

Assam Power Distribution Company Limited (APDCL)



Invites

Expression of Interest (EoI)

From **Prospective Bidders**

For

Setting Up Solar Power Plant with Battery Energy Storage System (BESS) with an objective of 100% Solarization at Assam Secretariat Buildings (Janata Bhawan), Dispur, Assam

EoI No. APDCL/CGM (NRE)/NRE-37/Pt-I/2021-22 /231 Dated: 09/01/2024

ISSUED BY:

Chief General Manager (NRE)
Assam Power Distribution Company Limited (APDCL)
Bijulee Bhawan (Annex Building),
Paltanbazar, Guwahati-1
Assam

E-mail: cgm.nre@apdcl.org



DOCUMENTS OF EOI

This EOI document comprises the following sections:

- (i) Section I: EoI Information
- (ii) Section II: Introduction
- (iii) Section III: Instructions to the Applicants
- (iv) Section IV: Consideration of Response
- (v) Section V: Application Form and Annexures



Section – I EoI Information



DETAILED NOTICE INVITING EXPRESSION OF INTEREST (EoI)

EoI No.: APDCL/CGM(NRE)/NRE-37/Pt-I/2021-22 /231 Dated: 09/01/2024

APDCL invites an Expression of Interest from Prospective Bidders for setting up Solar Power Plant with Battery Energy Storage System (BESS) with an objective of 100% Solarization at Assam Secretariat Buildings, Dispur in Assam.

1. Assam Power Distribution Company Limited (APDCL) intends to set up a Solar Power Plant with Grid-Scale Battery Energy Storage System (BESS) for 100% Solarization of Assam Secretariat Buildings, Dispur in Assam for which APDCL invites Expression of Interest (EoI) from Prospective Bidders (hereinafter called APPLICANT).

Note: This EoI is to assess feasibility to explore various project modalities as well as commercialization prospects of Setting up Solar Power Plant with Grid – Scale Battery Energy Storage System (BESS) for 100% Solarization of Assam Secretariat Buildings, Dispur in Assam. This EoI is to assess the feasibility for setting up of Solar Power Plant and Grid-Scale Battery Energy Storage System (BESS) within or outside the premises of Assam Secretariat (Janata Bhawan). After identification and selection of the APPLICANTs through EoI, Request for Proposals (RfP) for implementation of the project(s) at proposed location shall be invited separately for setting up the facilities. The detailed RfP shall be addressed / communicated to the shortlisted APPLICANTs.

2. DOWNLOAD AND TIMELINES FOR SUBMISSION OF EoI

a. Interested APPLICANTs may download the documents of EoI free of cost from www.apdcl.org.

b. Date of Publication of EoI : 09/01/2024 at 15:00 Hrs.

c. Date of Site Visit (Mandatory) : 19/01/2024 (11:00 Hrs to 16:00 Hrs)

d. Pre-Bid meeting : 22/01/2024 at 13:00 Hrs.
e. Last date for submission of EoI : 30/01/2024 up to 17:00 Hrs.
f. Date of opening of EoI responses : 31/01/2024 at 11:00 Hrs.

3. APDCL encourages submission of filled-in EoI in scanned soft copy duly sealed and signed in the letter head of the applicant. For consideration of EoI, APPLICANTs are required to email softcopy of EoI, completed in all respects, through email mentioned hereunder. If APPLICANTs also wish to submit hard copy of the EoI, the same can be submitted within the last date of submission to the following address: -

Address for submission of EoI in soft	cgm.nre@apdcl.org
copy	
(Duly signed supporting documents)	
Address for hard copy submission of EoI	Chief General Manager (NRE)
	Assam Power Distribution Company Limited
	Bijulee Bhawan (Annex. Building), Paltanbazar,
	Guwahati-01

4. APDCL reserves the right to reject or accept any or all applications, cancel/withdraw the EoI process without assigning any reason whatsoever and in such case, APPLICANT shall not have any claim arising out of such action. APDCL bears no responsibility or liability of any kind in reference to the EoI.



