BART Agreement Number: 6M8146 Approval Date: 05/11/2022

Work Plan No.: A.12-01 - HMC1 - Vehicle Overhaul & Heavy Repair Shop

Scope:

2 SCOPE OF WORK (Proposal budget for MSO and MS1 only)

Working in collaboration with the BART PM, Engineering, and Procurement staff, Parsons will develop the overall procurement package including the Scope of Work, Request for Qualifications (RFQ), Request for Proposals (RFP), support proposal evaluation and scoring criteria, Non-Disclosure Agreements and other documents as needed to support the procurement and delivery of the HMC VOHRS Design-Build project. In addition, recommendations for proposal scoring and evaluation methodology will also be made in concert with the RFQ and RFP development. This effort will be accomplished via three major activities:

- ✓ Procurement Document Development (Project plans, specifications, etc.)
- ✓ RFQ Development and Process
- ✓ RFP Development and Process

Based upon review of the previous studies and preliminary design of the HMC VOHRS facility, the following paragraphs present our approach to accomplishing these three major activities. The work approach has been organized in a "milestone-based" format aligned with key project delivery strategy decisions. At BART's discretion, all milestones or individual milestones may be authorized as needed to efficiently execute the work approach.

2.1.1 BART-LED ACTIVITIES

BART will provide written Notice to Proceed (NTP) to Parsons authorizing work plan funding by Milestone. Parsons will respond timely to the NTP and define internal project set-up, work breakdown structure, and initial project/document control procedures.

In addition, it is assumed that BART collaborate with Parsons to establish regular meetings throughout this work assignment for program management purposes. BART and Parsons will establish:

- · Bi-weekly project management meetings
- · Procurement and legal coordination and strategy meetings
- . Other meeting to coordinate with other involved BART departments

These meetings will be primarily focused with BART staff from various departments focused on ensuring accurate information is provided throughout the project. Early and ongoing engagement with procurement and legal staff will foster comprehensive dialogue around process, strategy, and action plans. When necessary, this proactive information sharing process will allow thoughtful assessment and decision-making by BART staff to gain permission to proceed to next steps in the project development and procurement process. These MS 0 meetings are envisioned to continue over the life of the project; however, the frequency will likely need to be re-evaluated as the project development and procurement process strategy decisions are made.

2.1.2 PARSONS-LED ACTIVITIES

Parsons will manage the team from start to finish and collaborate with BART to complete the activities described in this section Scope of Work. Parsons will confirm the team, distribute a brief set of project instructions to the team including work breakdown structure, schedule, and deliverable due dates, and conduct a project team kickoff meeting. Formal meetings with BART will be conducted regularly to maintain alignment on strategy, resolve project issues, and advance to advertisement of the RFQ. Technical and procurement team activities will be managed and coordinated as well as the work of specialized subconsultants.

Parsons will monitor project progress against the detailed task schedule through weekly team meetings key staff. The schedule will be updated on a regular basis to track progress, identify critical path items, and incorporate revisions. A brief monthly Progress Report will be submitted including a summary of the status of key activities, schedule, deliverables, and budget with a comparison between planned and actual progress.

Parsons will create and implement a project-specific Design Quality Management Plan (DQMP), in accordance with Parsons' quality procedures and in line with DQMPs previously approved by BART for tasks under the 6M8146 B GES contract. The DQMP will ensure the information submitted to BART will be checked, backchecked, corrected and verified adequately. Quality Assurance staff will ensure the process is performed correctly per the DQMP. This will include training and regular audits of all members of the team to verify successful implementation of the process. The PM will assure team member compliance with the project's DQMP and will also assure compliance with the Project Safety Plan. Design review shall utilize the BART Comment Review Form (CRF) to record and manage comments.

2.2 MILESTONE 1 (MS 1) - EXISTING DATA REVIEW, WORKSHOPS, AND RECOMMENDATION

The existing preliminary engineering and 35% design documents for the VOHRS at the HMC were prepared several years ago for BART assuming a traditional design-bid-build project delivery method. Although a thorough and complete design was accomplished by BART's team, it is possible that some items may need to be revisited and validated prior to proceeding with the development of documents to advance a design build procurement. These could include changes in permit requirements, reassessment of staff facility needs, revised maintenance activities, confirming track work meets operational desires for the planned maintenance activities, and various other items. In addition, for a design-build procurement some elements of the preliminary engineering design may warrant advancement beyond 35 percent based upon BART's risk management and mitigation strategies for this contract. A quick re-assessment of the 35 percent design will be extremely valuable in demonstrating BART's readiness to proceed with procurement activities.

Parsons will assist BART's project management team with the re-assessment of the 35 percent design development to validate facility needs, operational strategies, maintenance activities, overall capacity, and required trackwork. Working collaboratively with BART, key staff with direct involvement in the development of the VOHRS (e.g., staff from Rolling Stock & Shops) and others with operations and maintenance responsibilities will be identified and interviewed to confirm the 35% design documents still represent the right facility with the right components. System and track work elements deemed necessary in the previous 35% design should be reviewed and confirmed.

