



October 13, 2025

To: Members of the Board of Directors

From: Darrell E. Johnson, Chief Executive Officer

Subject: Approval to Release Request for Proposals for Harbor Boulevard Transit Signal Priority Deployment

Overview

The Orange County Transportation Authority has developed a request for proposals to initiate a competitive procurement process to retain consultant services for the deployment of a transit signal priority solution that includes software, signal equipment, and system integration. The project will focus on the OC Bus Rapid 543 service and will encompass 52 signalized intersections along Harbor Boulevard.

Recommendations

- A. Approve the proposed evaluation criteria and weightings for Request for Proposals 250014 for the selection of a consultant to deliver the Harbor Boulevard Transit Signal Priority Deployment.
- B. Approve the release of Request for Proposals 250014 for consultant services to deliver the Harbor Boulevard Transit Signal Priority Deployment.

Discussion

Orange County agencies have made significant investments in their signal infrastructure, improving communication between the signalized intersections and their respective Traffic Management Centers (TMC) using local funds such as the Orange County Transportation Authority's (OCTA) Measure M2. Similarly, OCTA buses are outfitted with technology that enables data collection, remote communications, and location tracking that creates a constant information exchange between bus operators and the OCTA Traffic Operation Center. This environment is well-suited for integration with cloud-based transit signal priority (TSP) platforms, enabling timely and data-driven priority requests to improve overall transit operations.

In 2023, OCTA was awarded \$1.6 million in U.S. Department of Transportation's Stage 1 Strengthening Mobility and Revolutionizing Transportation Program funds to pilot a cloud-based TSP system on a segment of Harbor Boulevard in the City of Fullerton. This quick-build pilot, implemented in November 2024, was evaluated for both transit benefits and impacts to general vehicular traffic, confirming its viability for broader deployment. Simultaneously, in July 2023, the OCTA Board of Directors (Board) approved the acceptance of Regional Early Action Planning Grants of 2021 (REAP 2.0) funds, administered by the Southern California Association of Governments, to implement Stage 2 of the Harbor Boulevard TSP expansion. As one of the 11 OCTA-led projects under REAP 2.0, this Stage 2 initiative includes the deployment of cloud-based TSP along the entire OC Bus Rapid 543 Route corridor with a budget of approximately \$2.35 million and a project expenditure deadline of December 31, 2026. The project will improve bus reliability and predictability and allow commuters to reach their jobs, medical appointments, schools, and homes in a safe and timely manner. Lastly, the Harbor Boulevard TSP Deployment Project (Project) will allow OCTA to use buses more efficiently and improve the driving experience for OCTA coach operators.

This Project will deploy cloud-based TSP at 52 signalized intersections along the OCTA Harbor Boulevard OC Bus Rapid 543 Route from the OCTA Santa Ana Base at MacArthur Boulevard to the Fullerton Transportation Center at Commonwealth Avenue. The signalized intersections are owned and operated by the Project partners, which include the cities of Anaheim, Fountain Valley, Fullerton, Garden Grove, and Santa Ana. The Project will also modernize the traffic signal infrastructure to support TSP deployment. This modernization will include upgraded traffic signal controllers, field communication switches, and enhanced firewall and security systems at the TMCs.

The selected consultant will be responsible for the system planning, technical architecture, procurement of signal devices, configuration, testing, and deployment of the TSP solution. The consultant will also lead system integration, training, and post-deployment support, ensuring the solution improves bus reliability and is scalable for future corridor expansions. Timely implementation of this solution is critical to ensure compliance with the REAP 2.0 funding requirements.

Procurement Approach

OCTA's Board-approved procurement policies and procedures require that the Board approve all Request for Proposals (RFP) over \$1,000,000, as well as approve the evaluation criteria and weightings. Staff is submitting for Board approval the draft RFP and evaluation criteria and weightings, which will be used to evaluate proposals received in response to the RFP.

The proposed evaluation criteria and weightings are as follows:

- Qualifications of the Firm 20 percent
- Staffing and Project Organization 25 percent
- Work Plan 30 percent
- Cost and Price 25 percent

Several factors were considered in developing the evaluation criteria weightings. Qualifications of the firm is weighted at 20 percent as the proposing firm must demonstrate experience with TSP, signal infrastructure needs, and performance measures of a similar scope and scale. Staffing and project organization is weighted at 25 percent as the firm must demonstrate the level of expertise, resource availability, and involvement for the roles of the proposed project team. The work plan is weighted at 30 percent as the firm's proposed technology solution must be able to meet the functional and technical requirements and challenges of a corridor with multiple stakeholders operating varying signal systems. Cost and price are weighted at 25 percent to ensure that OCTA receives value for the services provided.

The contract term for this procurement will be a five-and-a-half-year term, consisting of six months for implementation followed by five years for software maintenance and support. The total cost is anticipated to be approximately \$2,349,000.

This RFP will be released upon Board approval of these recommendations.

Fiscal Impact

This project was approved in OCTA's Fiscal Year 2025-2026 Budget, Planning Division, Account No. 0017-7669-SPT01-0Q7, and will be funded using REAP 2.0 program funds.

Summary

Board approval is requested to release RFP 250014 to select a firm to deliver the Harbor Boulevard TSP Deployment, as well as approval of the proposed evaluation criteria and weightings.

Attachment

- A. Draft Request for Proposals (RFP) 250014, Harbor Boulevard Transit Signal Priority Deployment

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