Important note:

1. Prospective Bidders / APPLICANTs are requested to remain updated for any or all notices, amendments, corrigendum, clarifications etc. to the EoI published through the official website of APDCL www.apdcl.org. No separate notifications shall be issued for such notices, amendments, corrigendum, clarifications etc. in the print media or individually to the prospective Bidders and in no case APDCL shall be held responsible for any loss of information to the Bidders.

-S/d-Chief General Manager (NRE)

APDCL, Bijulee Bhawan (Annex Building), Paltanbazar, Guwahati-1

Memo No.: APDCL/CGM(NRE)/NRE-37/Pt-I/2021-22 /231 Dated: 09/01/2024 Copy to: -

- 1. **P.S. to the Managing Director**, APDCL, Bijulee Bhawan, Paltanbazar, Guwahati-1, for kind apprisal of the Managing Director.
- 2. Official Website of APDCL.

-S/dChief General Manager (NRE)
DCL Rijulae Rhawan (Anney Rujidi)

APDCL, Bijulee Bhawan (Annex Building), Paltanbazar, Guwahati-1



Section - II Introduction



1. Introduction

Assam Power Distribution Company Limited (APDCL) is a Public Limited Company wholly owned by the Government of Assam. The primary purpose of the Company is to undertake distribution, trading, and supply of electricity in the state of Assam. APDCL is currently serving more than 66 Lakh consumers with total of 510 distribution substation and has transmission length of 4.5 Lakh Km of cumulative HT & LT lines.

APDCL intends to set up Solar Power Plant with Battery Energy Storage System (BESS) with an objective of 100% Solarization of Assam Secretariat Buildings (Janata Bhawan), Dispur in Assam within or outside the premises of Secretariat Complex.

The entire solar power project shall be implemented either in Engineering Procurement and Construction (Contractor) mode or Build-Own-Operate (BOO) mode based on the outcome and suggestions of this EoI.

2. Intent of the Expression of Interest (EoI)

- (i) The purpose of inviting this EOI is to solicit proposals from interested and experienced RE developers who can provide suggestion and best technically, financially & commercially viable business model of Solar Power Plant with Grid–Scale Battery Energy Storage System (BESS) for 100% Solarization of Assam Secretariat Buildings, Dispur, in Assam. The installation of the proposed system can also be explored within or outside the premises of Secretariat Complex.
- (ii) APDCL invites experienced companies to participate in the project "Setting up of Solar Power Plant with Grid-Scale Battery Energy Storage System (BESS) for 100% Solarization of Assam Secretariat Buildings, Dispur, in Assam".
- (iii) This EoI includes site survey, possibility to explore various business models, the development of specification, estimate total capacity of solar power plant to be installed, battery capacity etc.
- (iv) This Expression of Interest is for APDCL to engage with prospective bidder who have supplied or have comparable potential options available for Solar PV Technology with Grid -Scale BESS that can confirm the viability of its capital and operational costs over the lifetime with several selected services, operational profiles and dispatch schedules. The EOI respondents may also suggest steps for finding an optimal location for BESS placement based on their experience.
- (v) APDCL is looking for complete end to end solution from eligible APPLICANTs for Solar PV Technology with Grid-Scale BESS facility including location of storage plant, location of solar power plant, power conversion system, balance of plant, battery management system including software solution for optimized operation of BESS. APPLICANT shall meet the following eligibility criteria:

Eligibility Criteria:

Sl. No.	List of attributes	Requirement
1	Technical	Grid Connected Solar PV projects undertaken in the
	experience	past 5 years with cumulative capacity of at least 5
	implementation and	MW in which the applicant has been executed in any



	operation	of the following mode:
		AND Grid - Scale Battery Energy Storage System (BESS) undertaken in the past 5 years with cumulative capacity of at least 5 MWh in which the applicant has been executed in any of the following mode: • Engineering, Procurement, Construction (EPC) contractor • Operations & Management (O&M) contractor • Independent power producer (i.e. equity sponsor with operational control of the asset)
		Evidence of previous experience in similar projects over the last five (5) years.
2	Establishment of company	Company or companies that form a consortium established and operating for at least 5 years.
3	Financial	Audited financial statements of the applicant for the three most recent financial years.