In addition, the adequacy of the preliminary design drawings and specifications will be assessed within the framework of using the design-build procurement and delivery process. Changes to BART's maintenance procedures, operating strategy, industry standards, the BFS, regulatory requirements, and other items will be identified, reviewed, and used to validate the design and/or identify areas where revisions might be considered.

Any suggested revisions or updates will be noted for discussion with BART's project manager to determine next steps to assemble the Project Documents (PD) for a design-build procurement. The Project Documents will be available to support the RFQ and RFP procurement process. Typically, it includes preliminary design studies, drawings, specifications, environmental requirements, permitting, and other previously completed and available studies and agency agreements specific to the VOHRS for bidders to align qualifications and prepare technical proposals.

Although BART envisions advancing the HMC VOHRS using a design-build project delivery process, it may be worthwhile to consider the advantages and disadvantages of other alternative delivery methods to confirm BART's direction and further demonstrate BART's proactive efforts to be shovel-ready. Each alternative delivery method offers BART various degrees of design and construction control albeit each method likely also changes the risk profile for the project. With BART's concurrence, a brief project delivery workshop will be conducted to illustrate various methods that may be available and applicable to the VOHRS facility. In addition to the traditional design-bio-build and design-build methods, other proven methods such as progressive design-build (PDB) and construction manager/general contractor (CM/GC) would be discussed to understand the pros/cons of each method, the schedule and cost differences, and changes in risk intensity, assignment, and mitigation strategy. During preparation for workshop materials, other delivery methods may also be suggested and deemed worth considering during the workshop. Our financial analysis sub-consultant will use the cost estimator's inputs and coordinate engineering, insurance, and cost estimator inputs to adjust cost items for risk, including likelihood of occurrence and severity of impact. The workshop outcome could be recommendation of a different delivery method, or more likely, confirmation of BART's decision to use the design-build method.

Similarly, a contracting workshop will be planned and conducted. Information gained through regular meetings and work sessions with BART legal and procurement staff will help the team define the agenda and goals for the workshop. Various contracting methods have associated benefits and challenges, not to mentions unique schedule and process hurdles. Refinements in contracting strategy, requirements, and procedures for BART will be discussed in detail within the framework of possible alternative project delivery methods for the HMC VOHRS. The unique challenges associated with various delivery methods will be summarized for consideration by BART when the final project delivery method is chosen.

BART's risk register for the HMC VOHRS should also be reviewed and updated within the framework of a design-build procurement. A collaborative work session with BART's team and Parsons's technical SMEs would be conducted to identify and discuss appropriate updates to the risk register. At the workshop, revisions to risk intensity or mitigation strategies wil88l likely be discussed since the risk associated with a design-bid-build project where the owner controls the design are different when the project is delivered using the design-build method. For instance, to mitigate an identified risk associated with delay, BART may elect to consider procuring special trackwork or other similar long-lead items separately from the design-build procurement. To do so, the special trackwork design may need to be advanced to a higher-level to permit procurement. Similarly, it may be desirable for BART to obtain some of the permits necessary to build the project. Advancing some design elements beyond the 35% level may be necessary to support permit applications and gain regulatory or local agency approvals. By choosing to use the design-build method, the approach to risk management and mitigation will be different than for a design-bid-build project.

Following these reviews and workshops, Parsons will summarize the findings and outcomes from the three workshops. Based on this summary, Parsons will recommend the most advantageous project delivery method based on financial attractiveness, contracting process, and risk management strategies. As the conclusion of MS 1, BART will formally document the selection of the procurement strategy and delivery method for the VOHRS project.

2.3 MILESTONE 2 (MS 2) - DEVELOP PROJECT DOCUMENTS

Assuming the BART-adopted project procurement process and delivery method is design-build, Parsons will work with the BART PM, Engineering, and Legal and Procurement staff to ensure integration and incorporation of BART contracting policies and procedures. If a different project delivery method is chosen by BART, then the appropriate adjustment to the contents of the Project Documents will be discussed and properly adjusted.

Decisions regarding the packaging of the design-build contract will be confirmed. Roles and responsibilities will be established. The final contents of the Project Documents will be defined. Where necessary the preliminary engineering drawings will be advanced to support opportunities advantageous to BART. The technical team will focus on ensuring the preliminary design drawings and specifications are appropriate for a design-build procurement and appropriate for inclusion in the Project Documents. Collaboration between the technical team and the procurement team will be key to achieving success. Opportunities to allow for contractor innovation will be leveraged. Existing specifications will be updated as necessary to reflect the latest BFS revisions. The project design and other documents (geotechnical, design reports, environmental requirements, etc.) will be identified and catalogued for use by prospective bidders as part of the available project information included in the Project Documents. The Project Documents will be the main component of both the RFQ and RFP for prospective bidders.

