

## Work Plan A-13.01 91HD004 BFS Major Update Support

### Scope:

CONSULTANT will provide support services as follows:

#### I. Tier 1 Discipline needs:

1. BART will provide CONSULTANT access to the discipline's BFS Standard Specifications, Design Criteria, and Standard Drawings, and additional BFS documents related to these disciplines. After reviewing existing BFS sections, present findings to technical teams, identifying gaps and inconsistencies in individual sections, proposing new sections in the Design Criteria and/or Standard Specifications as well as new BFS drawings and modifications to consider industry standards and best practices.
2. Prepare workshops with BART Discipline staff to collect their BFS proposed changes and present the findings from activity one above.
3. Help obtain consensus from BART Disciplines on the BFS major work items that the team will move forward with to generate the report detailing the work needed to implement BFS major revisions. The report is to include estimated hours of labor, potential team makeup, documents to be produced or revised, and Technical Support needed from BART's and CONSULTANT's staff for each Discipline to carry out the Major changes. Provide a cost estimate for the major work required per division.

Tier 1 Disciplines: Traction Power (TP), Computer Science Engineering (CSE), and Fare Collection Engineering (FCE).

#### II. Tier 2 Discipline needs:

**Computer Science Engineering:** One Technical Writer and one SME (if required per the final report developed during the Tier 1 task) to help the BART disciplines carry out changes to the BFS Standard Specifications, Design Criteria, and Standard Drawings, and additional BFS documents related to these disciplines. Current changes identified by the BART discipline owner include:

1. New Standard Specification for 27 60 00 Supervisory Control and Data Acquisition. (Those Specifications are already well established and need to be reviewed with BART CSE SME.)

**Fare Collection Engineering:** One Technical Writer and one SME (if required per the workshop final report developed during the Tier 1 task) to help the BART discipline carry out changes to the BFS Standard Specifications, Design Criteria, and Standard Drawings, and additional BFS documents related to these disciplines. Current changes identified by the BART discipline owner include:

1. Updates to fare gates Standard Specifications and Design Criteria.
2. Updates to Appendices - "Automatic Fare Collection Equipment Requirements - Generic Station Calculation"

#### Traction Power:

1. One Technical Writer to help the BART discipline carry out changes to the BFS Standard Specifications, Design Criteria, and Standard Drawings, and additional BFS documents (appendices) related to these disciplines. Current changes identified by the BART discipline owner include, but are not limited to:
  - a. Updates to TP Standard Specifications. Technical Writer support to review (for language and technical content formatting) and generate final redline documents with changes that TP has already identified and plans to incorporate into the BFS.

2. One Traction Power SME to:

- a. Confirm the latest referenced codes and standards are being cited in the BFS. CONSULTANT must have access to industry standard and codes to confirm that the latest versions are referenced in the TP BFS and provide BART TP with a summary of major Standard Content updates.
- b. Provide support to help develop new BFS TP sections including but not limited to implementing language from the Tier 1 gap analysis findings for remote monitoring, SBL sheets, and equipment for stray currents into the BFS.
- c. Other tasks as requested by the BART Project Manager.

**Prime: PGH Wong Engineering, Inc.**

**Subconsultants: None**

**Total Work Plan Value: \$ 299,888**