

**RFP No. SAREP RFP-2023-018 -- Estimation of long-term inertia requirements of Indian power system**

**Questions and Answers**

<b>S.No.</b>	<b>RFP Reference</b>	<b>Description</b>	<b>Query</b>	<b>RTI response</b>
1.	Task 1. Develop inception report  Page no. 6	<ul style="list-style-type: none"> <li>Demonstrate the tool for developing the simulation model and clearly define study boundaries and limitations.</li> </ul>	<ul style="list-style-type: none"> <li>Does the study need to be from the given 4 markets (ENTSO–E, ERCOT, AEMO, NEM), or could cover other markets too?</li> <li>Does it mean to design a use case in PLEXOS and is it acceptable to the client.</li> </ul>	<ul style="list-style-type: none"> <li>Study is intended to estimate long-term inertia requirements of Indian power system however other markets are to be sufficiently covered for proposing the approach and methodology.</li> <li>The bidder must propose the tool(s) as per the study requirements in its proposal. It could be any tool/combination of tools to achieve the study objectives.</li> </ul>
2	Task 2. Literature survey  Page no. 6	<ul style="list-style-type: none"> <li>Analyze the different methods for inertia estimation and monitoring</li> <li>Summarize key challenges and recommendations from the literature survey</li> </ul>	<ul style="list-style-type: none"> <li>Can we have a definite limit of different methods?</li> <li>Can we have a perspective to frame the challenges and recommendations?</li> </ul>	<ul style="list-style-type: none"> <li>The bidder must analyze the different methods against pros and cons and rationalize the proposed method(s) used for inertia estimation.</li> <li>The perspective has to come from the bidder basis existing studies/literature.</li> </ul>
3	Task 3. Data collection and preparation of simulation model  Page no. 6	<ul style="list-style-type: none"> <li>Collect the data with respect to the parameters required for the simulation studies.</li> <li>Validate the data with existing benchmark studies</li> </ul>	<ul style="list-style-type: none"> <li>Can we have the information on the primary clients for the data collection? Whether it has to be collected at the national level from central agencies or from state-level agencies?</li> <li>Whether the data validation has to be done for only 4 markets (ENTSO–E, ERCOT, AEMO, NEM)?</li> </ul>	<ul style="list-style-type: none"> <li>The study has the scope defined for national level. SAREP will only facilitate initial contact with the entities. collection of all the required data for the study will be the sole responsibility of the bidder.</li> <li>Study is intended to estimate long-term inertia requirements of Indian power system, the validation has to done with respect to existing studies in Indian context.</li> </ul>

4	<p>Task 4. Building relevant scenarios</p> <p>Page no. 6</p>	<ul style="list-style-type: none"> <li>• Prepare the scenario assumptions for high RE penetration cases</li> </ul>	<ul style="list-style-type: none"> <li>• What is the horizon for simulation (2030, 2040 or 2050)?</li> <li>• What is the limit of RE capacity for the simulation?</li> </ul>	<ul style="list-style-type: none"> <li>• Near-term (next 5-10 years) and long term (by 2050).</li> <li>• The bidder has to propose the relevant scenarios basis the targets set by the respective entities.</li> </ul>
5	<p>Task 5. Performing the simulation studies and Prepare draft, final reports</p> <p>Page no. 6</p>	<ul style="list-style-type: none"> <li>• Evaluate the various technological options and other interventions (technical, regulatory) to meet the identified inertia requirements</li> <li>• Incorporate the feedback from the stakeholders and prepare a final report</li> </ul>	<ul style="list-style-type: none"> <li>• Which new and/or RE technologies must be considered for this simulation?</li> <li>• Specify the broader categories of stakeholders to be consulted as the primary target group.</li> <li>• What is the extent of considering and incorporating the feedback from the stakeholder consultation? (If any new/additional simulation runs to be included in the final report post this consultation. Since this would need additional effort)</li> </ul>	<ul style="list-style-type: none"> <li>• Technologies and other interventions that can provide inertia support to system may be recommended after estimating the inertia requirements.</li> <li>• Broader category includes stakeholders such as MoP, MNRE, GRID-India, CEA, CERC and similar entities at regional/state level</li> <li>• The proposed scenarios has to factor in the possible broader coverage and are agreed upon through sign-off, however additional scenarios may be simulated if need arises.</li> </ul>
6	<p>Task 6. Conduct dissemination workshop and capacity building workshop</p> <p>Page no. 7</p>	<ul style="list-style-type: none"> <li>• Participate in the dissemination workshop and present the study</li> <li>• Conduct two handholding capacity-building workshops for system operators, planners and other stakeholders to use the</li> </ul>	<ul style="list-style-type: none"> <li>• Does it mean it only includes participation and not organization of the workshop?</li> <li>• If the workshops are to be organized, who will bear the cost of the venue, meals, and other expenses?</li> <li>• Does handholding mean demonstration also?</li> </ul>	<ul style="list-style-type: none"> <li>• SAREP will organize the workshops however the PPTs and summary reports and other content has to be prepared by Bidder</li> <li>• The handholding capacity building workshops including step-by-step modelling and demonstration on the simulation tool is to be facilitated by the bidder.</li> </ul>