- (vi) Based on the response and outcome in the EoI, APDCL may address the detailed RfP in the shortlisted APPLICANTs / may not proceed at this stage.
- (vii) The response(s) received in the EoI will be utilized by APDCL for
 - a) Finalization of total capacity of solar PV power plant to be required for 100% solarization of Assam Secretariat Buildings, Finalization of Capacity of battery bank required for providing 4-5 hours power supply during evening, Finalization of Solar PV power plant to be installed within the premises of Secretariat Complex, Identification of various business model required (like Rooftop solar, captive solar, solar power plant under open access etc.)
 - b) Finalization of best possible option of Solar PV with Grid-Scale BESS for commercial returns
 - c) Finalization of estimated project cost
 - d) Formulation of specifications for various systems required for execution of the project.
 - e) Finalization of shortlisted APPLICANTS shall be eligible to participate detailed RfP to be floated by APDCL

3. Scope of Works

The scope of works under this EoI includes the following:

a) Estimate total capacity of solar power plant & BESS capacity (backup power up to 4 hours) required for 100% solarization based on the load pattern of the buildings.



b) Site survey and establish technical feasibility:

- There is a mandatory site inspection for interested bidders to familiarize themselves with the building and requirements.
- Based on the site visit and available space, the bidder shall have to establish the total capacity of Solar Power Plant can be installed within the premises of the Secretariat Complex and balance capacity if required can be installed other location(s) by exploring various possible business model.
- The bidder shall also have to establish the total BESS capacity keeping the provision to supply power up to 4 hours during evening. The BESS can be charged through conventional grid power or Solar power.
- Possibilities and challenges of Grid integration of BESS within the premises of Secretariat Complex

c) Explore various business model:

- Explore various business modalities for installation of Solar Power Plant with BESS based on the availability of vacant areas within the premises of the Secretariat Complex to fulfil the target of 100% Solarization of Secretariat Complex.
- The modalities for implementation of the project on CAPEX model (Rooftop Solar / Captive Solar / Solar plant under Open Access)

d) Battery Energy Storage Solutions Cost Benefit Analysis:

- Type of Battery technology
- Cost of various type of battery technology
- Technical specification of BESS
- Capacity of BESS required in MW and MWh

e) Estimate cost of the project for various business modalities etc.

- Estimate total cost of the project as format prescribed in this EoI.



Section - III

Instructions to the Applicants



1. The Applicant should note that:

- a. Language of the responses to EoI or any query/clarifications/correspondences shall be in English only.
- b. For expression of interest, the Application Form and Annexures given in Section-V shall be duly filled out and sent to APDCL by the APPLICANT in soft copy.
- c. Applicants should go through Section-I and Section-II thoroughly before filling and submitting the application form and annexures in Section-V.
- d. The application shall mention the name and contact details of two persons, with complete address, phone number and email id.
- e. APDCL may, at its sole discretion, ask for additional information/ documents and/ or seek clarifications from the Applicant(s) after the Deadline for submission of response, inter alia, for the purpose of removal of inconsistencies or infirmities in their responses.

2. Site Inspection:

- There is a mandatory site inspection for interested bidders to familiarize themselves with the building and requirements.
- All Bidders are invited to visit the site on the date, time and place as mentioned in clause no. 2 under Section-1 of this EoI.
- All Bidders may nominate up to two (2) authorized representatives for site visit inspection, by confirming their participation at least three (3) days prior to the site visit. Such confirmation shall be sent by e-mail to cgm.nre@apdcl.org
- After site visit inspection, all the all the Bidders will be free to seek clarifications and make suggestions to APDCL.
- Non-attendance at the site visit inspection shall be a cause for disqualification of any Bidder from participating in the EoI Process.

3. Enquiries and Clarifications

Any clarifications on the EoI may be sought to the following via e-mail:

To: cgm.nre@apdcl.org

APDCL shall make reasonable efforts to respond to the queries or requests for clarifications, on a non-attributed basis at the earliest. However, APDCL reserves the right not to respond to any query or provide any clarification, at its sole discretion.

APDCL may, at its own, if deemed necessary, issue clarifications to all the Bidders. Verbal clarifications and information given by APDCL or any other Person for or on its behalf shall not in any way or manner be binding on APDCL.

