

REQUEST FOR PROPOSALS

REPLACEMENT OF TWO AIR MONITORING SHELTERS SAN JOAQUIN VALLEY AIR POLLUTION CONTROL DISTRICT

#P2023-7-7

The San Joaquin Valley Air Pollution Control District (District) requests proposals for the following purpose according to terms and conditions attached. In the preparation of this Request for Proposals (RFP) the words "Proposer," "Contractor," and "Respondent," are used interchangeably.

PURPOSE

The purpose of this Request for Proposals (RFP) is to solicit competitive bids from eligible contractors. The project entails the design, construction, and installation of two advanced, efficient, and reliable air monitoring shelters to replace the existing ones. The new shelters must accommodate our existing air monitoring equipment and ensure our sustained ability to assess air quality in accordance with regulatory standards. The successful bidder will be required to enter into a formal agreement with the District for the purpose of completing the specified work and providing the products according to this RFP.

BACKGROUND

The San Joaquin Valley Air Pollution Control District is a special district operating under the provisions of Sections 40150 through 40162 of the California Health and Safety Code. The District exists to develop and implement programs on a local level to meet the requirements of state and federal air pollution control laws.

Our current air monitoring shelters, while having served us well, have reached the end of their service life and require replacement. The aim of this project is to replace two existing shelters with new, more efficient, and reliable structures capable of housing our air monitoring equipment, ensuring our ongoing capability to monitor air quality in line with regulatory standards.

CONTACTS

Questions regarding the content or intent of this RFP or on procedural matters should be addressed to:

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SCHEDULE OF EVENTS

May 26, 2023	RFP Released
July 7, 2023	Proposals Due – 5:00 PM (Pacific Standard Time)
August 17, 2023	Board Approval (estimated)

STATEMENT OF WORK

The District is requesting bids from qualified contractors for the design, construction, and installation of two advanced, efficient, and reliable air monitoring shelters to replace the existing ones. The new shelters must accommodate our existing air monitoring equipment and ensure our sustained ability to assess air quality in accordance with regulatory standards. Information provided should be specific enough for evaluation and for inclusion into a binding contract. In order to ensure operational efficiency, consistency with other air monitoring shelters already deployed is highly desirable.

Qualified contractors are encouraged to contact the District for a list of air monitoring and support equipment that will be housed and operated within each of the shelters identified below, and if needed, schedule a time for a site visit for a survey of the project area to assist with proposal planning.

Fresno-Sierra SkyPark Air Monitoring Shelter (4508 Chennualt Ave, Fresno, CA 93722)

This replacement project includes:

- Potential removal and disposal of existing shelter, including potential additional costs for asbestos removal services
- All necessary ground preparation and repair
- Design, construction, and installation of shelter designed to house air monitoring equipment in a secure and controlled environment
- Design that is compliant with applicable regulations and codes
- Provide a turn-key service for the air monitoring shelter, through the complete set-up of air monitoring and support equipment in a state that is ready for operation to quickly resume data collection
- Meet or exceed specifications and features of other air monitoring shelters currently deployed in the San Joaquin Valley. Please refer to Attachment A as an example of a recent air monitoring shelter developed for the District's air monitoring network.

Clovis-Villa Air Monitoring Shelter (908 N Villa Ave, Clovis, CA 93612)

This replacement project includes:

- Potential change in location of new shelter and any necessary development of electrical infrastructure
- Potential removal and disposal of existing shelter, including potential additional costs for asbestos removal services
- All necessary ground preparation and repair

- Design, construction, and installation of shelter designed to house air monitoring equipment in a secure and controlled environment
- Design that is compliant with applicable regulations and codes
- Provide a turn-key service for the air monitoring shelter, through the complete set-up of air monitoring and support equipment in a state that is ready for operation to quickly resume data collection
- Meet or exceed specifications and features of other air monitoring trailers currently deployed in the San Joaquin Valley. Please refer to Attachment A as an example of a recent air monitoring shelter developed for the District's air monitoring network.

The District may require specific insurance coverage be established and maintained during the course of the work and as a condition of award or continuation of contract.

REQUIRED QUALIFICATIONS

Contractor must be qualified, willing, and able with proven track record to design, build, install, and support the replacement air monitoring shelters identified in this RFP. More specifically, contractors must be able to provide evidence of the following experience and qualifications:

- Experience constructing shelters, working with subcontractors as needed, working with cities/counties on any necessary permitting, working with electrical utility companies as needed, and managing multiple aspects associated with a construction project
- Experience designing and constructing shelters for the express purpose of air monitoring operations
- Understanding of air monitoring equipment, their operation, and how to design shelters to support the efficient use of space to house the necessary equipment
- Experience working on projects for local or state air quality monitoring agencies

PROPOSAL SUBMITTAL REQUIREMENTS

Submitted proposals must follow the format outlined below and all requested information must be supplied. Failure to submit proposals in the required format will result in elimination from proposal evaluation.

