

SOUTH DAKOTA SCIENCE AND TECHNOLOGY AUTHORITY
REQUEST FOR PROPOSAL
RFP 2024-05
GENERAL ARCHITECTURE-ENGINEERING DESIGN/CONSULTATION SERVICES
SANFORD UNDERGROUND RESEARCH FACILITY, LEAD, SD

General Information

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Solicitation Number: 2024-05

Posted Date: March 27, 2024

Questions Due: April 10, 2024

Questions Answered: April 17, 2024

Proposal Due Date: May 3, 2024

Contracting Office Address:

Sanford Underground Research Facility
630 E Summit St
Lead, SD 57754

1. REQUEST FOR PROPOSAL INFORMATION:

This Request for Proposals is for the procurement of Architecture-Engineering (A-E) services in accordance with the South Dakota Science and Technology Authority (SDSTA) guidelines. Firms will be selected for fee negotiation based on demonstrated competence and qualifications for the required work.

- a. A-E services are required for:
Individual task order type design and consultation services contracts which will be negotiated and awarded, each with a base year and three option years. No maximum values of services over the full term of the contract will be established.
- b. During the performance period, the SDSTA Contracting Officer will consider the following factors in deciding which retained consultant will be selected to negotiate an individual task order: performance and quality of deliverables under the current contract, current capacity to accomplish the scope of services in the required time, uniquely specialized experience, and equitable distribution of work among all retained consultants.
- c. This announcement is open to all businesses regardless of size. To be eligible for contract award, a firm must be registered as a business entity with the South Dakota Secretary of State and SAM Registration E-Verify.

2. PROJECT INFORMATION:

Description of design/consultation services that maybe required.

- a. Background: The SDSTA has diverse and expanding requirements to maintain its infrastructure that have resulted in the need for inspections, evaluations, planning, estimating, and designs for various infrastructure projects and support services that go beyond in-house engineering and technical capabilities. To properly maintain the infrastructure and provide efficient, cost-effective

operations, SDSTA seeks to retain A-E consultants for general engineering consulting services in support of these requirements.

- b. Description of Projects: This request for proposal has been developed to obtain A-E services for projects relating to SDSTA’s surface and underground infrastructure and facilities. All work associated with this RFP will be performed through individual task orders to the base contract as the need arises. The type/scope of the projects delivered under each task order will vary depending on SDSTA’s requirements and available resources. As noted below in the Table of Services, these can include initial planning and studies of existing infrastructure, conceptual project design development and cost estimates, and full designs with project plans and specifications ready for bidding with follow-on construction administration support services. While not exclusive, these services will generally support the development and execution of projects funded under the SDSTA Infrastructure Improvement Projects (IIP) Program, which is approved and funded annually by the US Department of Energy. The general size of these projects can range from \$250K up to and beyond \$5M and covers a wide variety of surface and underground systems in support of SURF operations and research programs. Should a discipline or service be required that is not identified in this RFP, an appropriate subconsultant or service may be added to a particular contract with SDSTA’s approval after the contract is awarded.

The following table lists the disciplines/services that SDSTA anticipates may be required over the term of the contracts via specific task orders. An individual A-E firm may not have all the services listed with in-house capabilities. The firm may have working relationships with subconsultants that are proposed under this RFP, or the firm may choose not to submit for a particular discipline/service. The requirement under this solicitation is for the A-E firm to submit for each discipline/service for which they are qualified. A-E firms are not required to submit for every discipline/service listed. Firms will be evaluated on their core capabilities, and the relationship and core capabilities of any proposed subconsultants.

Table of Services	
Discipline / Service	Examples of scopes of work
Master Planning and Infrastructure Project Planning and Conceptualization	Analyze existing SURF facilities and infrastructure conditions/deficiencies and work with SDSTA to develop preliminary project concepts and justifications for agency funding. It is envisioned that during the term of the contract that SDSTA will update the SURF Facilities Master Plan.
Site / Civil Engineering	Site improvements, grading, excavating, pavement rehab, water distribution, sanitary collection, storm drains, road improvements.
Mechanical Engineering	Dewatering and pumping systems, plant layouts, process piping changes.
Heating, Ventilating, Air Conditioning (HVAC) Engineering	Review of installed systems, equipment sizing, HVAC design, reconfiguration, energy conservation and efficiency.
Electrical Engineering	Power generation and distribution, circuit protection, wiring, motor control centers, energy conservation and efficiency, industrial control systems, and arc flash analysis and coordination studies.
Geotechnical Engineering	Both surface and underground assessment of existing geological conditions. May include developing support infrastructure solutions such

	as ground support, slope stability controls, and geotechnical monitoring solutions.
Architectural	Building layout alteration, building envelope repairs/replacement, new facility design or alternation.
Engineering Studies	Infrastructure assessments, reliability studies, and feasibility studies on existing infrastructure and operations and/or requirements to support the infrastructure needs of future on-site research experiments.
Construction Administration	Provide designer related administrative services during construction to include RFI responses, submittal reviews, limited inspections.
Cost Estimating	Third-party cost validation, budget estimates, detailed design and construction cost estimating