4. Pre-Bid Meeting

• After site visit inspection, all Bidders are invited to attend the Pre-Bid meeting on the date, time and place as mentioned in clause no. 2 under Section -1 of this EoI. The purpose of the Pre-Bid meeting will be to clarify issues and answer questions on any matter relating to the EoI Document, the EoI Process and the Project.



• Non-attendance at the Pre-Bid meeting shall not be a cause for disqualification of any Bidder from participating in the EoI Process.

5. Corrigendum

At any time before the last date of submission of EoI, APDCL may, for any reason, whether at its own initiative or in response to a clarification requested by an Applicant, modify the EoI document. The amendment will be posted on the website and will be binding on the Applicants and the Applicant will give due consideration to the same, while they submit their EoI, and would invariably enclose documents/ information, as required, on account of the amendment, as a part of the EoI. APDCL may, at its discretion, extend the deadline for the submission of EoI.

6. Preparation of response to EoI

The application of EoI consists of the following:

- Annexure-2, Annexure-3 & Annexure-4 of Section V
- 7. Validity of the response

The Applicant shall submit the responses which shall remain valid up to six (06) months after the response Deadline ("Response Validity"). APDCL reserves the right to reject any response which does not meet the aforementioned validity requirement.

APDCL may solicit the Applicant's consent for an extension of the period of validity of the response. The request and the response in this regard shall be in writing/through e-mail. In the event, any Applicant refuses to extend its response validity as requested by APDCL, APDCL shall terminate processing of such Applicant's responses. An Applicant accepting APDCL request for validity extension shall not be permitted to modify its response.

8. Submission of the response to EoI

The responses to the EoI are to be submitted as soft scanned copy duly sealed and signed through e-mail in the following format:

To: cgm.nre@apdcl.org

Ref. EoI No. Dated

> Envelope: Original / Copy # ___ Due date of Opening: _____

Submitted to:

The Chief General Manager (NRE) Assam Power Distribution Company Limited (APDCL) Bijulee Bhawan, Annex Building, 2nd Floor Paltanbazar, Guwahati -01

Submitted by:

Name, address & contact no. of the Applicant

All the pages of the response should be duly stamped and signed by the authorized signatory in whose favour the Power of Attorney is issued.



The responses to the EoI should be submitted within the Deadline at the address provided in the Section-I of this EoI.

9. Opening of response to the EoI

The responses to the EoI shall be opened as per the time schedule 17:00 HRS at date as mentioned in Section-I and will be communicated to the Applicants via e-mail.

In the event of any of the above dates falling on a day which is not a working day or which is a public holiday, the responses shall be opened on the next working day at the same venue and time.

10. Cost and Expanses towards response to EoI

The Applicants shall be responsible for all the costs associated with the preparation of the response and participation in discussions and finalization & execution of the documents related with this EoI, APDCL shall not be responsible in any way for such costs, regardless of the conduct or outcome of this short-listing/ selection process.

11. Confidentiality

The Applicants undertake to hold in confidence this EoI and any document related or pursuant to this EoI and not to disclose the terms and conditions of the transaction contemplated hereby to third parties, except:

- a) To their professional advisors;
- b) To their officers, contractors, employees, agents or representatives, financiers, who need to have access to such information for the proper performance of their activities;
- c) Disclosures required under applicable Law, without the prior written consent of the other parties of the concerned agreements.

Provided that the Applicant(s) agrees and acknowledges that APDCL may at any time, disclose the terms and conditions of this EoI and any document related or pursuant to this EoI to any person, to the extent stipulated under the applicable Law.

12. Disclaimer

- (a) This Expression of Interest (EoI) has been prepared by APDCL for response from the prospective bidders for setting up of Solar Power Plant with Grid Scale Battery Energy Storage System (BESS) for 100% Solarization of Assam Secretariat Buildings, Dispur, in Assam.
- (b) Installation of Solar Power Plant with Grid Scale BESS shall be subject to requisite approval from State Government. APDCL shall process these approvals, after receiving the desired response for EoI.
- (c) In submitting an expressed EoI in response to the EoI, the Applicants certify that it understands, accepts and agrees to the disclaimers on this page. Nothing contained in any other provision of the EoI nor any statements made orally or in writing by any person or party shall have the effect of negating or superseding any of the disclaimers set forth herewith.



