

SANTA BARBARA METROPOLITAN TRANSIT DISTRICT

Invitation for Bids (IFB) for LiFePO₄ Battery Cells

Addendum Number 2 – Issued August 14, 2014

The Santa Barbara Metropolitan Transit District (MTD) herewith issues this Addendum No. 2 to its *Invitation for Bids for LiFePO₄ Battery Cells* which was issued August 5, 2014. Except as modified by this addendum and Addendum 1 issued August 7, 2014, all other terms and conditions of the IFB remain unchanged. Attached are the revised pages of the IFB showing the Addendum 2 changes in red. In response to requests for clarifications or changes which were received by the deadline of August 12, 2014, the following clarifications and changes are hereby incorporated into the IFB:

- A2-1 On the Solicitation Summary page the Bid Due Date/Time is changed to read “Thursday, August 21, 2014 at 2:00 PM (PDT).”
- A2-2 In Section 2.3 of the Solicitation Instructions change the day and date until bids will be accepted to read “Thursday, August 21, 2014.” The time of “2:00 PM” is unchanged.
- A2-3 As a reminder, Section 2.4 of the Solicitation Instructions authorizes the withdrawal of a bid and the right to resubmit a bid that is received by the bid due date and time.
- A2-4 In the Technical Specifications under Specific Requirement 1.d.iii., add the following parenthetical statement: “(height includes the battery terminal post).”
- A2-5 In the Technical Specifications under Schedules and Options, change the sentence “‘Days’ below means ‘calendar days’” to read “‘Days’ below means ‘business days.’”
- A2-6 The manufacturer and part number of the Ni-Cd modules that are being replaced with the LiFePO₄ battery cells is Saft STM-140.
- A2-7 MTD uses the Ligoo EK-FT11 battery management system in conjunction with EV Power Australia cell balancing modules (2 paralleled per 400Ah cell).
- A2-8 The current vent system in the battery compartment is sufficient for the very modest charge and discharge rates used.
- A2-9 A publicly listed company in Hong Kong is eligible to bid; there is no requirement that bidders be U.S. companies.
- A2-10 A request was made to allow a change in the specified nominal dimensions of the cells to the following:
 - Length: 461 mm +/- 2 mm
 - Width: 65mm +/- 2 mm
 - Overall Height: 285 mm +/- 2 mm, and cell height without the terminals 277 mm

MTD’s response is that the requested dimensions are not acceptable. MTD’s cell dimension specification is based on the dimensions of the battery trays which are based upon the available

space in the electric shuttle battery compartments. MTD is aware of several potential bidders that can meet the existing dimensions.

A2-11 Requests were made to allow a delivery schedule of 10 to 16 weeks after receipt of contract award and to allow a delivery schedule of 8 to 12 weeks after receipt of payment.

MTD's response is that neither of the requested delivery schedule changes is acceptable because MTD is in immediate need of the cells and believes there will be sufficient competition among bidders which can meet the currently specified delivery schedule.

A2-12 A request was made to change section 8 of the Master Agreement to provide for a 50% deposit upon receipt of the order, 30% progress payment upon completion of the cells at the factory, and 20% payment upon bill of lading.

MTD's response is that the current payment provision is satisfactory because the 10 day delivery and 10 day acceptance periods minimize the impact on financially responsible suppliers.

A2-13 A request was made to allow a specification change that each of the 92 cells be composed of a module of either twenty or twenty-four 20Ah cells with finished module dimensions different than those specified.

MTD's response is that the proposed cell/module configuration is denied as it would not properly fit within the battery trays and would increase the number of cells significantly thus increasing complexity, maintenance, and management.

End of Addendum 2



Invitation for Bids for LiFePO₄ Battery Cells

SOLICITATION SUMMARY SHEET

Solicitation Issuance Date: Tuesday, August 5, 2014

Latest Revision Date: Thursday, August 147, 2014

Project Description: Provide Lithium Iron Phosphate (LiFePO₄) Battery Cells and related items as specified in the enclosed Technical Specifications. A bid is for a base quantity of two sets of 92 cells and related items plus an option quantity of four sets of 92 cells and related items which may be issued later at MTD's discretion.

Project Locations: MTD Maintenance Department at 550 Olive Street, Santa Barbara, CA 93101

Pre-Bid Meeting Date/Time: None

Requests/Clarifications Deadline: Tuesday, August 12, 2014 at 5:00 PM

Bid Due Date/Time: ~~Tuesday~~Thursday, August ~~147~~1921, 2014 at 2:00 PM (PDT)

Bid Due Location: MTD Administrative Offices, 550 Olive Street, Santa Barbara, CA 93101
Reception Desk on 2nd Floor (bids opened in downstairs auditorium)

Bid Contents: Price Bid; Bidder Information; References, Suppliers & Subcontractors; and Acknowledgement of Addenda forms. LiFePO₄ Battery Cell Specification Sheet.

Contract Award Date: Tuesday, August 26, 2014 (anticipated)

Solicitation Contact: Ken Mills, Project Manager, (805) 832-3024, kccmills@dslextreme.com

Type of Solicitation: Sealed invitation for bids with award to low responsive, responsible bidder

Type of Contract: Fixed price

Bonding Required: None

Check MTD website at <http://www.sbmtd.gov/business-and-employment/active.html> for updates.

2.2 BONDS

None required.