A separate cover letter including the name, address, telephone number, and e-mail address of the contractor, and signed by the person or persons authorized to represent the firm should accompany the proposal submission. Firm contact information as follows should also be included in the cover letter:

1. Address and telephone number of office in, or nearest to, Fresno, California.
2. Name and title of firm's representative designated as contact.

Proposals must include the following information.

- Summary – Overall approach to meeting the objectives and satisfying the scope of work to be performed and the sequence of activities.

- Program Schedule – Provide projected milestones or benchmarks for installation and completion.
- Qualifications – Describe the technical capabilities of the firm. Provide references of other similar projects performed during the last five years demonstrating ability to successfully complete the project. Include contact name, title, and telephone number for any references listed. Provide a statement of your firm's background and experience in performing similar projects for other governmental organizations.
- Subcontractors – This project may require expertise in multiple technical areas. List any subcontractors that may be used and the work to be performed by them.
- Additional Data – Provide other essential data that may assist in the evaluation of this proposal.
- Cost – Provide a detailed cost breakdown of the project including equipment, shipping, and labor.
- Warranty – Provide details of provided warranties for equipment and labor associated with the project.

This project is subject to prevailing wage requirements contained in California Labor Code section 1770 *et. seq.* Any contractor submitting a proposal must be registered with the California Department of Industrial Relations (“DIR”), and must comply with all prevailing wage requirements provided by California Labor Code section 1770 *et. seq.*, including submission to compliance monitoring and enforcement by the DIR.

A contractor who submits a proposal in response to this RFP is encouraged to demonstrate support for the District’s *Green Procurement and Sustainable Practices Policy* through the following:

- Provide verification of environmentally friendly business practices through green certification programs or equivalent means.
- Participate in eco-friendly programs such as HAL Partners. More information can be found here: <http://healthyairliving.com/>.

PROPOSAL SUBMISSION

All proposals must be submitted according to specifications set forth in the sections above. Failure to adhere to these specifications may be cause for rejection of proposal.

All proposals are due no later than 5:00 PM (Pacific Standard Time), July 7, 2023 and must be signed by an authorized representative and e-mailed to nathan.trevino@valleyair.org and chay.thao@valleyair.org.

The email subject line should be “RFP: Air Monitoring Shelter Replacement”

Late bids/proposals will not be accepted under any circumstances.

Grounds for Rejection – A proposal may be immediately rejected if:

- It is not prepared in the format described, or
- It is signed by an individual not authorized to represent the firm.

Modification or Withdrawal – Once submitted, proposals cannot be altered without the prior written consent of the District. All proposals shall constitute firm offers and may not be withdrawn for a period of ninety (90) days following the last day to accept proposals.

PROPOSAL EVALUATION/CONTRACTOR SELECTION CRITERIA

Submitted proposals will be evaluated and scored across a number of criteria in order to determine which contractor would be best suited for the projects. As reference for the contractors on how the proposals will be considered, the following guide provides more detail on how the various elements of the proposals will be scored during the evaluation process.

Table 1. Proposal Evaluation Scoring Guide

<i>Proposal Element</i>	<i>Maximum Score</i>
1. <u>Proposed Design</u> : Quality, functionality, safety, energy efficiency, durability, aesthetic appeal of the proposed shelter design, and cost-effectiveness of the proposal, considering both the initial cost and ongoing maintenance expenses	50
2. <u>Previous Experience</u> : Relevance and success of past projects similar in nature	40
3. <u>Project Plan</u> : Coherence, feasibility, and completeness of the plan, including timeline and milestones	5
4. <u>Reference Feedback</u> : Quality of feedback from previous clients, including reliability, professionalism, and adherence to deadlines	5
<i>Total Maximum Possible Score</i>	<i>100</i>

PROPOSAL REVIEW PROCESS

- A. Proposals will be evaluated by District staff members familiar with the subject matter of the project. The panel will make a recommendation to the Executive Officer and/or the District Governing Board for final selection of a contractor and presentation of a contract.
- B. During the selection process the District may wish to interview some proposers for clarification purposes only. No new material will be permitted at this time. Additional information provided during the bid review process is limited to clarification by the Proposer of information presented in his/her proposal, upon request by the District.
- C. The Executive Officer or Governing Board may award the contract to a Proposer other than the Proposer receiving the highest rating in the event the Governing Board determines that another Proposer from among those technically qualified would provide the best value to the District considering cost and technical factors. The determination shall be based solely on the Evaluation Criteria contained in the RFP, on evidence provided in the proposal and on any other evidence provided during the bid review process.
- D. The selection will be made by and is subject to Executive Officer or Governing Board approval. Proposers may be notified of the results by letter.
- E. Disposition of Proposals – Pursuant to the District's Procurement Policy and Procedure, the District reserves the right to reject any or all proposals. All proposals become the property of the District, and are subject to the California Public Records Act. One copy of the proposal shall be retained for District files. Additional copies and materials will be returned only if requested and at the proposer's expense.