- c. Consultant Responsibilities: For each task order awarded, the consultant will provide all services necessary to develop and produce a complete deliverable that satisfies the negotiated scope of work. The consultant shall work with SDSTA Engineering and Operation and Maintenance Department personnel who will indicate system needs and assist in achieving the specific scope of work. The consultant shall carefully consider the input by SDSTA’s staff, but based on the consultant’s own experience and ability, shall be solely responsible to provide a complete and workable deliverable in accordance with the requirements of the scope of work.
- d. SDSTA Responsibilities: SDSTA will, at the consultant’s request, provide information and documentation on file that is pertinent to the task order authorized. This may include plan and profile sheets of existing services, standard drawings, specifications, etc. SDSTA will provide information on the requirements and standards for the project that could include the following:
- Standard format and drafting procedures for construction drawings.
 - Formats for specifications and other documents.
 - SURF specific design standards.
- e. Transfer of Records: All records (project reports, meeting notes, data files, project data, lab reports, test data, design calculations, etc.) generated shall be the property of SDSTA and shall be turned over to SDSTA upon completion of the task order or as directed. All deliverables shall be submitted to SDSTA in hardcopy and electronic (original software and PDF) format. Depending on the size of the electronic deliverables, the consultant may be required to provide and utilize file storage/transfer protocols or portable hard drive(s) for delivery.
- f. Authorization of Task Orders: SDSTA will negotiate the scope of services and the cost basis with the selected consultant prior to the authorization of a task order. The method of payment under this contract shall be based on percent of task completed, up to a negotiated not to exceed amount for each task order.

3. SELECTION CRITERIA:

The selection criteria are listed below in descending order of importance (first by major criterion and then by each sub-criterion).

- a. Specialized experience and technical competence in:
 - The design of infrastructure systems supporting industrial, commercial, and/or underground locations.
 - Utility systems and related controls in a municipal or industrial setting.
 - Industrial and commercial ventilation.
 - Sustainable design using an integrated design approach and emphasizing environmental stewardship.
 - Experience in energy and/or water conservation and efficiency in operation.
 - Producing quality designs based on evaluation of a firm's design quality management program.
- b. Qualified professional personnel in the key disciplines noted above in the Table of Services. The lead engineer in each discipline must be registered to practice in the state of South Dakota in the appropriate professional field in accordance with state law. The evaluation will consider education, certifications, training, registration, overall and relevant experience, and longevity with the firm.
- c. Past performance on SDSTA, US Department of Energy, State of South Dakota, or other similar contracts with respect to cost control, quality of work, and compliance with performance schedules.
- d. Discussion of the firm's capacity to provide and manage potential consultation services. The evaluation will consider the experience of the firm in similar size projects, and the availability of an adequate number of personnel in key disciplines.
- e. Proximity to SURF.
- f. Knowledge of the design of facilities and systems in mountain environments similar to Lead, SD.

4. FINAL SELECTION AND NEGOTIATION:

Based on criteria established above, selected firms will be requested to provide an on-site presentation of the firm's capabilities along with a Q&A session. Firms will be selected for final negotiations of an approved rate structure (See Attachment 1). These rates will be approved by SDSTA in concert with contract award and will become the basis for estimating the value of individual task orders. If SDSTA plans to exercise an option year of services, the consultant will be allowed to submit a rate revision for review and approval prior to exercising the option. Work will typically be issued by negotiated firm-fixed-price, or on a limited basis as time and material type task orders. The process for the award of these task orders will be as follows:

- 1) Establish a mutual understanding and agreed upon scope of work for services required.
- 2) Issue a Request for Proposal and receive a task specific proposal.
- 3) Negotiate an agreed to price for services based on pre-negotiated rates of appropriate disciplines applied to the estimated level of effort.
- 4) Where a time and material type approach are contemplated, a not-to-exceed price will be established.

5. SUBMISSION REQUIREMENTS:

Interested firms having the capabilities to perform these types of services are requested to submit a technical qualifications proposal not later than 2:00 PM (MST) on May 3, 2024. The proposal shall not exceed 50 pages (8.5" x 11") in length and use no smaller than 12 font size.