		simulation model employed in the study for further analysis and estimation [covering 50-75 participants]	<ul style="list-style-type: none"> <li>This appears to be training workshops. Whether it would be conducted in-person or virtual or hybrid?</li> <li>If in-person, are these workshops to be in New Delhi or any other location?</li> </ul>	<ul style="list-style-type: none"> <li>The location would primarily be Delhi in hybrid-mode.</li> </ul>
7			<ul style="list-style-type: none"> <li>The order shall be placed by RTI USA or RTI India?</li> <li>If the order is to be placed by RTI USA will this work order come under US Federal Contract for a project being carried out in India?</li> <li>If the order is to be placed by RTI India will it still come under US Federal Contract?</li> </ul>	The subcontract shall be awarded by Research Triangle Institute (RTI) USA. This will be a subcontract under a US Federal Contract awarded to RTI USA.
8	Attachment C	Article 19C	This RFP doesn't look like a PHS funded project. Will this clause still be applicable?	Articles 19 on Conflict of Interest is applicable to the subcontractor
9	Attachment C	Article 41	Survivability: This clause has no time limit. We have insurance mentioned in this clause and how do we keep it open ended.	Please refer to Articles 32.B of the RFP Attachment C. It states that "The required levels of insurance coverage for work performed outside of the United States by non-U.S. vendors <b>shall be based on the customary insurance practices in the country of the vendor and the country where the work is being performed.</b> "

				The inference is that the customary insurance practices also specifies the term of such insurances.
10	Attachment C	Article 45	HIPAA Business Associate Training Addendum: Will this be applicable for this project?	This is applicable only to subcontracts that provides products and/or services to healthcare providers, health insurance providers, employer group health plans, or other business associates. It is not applicable for the SAREP project
11	Attachment C	Article 49	Employment Eligibility Verification: Are the requirement applicable for this project being carried out in India by an Indian company along with its parent organization based in Sweden?	<ul style="list-style-type: none"> <li>• This clause is applicable to contracts and subcontracts where work is to be performed in the United States.</li> <li>• Refer to Page 1 of the RFP on Eligibility Criteria. Non-US firms are eligible to bid, if they belong to a Geographic Code 937 country in accordance with USAID ADS 310. Geographic code 937 is defined as the United States, the cooperating country/recipient country (India in this case), and developing countries other than advanced developing countries, and excluding prohibited sources. For more information on this, you can refer to <a href="https://www.usaid.gov/sites/default/files/2022-12/310.pdf">https://www.usaid.gov/sites/default/files/2022-12/310.pdf</a>.</li> </ul> <p>Note that the above eligibility requirement flows down to lower tier subcontracts as well. <b>Hence, a bidder may not enter into a subcontracting arrangement with their parent firm from Sweden which is a non-</b></p>

				<b>Geo Code 937 compliant country. However, the non-Geo Code compliant entity's staff are always welcome to participate but only as consultants hired through a geo code compliant bidder/firm</b>
12	Attachment C	Article 50	Service Contract Reporting Requirements: Will this be valid for this contract?	Reporting is required no later than October 15 of each year and is applicable to all Firm Fixed Price subcontracts awarded with an estimated total value of \$500,000 or greater. If your total price bid including taxes is lower than this amount and your bid is selected for award, this clause will not be applicable.