Attachment A

Example Air Monitoring Shelter Specifications

Trailer Information

All of Ambilabs® Air Quality Monitoring (AQM) trailers, shelters, and enclosures are purpose built for the needs of air quality monitoring systems. Our model AQMT structures are uni-body or welded all aluminum construction from the structure framing to the interior and exterior envelopes. The aluminum structure is light weight, corrosion resistant, and custom configurable to provide robust enclosure with an extended operational lifespan.

We only build air quality monitoring systems. Our design team understands the requirements of the construction of an enclosure around the needs of the monitoring instrumentation. Our designs are based on experience in the long-term operational requirements of an air monitoring system including the security and stability of the internal environment, the unique inlet needs for instrumentation and analysis equipment, and the need for workable and accessible interior and exterior space for technicians to perform day to day operational activities and instrument maintenance.

The Ambilabs® AQMT-12 trailer is a fully assembled, environmentally controlled enclosure designed to house air monitoring equipment in a secure and controlled environment. It is thermally efficient and features designs and materials that control climate penetration through the walls, floor and ceiling. The trailers will comply with applicable transportation, construction and electrical codes.

Trailer/Enclosure Build Description

Trailer and enclosure are all-aluminum construction so rot or corrosion is not a factor in standard environments, and has a significant overall weight reduction in the completed product for towing and transport. The exterior painted surfaces are finished with at least 2 coats of epoxy paint, or is powder coated to maintain a long lifespan finish.

Trailer will be a 10,000lb GVWR, tandem 5,000lb torsion axle with 10-ply radial tires (including spare) with electric trailer brakes and LED lighting. Trailer will have 5 Heavy duty crank jacks (1 tongue jack and 4 removable corner jacks) for stabilization or shelter body separation. Final trailer weight as constructed will be approximately 6500lbs.

Trailer will be Uni-body design built to size specification of 8' wide by 12' long (finished overall trailer length with will be approx. 22'). The finished height of the trailer itself will be 10'6", with the nested tower installed the transportation height of the trailer will be 13'4". The complete internal dimension of the shelter component will be nominally 11'3" long, 7'6" wide, and 7'6" tall.

Shelters are constant with NEMA 3R standards to protect personnel and equipment from foreign objects and the ingress of water. They are built to withstand long-term exposure to a broad spectrum of environmental conditions. The roof is constructed of 0.187" single sheet, or formed, epoxied and welded, aluminum sheeting with 0.125"x3"x1.5" formed "C" aluminum trusses on 12" centers. Floor is constructed of 0.125"x1.5"x10" custom extrusion deck boarding, supported by 0.25"x6" Aluminum Channel, interior flooring is 0.185"

commercial vinyl. Exterior walls are constructed of 0.125"x3"x16" formed aluminum wall panels, epoxied and huck-bolted together in a unibody design. Interior walls are 0.100" aluminum panels, riveted to the exterior structures (FRP paneling can be installed if required, Ambilabs has found that aluminum interior provides a cleaner, more robust interior structure and does not require a wood undersurface maintaining an all-aluminum build and reducing construction weight). Wall Headers are 0.125"x1"x3" square aluminum tubing welded to wall structure. Roof, walls and floor are insulated with 3" or greater, single application, low VOC, fire-retardant spray-foam insulation to provide a nominal R-21 insulation value.

Interior Wall and ceiling sheeting



Unibody Framing



Aluminum trailer Frame



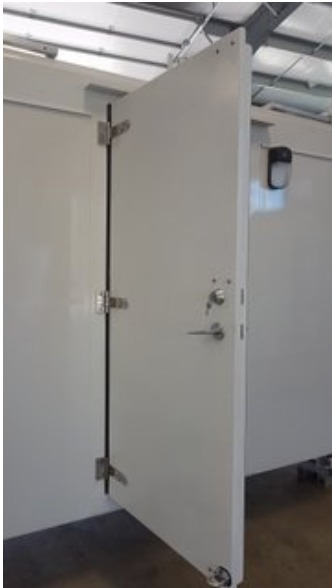
Spray foam Insulation



Roof access pass-through points are welded and supported into the structure of the enclosure frame. 2" Female NPT exterior thread and male interior thread are standard. Alternate sizes are available, as well as box type entry points (Suggested for above rack installations) Placement and size of the entry points are only limited by the roof framing of the structure. Wall pass-through points are typically drilled conduit enclosed, yet can be welded similar to roof point should structure require.

