installation of the overhead catenary system (OCS) and traffic signal pole foundations, and installation of tracks on Santa Ana Boulevard, Mortimer Street,

and the Pacific Electric Right-of-Way. Walsh has started building stations at Fairview Street, Raitt Street, and Harbor Boulevard, as well as preparing sites for delivery of the traction power substations. The at-grade railroad crossing at Fairview Street is under construction, and railroad signaling equipment has been fabricated and will be delivered and installed on the Project in the upcoming months. Most of the OCS poles have been installed, and hardware and wire will go up following track installation.

As the engineer of record, HNTB, has been providing design support during construction (DSDC) as required by the contract, and efforts are consistent with most major construction projects. The efforts include review and response to Walsh's requests for information (RFI) and review and acceptance of contract submittals required in drawings and specifications. As of May 17, 2021, Walsh has submitted 949 RFIs and 1,312 contract submittals, which are significantly more than were anticipated for review and action by the designer. Additional support being provided by HNTB includes providing certification efforts required by permitting agencies, as well as performing design services for Project modifications that are being implemented in the construction phase.

The high number of interrelated elements of this Project, including railroad communications, track work, traffic control, and a 50,000 square foot MSF, make the design and construction complex and require the technical expertise of multiple disciplines. This complexity, combined with inadequate as-built drawings of the subsurface utilities in older public streets and multiple sites of soil contamination, has resulted in the high number of submittals, RFIs, and in some cases, design modifications to address unforeseen conditions. Given the unpredictable nature of the work and uncertainty as to how Walsh will address changes encountered in the field, the level of effort for the DSDC has been difficult to estimate. To most effectively manage the DSDC budget, staff has made conservative assumptions about the level of services needed through August 2022. Prior to November 2021, following completion of FTA's cost and schedule risk analysis, staff will return to the Board with recommendations for remaining cost and schedule adjustments required to complete the Project. This will allow the project team time to better assess field conditions and more reasonably estimate the anticipated quantity of remaining submittals, RFIs, and design modifications that require HNTB's support. Areas requiring an unanticipated increase in HNTB's level of effort include:

- Utility conflicts encountered during the installation of OCS poles are requiring additional field reviews and analysis to confirm pole placements and, in some cases, the redesign of foundations and pole specifications.

- Unidentified utilities and utilities in locations other than where record maps indicated has required HNTB to shift traffic signal pole locations and revise signal mast arm lengths.
- Unidentified shallow utilities have been encountered after pavement removal and excavation, necessitating a redesign of the duct banks that run the length of the track to provide supplemental traction power and fiber optic communications.
- Discovery of cultural resources at the MSF necessitated a modification to the wheel truing pit design and will require a modification to the site and landscaping plans to accommodate reinternment.

While it is anticipated that RFIs related to subsurface work will diminish as the underground work nears completion and solutions for underground conflicts are in place, RFIs and submittals are anticipated to continue for project elements that are being finalized for construction, including track, communication systems, railroad signaling systems, traction power substations, the OCS, and the MSF.

The proposed amendment will authorize continued DSDC for the following:

- Review and acceptance of contractor submittals addressing various project elements, including special trackwork, traction power substations, communication systems, and architectural finishes.
- Review and response to RFIs related to track, system, and MSF elements.
- Prepare requested modifications to plans and specifications and provide administrative support to address unforeseen conditions discovered during construction and/or to enhance system operations and safety.
- Attend project meetings with the construction management team to ensure and facilitate configuration of project elements being constructed, and to participate in construction partnering sessions.

In September 2020, the Board approved Amendment No. 10 for \$2,900,000, increasing the DSDC budget to \$5,563,316. The budget for Amendment No. 10 will be depleted by the end of July, and Amendment No. 11 is required to continue the DSDC and not delay construction, extending the term of the agreement by six months to September 30, 2022. An independent cost estimate for the additional DSDC work described above, in the amount of \$2,500,000, was prepared by the program management team. The cost of this additional

work will be funded from the Project supplemental contingency approved by the Board on March 22, 2021.

As discussed with the Board in March 2021, the Federal Transit Administration (FTA) requested that OCTA not finalize the forecast schedule or estimated cost to complete for the Project until FTA has conducted its own detailed cost and schedule risk analysis, which is anticipated to be complete in early fall. Design services are needed throughout construction, but the level of effort will decrease as the Project nears the end of construction. The complete term of the agreement and the associated cost of the services cannot be finalized until OCTA reaches concurrence with FTA on the Project cost and schedule risk analysis. Upon completion of FTA's risk analysis, staff will return to the Board with recommendations for cost and schedule adjustments to complete the Project. Staff intends to return to the Board following that date to address any additional design services required through the revised Project completion schedule, as agreed to by FTA.

Procurement Approach

This procurement was handled in accordance with Board-approved procedures for architectural and engineering services, which conform to both federal and state laws. On September 14, 2015, the Board approved an agreement with HNTB, in the amount of \$16,434,022, for preparation of the project plans, specifications, and estimates, and it has been previously amended in accordance with Attachment A.

Staff is requesting Board approval to add funds to the existing agreement for additional DSDC. OCTA project staff and HNTB have agreed upon the level of effort for the required services. OCTA found HNTB's price proposal, in the amount of \$2,500,000, to be fair and reasonable for the work to be performed and consistent with the independent cost estimate prepared by the OCTA project management team. Proposed Amendment No. 11 will also extend the term of the agreement by six months from April 1, 2022 through September 30, 2022, and increase the total contract value to \$26,083,841.

Fiscal Impact

Funding for the Project is included in OCTA's proposed fiscal year 2021-22 budget, Capital Programs Division, Account No. 0051-7519-TS010-Z84, and will be funded through local Measure M2 and federal Congestion Mitigation and Air Quality funds.

Summary

Staff requests Board of Directors' approval to authorize the Chief Executive Officer to negotiate and execute Amendment No. 11 to Agreement No. C-5-3337 with HNTB Corporation, in the amount of \$2,500,000, for continued design support services during construction for the OC Streetcar project and to extend the agreement term through September 30, 2022.

Attachment

- A. HNTB Corporation, Agreement No. C-5-3337 Fact Sheet

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