Section-IV Consideration of Response



RESPONSIVENESS/EVALUATION METHODOLOGY

1. Responsiveness check

The responses submitted by Applicants shall be scrutinized to establish interest in setting up of Solar Power Plant with Grid – Scale Battery Energy Storage System (BESS) for 100% Solarization of Assam Secretariat Buildings, Dispur, in Assam. Responses shall deem non – responsive for following reasons:

- a) Responses that are incomplete, i.e. not accompanied by any of the applicable formats inter alia covering letter, power of attorney, applicable undertakings, provided in more details at annexure in Section-V.
- b) Responses not accompanied by Essential Information as prescribed in Annexure 4 in Section-V.
- c) Responses not signed by authorized signatory and / or stamped in the manner indicated in this EoI.
- d) Material inconsistencies in the information/ documents submitted by the Applicant.
- e) An Applicant submitting more than one response to this EoI either itself or through an affiliate or subsidiary company.
- f) Response validity being less than that required as per Clause 5 of section-III of this EoI.
- g) Response being conditional in nature.
- h) Response not received by the response Deadline.
- i) Response having Conflict of Interest.
- j) Applicant delaying in submission of additional information or clarifications sought by APDCL, as applicable.
- k) Applicant submit EoI without visiting / inspecting the site.

All bids that shall meet the responsive check requirements set out above in this section of the EoI document shall be considered as responsive. In case of non-submission of relevant details as above, the responses may be considered as "**non-responsive**", at the sole discretion of APDCL and will not be considered further.



Section-V Application Form & Annexures



Annexure - 1

FORMAT FOR COVERING LETTER CUM UNDERTAKING

(The covering letter should be on the Letter Head of the Applicant)

Da	ıte: _		
Pla	ace: _		
То),		
		The Chief General Manager (NRE) Assam Power Distribution Company Limited (APDCL) Bijulee Bhawan, Annex Building, 2 nd Floor, Paltanbazar, Guwahati-01 Email: cgm.nre@apdcl.org	
Su	ıb.:	(INVITATION FOR EXPRESSION OF INTEREST)	
Re	ef.:	EoI No, dated (the "EoI")	
De	ear Si	ir,	
		ne undersigned [insert name of the "Applicant"] having read, examined, and stood in detail the (INVITATION FOR EXPRESSION OF INTEREST).	
Со	mpa	onfirm that neither we nor any of our Parent Company/ Affiliate/ Ultimate Paren any has submitted response other than this response directly or indirectly in response to presaid EoI.	
1.	our	We give our unconditional acceptance to the EoI, issued by APDCL, as amended. In token of our acceptance to the EoI, the same have been signed & stamped by us and enclosed to the esponse. We hereby confirm that the provisions of the EoI shall be binding on us.	
2.		have submitted our response strictly as per the provisions and formats of the Eol hout any deviations, conditions and without mentioning any assumptions or notes.	
3.	APE here are	hereby unconditionally and irrevocably agree and accept that the decision made by DCL in respect of any matter regarding or arising out of the EoI shall be binding on us. We eby expressly waive any and all claims in respect of EoI process. We confirm that there no litigations or disputes against us, which materially affect our ability to participate of ction under the obligations with regard to EoI.	
4.	Deta	ails of the contact person are furnished as below:	
	Nan	ne:	
	Desi	ignation:	
	Add	lress:	
	Con	tact Number:	
	Ema	ail:	
5.		are enclosing herewith the entire response containing duly signed formats in electronic nat sent via email to: cgm.nre@apdcl.org as per the EoI for consideration.	



Expression of Interest for Setting up of Solar Power Plant with BESS technology for 100% Solarization at Assam Secretariat Buildings, Dispur in the State of Assam

- 6. It is confirmed that our response is consistent with all the requirements of submission as stated in the EoI and subsequent communications from APDCL, if any.
- 7. The information submitted in our response is complete, strictly as per the requirements stipulated in the EoI and is correct to the best of our knowledge and understanding. We would be solely responsible for any errors or omissions in our response.
- 8. We confirm that all the terms and conditions of our response are valid for acceptance for a period of six (06) months from the response Deadline.
- 9. We confirm that we have not taken any deviation so as to be deemed "**non-responsive**" as stipulated in Section-IV of this EoI.
- 10. We understand that you are not bound to accept any response you receive.