2.4 MILESTONE 3 (MS 3) – REQUEST FOR QUALIFICATION DEVELOPMENT, PROCESS, AND SHORT-LIST

Upon validation of the preliminary design of the HMC VOHRS and confirmation of the design-build delivery method, Parsons will assist BART staff with the development of the Request for Qualifications and RFQ evaluation criteria. From information gathered via other BART meetings and work sessions, a list of known contractors with the capabilities, capacities, and resources will be assembled. Depending on the number of entities interested in the VOHRS project, and because if it's specialized nature, it may be prudent to prepare a Request for Expressions of Interest. The RFEQI, if needed, could be published in the appropriate federal and state contracting portals for related transportation and industrial projects. The received EOI's will likely expand the list of qualified entities interested in the BART project.

A workshop will be conducted to review, discuss, and strategize key delivery efforts to develop an overall project procurement schedule for the VOHRS project. The schedule will identify critical and non-critical path activities with assumed start/end dates and durations. Schedule options and risks will be discussed to choose the most advantageous work path. The draft and final project procurement schedule will be submitted for BART review and approval before establishing a baseline.

Within the RFQ, key qualifications of DB team staff will be identified including Project Manager, Design Manager, Construction Manager, Quality Manager, Safety and Security Manager, and Testing and Commissioning Manager will likely be defined. Financial strength and bonding capacity will be a critical must have for the most qualified team. Past successful completion of similar rail-related vehicle maintenance and repair facilities using design build will be required. In addition, the ability to achieve the desired schedule for design development, construction, testing, and commissioning will be key evaluation criterion within the RFQ.

Following adoption of the evaluation criteria and scoring assignment, a draft RFQ will be developed in alignment with BART's established procurement and contracting procedures. Once approved, the final RFQ will be developed and delivered to BART for final review, approvals, and advertisement.

Parsons will assist BART by reviewing and summarizing the received Statement of Qualifications from responders using the established evaluation criteria. It is anticipated that select BART project management staff will assist with the review of RFQs. A work session will be scheduled and conducted to discuss the SOQs received, merits of each, ranking by evaluation criteria, and other discussions with evaluation team members regarding the strengths and weaknesses of each DB team's submittal. BART reserves the right to interview responders to gain further insights regarding qualifications, expertise, schedule understanding, project approach, and operational goals for the HMC VOHRS facility. Parsons will participate with BART in the interviews and provide feedback and recommendations for the preferred design builders who should receive the Request for Proposal.

2.5 MILESTONE 4 (MS 4) - ASSIST WITH REQUEST FOR PROPOSAL (RFP) PROCESS

In parallel with the development of the RFQ, Parsons will work with BART staff to develop the portions of the Request for Proposal (RFP) to accompany the project design documents (e.g., specifications, drawings, agreements, requirements, key interfaces, environmental requirements, and related contracts/projects). Like the RFQ process, evaluation criteria for the Proposals will be discussed with BART staff and defined. Upon establishment of the evaluation criteria, a draft RFP will be prepared and assembled with the project documents for review and approval by BART's procurement team. Following any agreed revisions, the final

RFP for the HMC VOHRS Design Build project will be delivered for BART's final packaging, approval, and release to the short-list of DB teams. During the proposal preparation period, Parsons will participate in presubmittal information meetings, discussions regarding alternative technical concepts (ATCs), and provide consistent information to all DB teams regarding studies, reports, and design efforts conducted to-date. In addition, Parsons will support BART with responses to RFIs and develop addenda to the RFP if needed during the 12-week period allocated to the DB teams to prepare their proposals.

When proposals are received, Parsons will review each proposal and prepare a comparative analysis of the design-builders proposals based against the established RFP evaluation criteria. The findings of the analysis will be presented to BART in a workshop setting where the specific merits of each team can be discussed. The comparative analysis will also recommend which teams should be interviewed (should BART elect to have interviews as part of the DB team selection process). Should interviews be scheduled, Parsons will assist BART and participate in the interview process and collaborate on recommendations for the selection of the most responsive qualified design-build team considering the projects complexity, schedule, risks, and financial challenges. Subsequently, Parsons will support BART during contract negotiations with the successful DB team through final contract execution and BARTs issuance of a Notice to Proceed.

Prime: Parsons

Subconsultant	Amount	DBE (Y/N)	SBE (Y/N)
PFAL	\$42,591	Y	Υ
JMA	\$32,907	N	Υ
YEI	\$60,707	Y	Υ
Earth Mechanics	\$22,010	Y	Y
Elle Consultants	\$9,144	Y	Y
360 Total Concepts	\$27,280	Y	Y

Work Plan Value: \$860,719