2.3 BID SUBMISSION & OPENING

One original and one complete copy of required bid documents shall be submitted in a non-transparent, sealed envelope plainly marked on the exterior with the name of the bidder and "LFP Battery Cells IFB." If **not** brought by hand to the bid opening at MTD's administrative offices (downstairs auditorium) at 550 Olive Street, Santa Barbara, bids shall be delivered to: Santa Barbara Metropolitan Transit District, 2nd Floor Reception Desk, 550 Olive Street, Santa Barbara, CA 93101. If using delivery service, bids must still be enclosed in a sealed envelope within the delivery service packaging. **Fax or e-mail bids will not be considered. Bids will be accepted until 2:00 PM on ~~Tuesday~~Thursday, August 19~~21~~, 2014.** Unless due to the fault of MTD, bids received after such time will not be considered. All bids received by the bid submission deadline will be opened and read aloud at an open public meeting immediately following the submission deadline.

2.4 WITHDRAWAL OF BIDS

A bidder may withdraw a bid prior to the bid opening by submitting a written request signed by the bidder's authorized representative. Such withdrawal does not prejudice the right to resubmit a bid by the deadline.

2.5 BID STIPULATIONS

Bids submitted as a result of this solicitation become the property of MTD. MTD will not pay any cost incurred by bidder for preparation or delivery of its bid; reserves the sole right to review, accept or reject bids received; and reserves the right to cancel this solicitation in whole or in part if in its best interests to do so.

3. REVIEW & AWARD

3.1 RESPONSIVENESS

MTD shall examine the low bid to determine its responsiveness to the provisions of this solicitation. Bids that do not contain all required items or where such documents are substantially incomplete may be considered non-responsive and rejected by MTD. This process shall continue until a low responsive bidder is determined.

3.2 RESPONSIBILITY

MTD shall assess the low responsive bidder's "responsibility," which is defined as satisfactory performance in previous contracts. MTD will use references provided in the bid and other available information for this determination. A bidder not found to be responsible shall be rejected. This process shall continue until the low responsive and responsible bidder is determined.

3.3 CONTRACT AWARD & EXECUTION

If considered in MTD's best interest, MTD staff will recommend to the General Manager that a contract be awarded to the responsive and responsible bidder providing the lowest bid. It is anticipated that such recommendation will be considered by the General Manager by Tuesday, August 26, 2014.

Upon award of the contract for the project, the winning bidder shall promptly supply a certificate of insurance showing the coverage types and dollar limits required in paragraph 18 of the *MTD Master Agreement*. Such certificate must show MTD as an additionally insured.

The contract will be executed as soon as practical after contract award and the satisfactory receipt of the preceding item. The contract will be composed of the *MTD Master Agreement*, the *Technical Specifications*, and relevant portions of the Contractor's bid.

Santa Barbara Metropolitan Transit District
Invitation for Bids for LiFePO₄ Battery Cells
Technical Specifications

Background: SBMTD operates electric shuttle buses which are powered by Ni-Cd modules which are being replaced with Lithium Iron Phosphate (LiFePO₄) Cells. The cells will be located in battery trays positioned in compartments under the seating area of the bus. This project is to provide new LiFePO₄ cells which will be installed by MTD. MTD has successfully performed this battery upgrade several times since 2010 including installation of battery management systems.

Specific Requirements.

1. Provide LiFePO₄ cells in accordance with the following specifications:
 - a. A set of cells is 92 cells using the dimensions in “1d” below to fit in two compartments. The resultant quantity for one set will be enough cells for one bus.
 - b. Cells shall have a rated capacity of 400 Ah at nominal 22 degrees centigrade temperature conditions.
 - c. The total calculated electric power at 3.2 volts per cell shall not be less than 117 kilowatt-hours.
 - d. The cells typically charge at a rate of 0.11C and discharge at a peak rate of 0.6C with an average discharge rate of 0.25C.
 - e. Nominal cell dimensions are as follows:
 - i. Length: 450 mm +/- 2 mm
 - ii. Width: 72 mm +/- 2 mm
 - iii. Height: 286 mm +/- 2mm (height includes battery terminals)
 - f. Cells shall be available for bulk and replacement purchase in a quantity of as few as one cell.
2. Provide with each set of LiFePO₄ cells the following set of related items: 100 inter-cell 400 Amp rated copper connectors, 100 14 mm stainless steel terminal bolts, 100 14 mm flat washers and 100 14 mm stainless steel split lock washers.
3. The LiFePO₄ cells shall be warranted for 2,000 charge cycles at 80% depth of discharge (DOD) wherein one cycle is for discharge from 100% charge to 20% charge remaining.

Schedule & Options. “Days” below means “~~calendar~~-business days.”

- Base Contract Quantity – Two sets of cells and two sets of related items shall be delivered within 10 days after receipt of contract award.
- Optional Contract Quantity – Four sets of cells and four sets of related items shall be delivered within 10 days after receipt of MTD notice that the option is being exercised. The option may be exercised solely at MTD’s discretion and must be done for all four sets unless Contractor approves a lesser quantity.
- Exercise of Option – MTD shall have the right to exercise the option for 90 days following formal acceptance of the first two sets of cells.

Delivery Location. All items shall be delivered FOB to the following address:

Santa Barbara Metropolitan Transit District, 550 Olive Street, Santa Barbara, CA 93101