We remain,

Yours sincerely

(Name, Designation and Signature of Authorized Person in whose name Power of Attorney is issued)



Annexure - 2

INFORMATION TO BE SUBMITTED BY APPLICANT

(Note: Documents in support of meeting the respective requirement shall be sub mitted by the Applicant.)

- 1. Name of Company / Lead partner of the consortium:
 - (Enclose copy of certificate of incorporation, GST certificate, PAN card etc.)
- 2. Legal status of the Company/Consortium [EPC / O&M Contractor / IPP (Developer)]:
- 3. Brief description of the Company/Consortium including details of its business groups/subsidiaries/ affiliates:
- 4. Existing Manufacturing facilities Locations, Capacity:
- 5. Date of Incorporation:
- 6. Date of Commencement of Business:
- 7. Full address including Telephone nos. / Fax nos.:
 - a) Registered Office:
 - b) Head Office:
 - c) Address for Communication:
 - d) Contact Details:
 - e) Office Address in India, if any:
- 8. Documents to be enclosed:

Technical Credentials -

- a) Signed copy of Contract Agreement / LOA, Taking-Over Certificate, Contract Completion Certificate or Performance Certificate in sufficient detail to verify the contract name, value and completion time to fulfil the technical eligibility criteria mentioned in clause no. 2(v) of Section -II.
- b) Relevant Product/System catalogues, Experience /Reference List, Copies of Customer Certificates, Engineering strengths, collaborations/tie-ups with manufacturer (if applicable), quality accreditations, etc.

Financial Credentials – Copies of Audited Financial statements for last 3 years duly certified by the registered chartered accountant.

9. Any other documents considered relevant.

(Sign & Company Seal)

Authorized signatory



Annexure - 3

INFORMATION TO BE SUBMITTED BY APPLICANT

A. Project Design Information

Sl. No	Particulars	
A	Estimate Capacity of Solar Power Plant and BESS capacity	
1	Capacity of Solar Power Plant required for 100% Solarization of Secretariat Buildings, Dispur, Assam based on the electricity consumption scenario	Enclose detailed design report clearly indicate the total capacity of solar power plant required for 100% Solarization
2	Capacity of BESS required for providing 4-5 hours power during evening	Enclose complete design report including technical specification of BESS
3	Capacity of Solar Power Plant (kW) to be installed within the premises of the Secretariat Complex based on the available vacant land / rooftop space of the premises	Enclose detailed design report along with site visit inspection report and technical specification of various components of solar power plants
В	Technically Feasible System Configuration for achieving 100% Solarization with battery backup of 4 -5 hours	Enclose detailed design report with proper justification
С	Proposed & Analysis and assessment of business model required for 100% solarization.	

B. Technical Datasheet (BESS)

Characteristics	Details	Remark
Rated Power capacity of BESS supplied (MW and		
MWh)		
Round Trip Efficiency (AC-AC) %		
Auxiliary Consumption (%)		
Space Required (m2/MWh)		
Depth of Discharge (DoD) overall useful life (%)		
Response Time (ms-hr)		
Cycle Life (Nos. of Charge / Discharge)		
Daily Self Discharge (%)		
Yearly Degradation (%)		
Annual Availability (%)		
Annual Down time (%)		
Codes & Standards Compliance (UL / IEC / BIS) – Cell,		
Module, BMS, Inverter, system		
Fire Safety Code and Standard Compliance		
EMC communication protocols compliance		
Technology of BESS proposed to be set-up		
Strategy for battery waste management		



C. Budgetary Cost

- Estimated total cost of proposed capacity of project (with cost breakup) of all cost components as listed below along with scope of supply, erection and commissioning of the plant –
 - Solar Power Plant and associated equipment
 - BESS system and associated equipment
 - Civil / Structure
 - Control System
 - Miscellaneous Items
 - Safety and protection systems
 - Existing Electrical infrastructure augmentation (if applicable)
- 2. Erection, testing and commissioning of the plant
- 3. Estimated Annual Operation and Maintenance Cost for all 5 years

Note: Applicant shall separately mentioned taxes, duties, freight, insurance applicable for above items / project.