Weld integrated NPT Roof entry Points*Box type Roof Entry Points**Weld-on uni-strut for roof mounting*

Doors and door framing are constructed in a similar fashion to the rest of the shelter. They use a weather seal type mating system for maximum security and environmental integrity. All door hinging hardware is stainless steel. Standard closing hardware on single doors is a lever- handle opener with a long shafted locking deadbolt. Cam-over locking mechanisms can be supplied as required (and are standard on double door systems).

Weather seal exterior Door

Access stairways will be provided for the side **entry** of the enclosure. They will be of aluminum construction and hinge mechanisms will be integrated into the enclosure framing to allow for tilt up storage or removal.

Example Doorway entrance stairway



Integrated into the trailer build are gas cylinder mounting systems and thermostatically controlled pump cabinets.

Example Wall- Mount Cylinder Brackets



Example Pump mounting cabinet with exhaust fan



Roof Deck

The Roof of the enclosure is constructed for heavy snow loads, equipment mounting and regular person access. The roof is arched 1 degree from centre point for positive drainage, the top surface is covered with 4" anti-slip tape with 4" spacing, perpendicular to the normal walking path. Secondary 3/8" rubberized matting can be added to the roof surface. Roof is accessed via a covered ladder. The ladder is mounted onto the enclosure and can be

removed and stowed as required. Uni-strut can be welded into the roof surface for roof top mounting of samplers.

Roof with Railings and Anti-Slip



Folded Railing system for Transport



OSHA railing with Toe Board



Ladder access with cover



Electrical

A robust, stability and versatile electrical system is required for any air quality monitoring system. All of the electrical components used are of premium quality, as every Ambilabs AQMT system is SPE-1000 certified for multi-jurisdictional use. Power distribution is contained in surface mounted $\frac{3}{4}$ " EMT conduit, run to minimize wall interference and enable it to be used as a secondary tubing, or external wiring pathway. Conduit fill is minimized as much as possible during construction to enable additional wiring installations in the future. All primary wiring completed with 12 gauge or larger stranded copper wiring and a limit of 2 receptacles per panel circuit. All lighting completed with 14 gauge stranded wire. LED lighting is used on both interior and exterior fixtures.

Exterior power connection will be of Hubble-type and 50' of 6 gauge SJOOW (Cab-tire) type **extension** cable with appropriate connection ends will be provided, additional power entry housings **types** can be provided.

Example interior Electrical Panel and Distribution



Above Rack Twist Lock Plug



Mast Entry

Hubble-Type Main Power Entry



Trailer Box Entry



Heating & Cooling

HVAC system to be provided will be BARD W12 wall mount unit with Economizer to maintain interior conditions. Economizer option will be factory installed in the unit for best system energy efficiency. Auto-changeover digital thermostat to be mounted at furthest point. Directional ducting to be provided for temperature distribution.

Additional Equipment

Ancillary equipment (wheel chocks, fire extinguishers) will be provided as required. Counter tops will be constructed of aluminum framing with $\frac{3}{4}$ " plywood underneath. Suggested surface is $\frac{1}{8}$ " rubber material for electrical isolation and no slip work surface. Under counter tool boxes will be Rousseau type 4 drawer cabinets located as required. Wall cabinets as specified will be of similar construction as the tool boxes and mounted as per specifications.

Example Counter tops and Toolboxes



2x 31" shock mounted Hammond C-2 type instrument racks with tapped rails, integrated power strip and cable management tray, will be provided with the trailer. The shock mounting system utilizes both a top and bottom of rack dual stage variable mounting system for maximum isolation and stability.

Rack Shock Mounting



Sample Inlet and exhaust manifolds will be provided. Inlet manifold components will utilize borosilicate glass or PTFE components. All applicable connection fittings will utilize Swagelok. Exhaust manifold will be constructed of 2" SCH40 PVC with threaded inlet connections for quick release couplers. Exhaust manifold will pass through the floor or the enclosure to a 2" threaded pipe connection to allow for closure during transport to enable connection of an exhaust extension pipe.

Example Inlet Manifold



Example Exhaust Manifold



For meteorological and at height sensor measurements Ambilabs is proposes to use a customized nesting type tower as they have proven to have long trouble-free operational life cycles. The nesting tower system is custom designed to be fixed mounted to the trailer during transport and be under normal roadway height limits, while still having a 10m measurement height.

Example Trailer Mounted Nesting Towers