- a. In general, the technical proposal should seek to provide the following information about the firm:
 - Professional qualifications of the firm and the specific individuals who may be assigned to the work.
 - Specialized experience and technical competence of the firm and individuals in the type of work described in the solicitation.
 - Capacity and capability of the firm to perform the services.
 - Method of approach demonstrating the firm's understanding of this RFP, noted risks and challenges, and strategies that will be employed to complete the task orders on time and budget.
 - Demonstrated success in delivering similar types of services.
 - Description of your company's approach to safety, cost, quality, and schedule control. Include software tools used, and how information is shared with the project team.

- b. Specific Information to be provided:
 - A representative of the consultant that the SDSTA can contact for additional information.
 - Firm (or Branch Office) Name and address.
 - Year established. Enter the year the firm (or branch office, if appropriate) was established under the current name.
 - Ownership. Provide the type of ownership or legal structure of the firm (sole proprietor, partnership, corporation, joint venture, etc.).
 - Number of employees by discipline.
 - Profile of firm's experience. Provide this information for the firm or branch office for which this proposal is prepared. Provide the experience which most accurately reflects the firm's technical capabilities and project experience.
 - The contractual relationship, name, and a brief description of the role of any sub-consultants that will provide discipline specific services beyond the capability of the prime consultant. If a firm has branch offices, indicate each individual branch office that will have a key role on the team. Note that for a named subconsultant, the SDSTA must be notified prior to a change of the subconsultant during the period of performance.
 - Organizational chart of proposed team.
 - Resumes of key personnel proposed for this contract. This should include:
 - Years of experience to include with the present firm, present location, education, current professional registration, and other professional qualifications.
 - Provide examples of projects which illustrate proposed team's qualifications for the type of services called for in this RFP. This should include:
 - Title and location.
 - Period of performance.
 - Project owner and a project point of contact.
 - Discuss the relevance of the example project to this contract.
 - Firms from proposed team involved and their role.
 - Key personnel participation in example projects.

- c. Separate from the technical proposal, the offeror shall include a rate sheet that includes fully burdened hourly rates for all personnel potentially assigned to tasks under this contract. See

Attachment 1 for a format for the rate structure. All applicable burdens and overheads including subcontract burdens shall be included. These rates will NOT be considered as part of the selection process and must be submitted separately from the proposal. Prior to final negotiations with selected firms, an updated rate sheet can be provided if applicable. Awards will be made to the firms determined to be most highly qualified if fair and reasonable prices can be agreed upon.

- d. An A-E service quality control management plan must be prepared and approved by the SDSTA as a condition of contract award but is not required with this submission.

6. POINT OF CONTACT

Questions about this requirement should be sent to Benjamin Brack (bbrack@sanfordlab.org) and Allan Stratman (astratman@sanfordlab.org). Proposal should be submitted in an electronic copy (pdf format) no later than 2:00 P.M. on May 3, 2024, to Benjamin and Allan. Question and answers will be posted as an amendment to this RFP by 2:00 P.M. April 17, 2024.

The proposal period may be extended at the discretion of SDSTA based on the quantity and/or complexity of questions (if any). Any notices of extension of time to respond will be distributed to all prospective offerors by SDSTA.

All communications regarding this solicitation between RFP release and award shall be directed by email to bbrack@sanfordlab.org.

ATTACHMENT 1

Consultant Rate Sheet Template

FIRM			
Contract #			
Date			
Discipline	Prime or Subconsultant	Grade/Name*	Hourly Rate
Firm Principals			\$0.00
Civil Engineering		<i>(Examples may include)</i>	
		Senior/Lead Professional Engineer	\$0.00
		Professional Engineer	\$0.00
		EIT	\$0.00
		Intern	\$0.00
Mechanical Engineering			\$0.00
			\$0.00
			\$0.00
Electrical Engineering			\$0.00
			\$0.00
			\$0.00
Architectural			\$0.00
			\$0.00
Geotechnical Engineering			\$0.00
			\$0.00
			\$0.00
Technical/Admin Support		<i>(Examples may include)</i>	
		Drafting/CAD Technician	\$0.00
		Surveyor	\$0.00
		Administrative	\$0.00
Non-Travel Expenses		Description	
Annual Projected Rate Escalation**			x.x%

*Identify name if the individual is specifically called out in the technical proposal to provide services in this contract.

**For evaluation purposes only. Actual escalation will be negotiated if the option year is exercised.