

Request for Expression of Interest (EOI)

Subject: Request for Expression of Interest (EOI) from Central Design Organizations of the States (CDSOs) for evaluation of DPRs related to Civil Design aspects of Hydro-Electric Projects and Pumped Storage Project (PSPs) for CEA

1. Preamble:

The **Central Electricity Authority (CEA)** is a statutory organization functioning under the **Ministry of Power, Government of India**. It plays a pivotal role in the development and regulation of the electricity sector in India. Established under the provisions of the **Electricity (Supply) Act, 1948**, and now governed by the **Electricity Act, 2003**, the CEA serves as the apex technical authority in the power sector. The CEA is responsible for planning, policy formulation, and technical evaluation to ensure the efficient and sustainable development of the electricity sector. Its major functions include **Advisory Role, Electricity Planning, Regulation and Standards, Data Collection and Analysis, Monitoring and Evaluation and Research and Development**

As per Section 8 (1) of the Electricity Act, 2003, any generating company intending to set up a hydro generating station shall prepare and submit to the Central Electricity Authority for its concurrence, a scheme estimated to involve a capital expenditure exceeding such sum (presently, ₹2500/- Crores), as may be fixed by the Central Government, from time to time, by notification for

- a. Projects included in NEP and confirm to capacity and types and
- b. Site has been allocated through the transparent process of bidding in accordance with the guidelines issued by Central Government.

OR

Rs.1000/- crore for any other scheme not covered under (a) & (b).

Presently, the Detailed Project Reports (DPRs) for Hydro-Electric projects (HEPs) and Pumped Storage Projects (PSPs) are prepared through consultation procedure with the appraising agencies like CEA, CWC, GSI and CSMRS and the developer is required to submit following chapters for examination by these appraising agencies:

S. No.	Aspects
1.	General Layout
2.	Hydrological Aspects (design flood)

3.	Power Potential Aspects
4.	Foundation Engineering and Seismic Aspects
5.	Geological aspects
6.	Construction material aspects
7.	Inter-state matters (if required)
8.	Transmission System (up to Pooling point)
9.	Dam/Barrage Design
10.	Gates / HM Design
11.	Hydel Civil Design
12.	E&M Design
13.	Cost and financial analysis (if desired by developer)

Guidelines for Formulation of Detailed Project Reports for Hydro Electric Schemes (August 2022) and Guidelines for Formulation of Detailed Project Reports for Pumped Storage Schemes (July 2024) can be accessed on the CEA website for detailed procedure.

2. **Objective**

Now, the Central Electricity Authority (CEA) intends to evaluate these Chapters of DPRs for HEPs and PSPs through the Central Design Organizations of the States (CDSOs).

CDSOs will evaluate certain chapters of DPRs and ensure the design and safety aspects of HEPs and PSPs. The CEA shall concur DPRs of these HEPs and PSPs based on evaluation done by CDSOs.

The objective of this assignment is to:

- Get the chapters of DPR submitted by developers evaluated by CDSOs.
- Cut short the time taken in evaluation /appraisal of chapters so as to expedite concurrence of DPR in a time bound manner.
- Timely concurrence of DPRs shall help in timely commissioning the Projects in an accelerated mode and achieve the target of Energy Transition earlier than targeted schedule.

3. **Scope of work**

- i. To evaluate the chapters submitted by developers, forwarded/recommended by CEA in compliance with set procedure and standards.
- ii. To offer comments on documents submitted by developer. Seek additional information, if required to be submitted by developers.
- iii. Finally recommend for approval of documents along with executive summary to CEA.
- iv. To attend meetings with developer / CEA as when required.

- v. Keep record for future reference and share as when required.

Applications are invited for Expression of Interest (Eoi) from CDSOs that possess the expertise and capability to evaluate proposals for preparation of DPRs of HEPs/PSPs under the Survey & Investigation stage. Eligible CDSOs should demonstrate substantial experience in evaluating HEPs/PSPs, specifically in areas such as Hydel civil design (e.g., water conductor systems, powerhouses) and dam design.

Interested CDSOs are requested to submit their Expression of Interest (Eoi) to the CEA in the prescribed format enclosed at **Annex-A**.

4. **Understanding & Familiarization**

Understanding and Familiarization with but not limited to various Indian Standards associated with general Civil Engineering, Dam Design (Conventional Concrete Dams, Earthen Dams, Rockfill Dams, Concrete faced Rockfill Dams (CFRD), GFRDs, Roller Compacted Concrete Dams), Design of Plastic Concrete, Design of cutoff wall, Jet grouting, Water Conductor System (including Head Race Tunnels, Tail Race Tunnels, Surge Shafts), Valve house, Powerhouse (Surface and Underground), Dam Safety Act 2021, USBR guidelines, ICOLD recommendations, Policies, Regulations, and practices of Ministry of Jalshakti and Central Water Commission available in Public domain is critical for the successful delivery of the Consultancy assignment. CDSOs are therefore required to explore and study all possible documents that are relevant for the assignment and develop strong understanding and be familiar with the same.

5. **Deliverables**

The CDSOs shall furnish following reports inter-alia covering all the aspects as detailed herein below:

- i. Initial Chapter submitted by developer: Detailed report on Chapter submitted by developer and sent by CEA. Comments and additional information required to be submitted by developer within 21 days of submission through email by CEA.
- ii. Comments of CDSOs may be shared with CEA and developer. The developer shall submit the requisite document within 15 days to CEA and CDSOs. CDSO shall examine and approve the proposal within 30 days after mandatory site visit. If required a meeting may be arranged with developer to sort out any unresolved issues. If developer is not submitting the information, the same may be brought in the knowledge of CEA.
- iii. Executive summary and detailed report may be submitted by CDSOs. The CDSOs may include a para on global practices in Hydro power sector specially in Hydro rich countries like Brazil, China, USA and Nordic area.

- iv. If required, CDSOs shall discuss with CEA for clarification on any issue.
- v. The above scope of work assignment broadly covers all the aspects, however, any item not specifically mentioned but required to complete the assignment shall be deemed to have been included in the scope of Work.

6. **Milestone/Time schedule**

The intent is to complete the process within 90 days. Any delays beyond control may be duly justified in writing.

7. **Procedure of application:**

Accordingly, applications are invited CDSOs. The willing CDSOs may email their applications **latest by 15.10.2025** to:-

Shri Balwan Kumar, Director (HPP&I)
Room No. 721 (N), CEA, Sewa Bhawan, RK Puram,
New Delhi-110066
Email: cea-hppi@gov.in
Contact: 01126732748

8. **Term of Empanelment**

The term of empanelment shall be as per the mutual agreement between CEA and developers.

9. **Fee**

The payment terms for CDSOs, as per the empanelment, will be decided by mutual agreement.

10. **Qualification and Experience**

CDSO must have relevant experience of carrying out civil like general Civil Engineering, Dam Design (Conventional Concrete Dams, Earthen Dams, Rockfill Dams, Concrete faced Rockfill Dams (CFRD), GFRDs, Roller Compacted Concrete Dams), Design of Plastic Concrete, Design of cutoff wall, Jet grouting, Water Conductor System (including Head Race Tunnels, Tail Race Tunnels, Surge Shafts), Valve house, Powerhouse (Surface and Underground), and HM works etc. in at least three HEP/PSP projects.

11. **Procedure for Empanelment**

A circular/advertisement is uploaded on the website of the CEA <https://cea.nic.in/?lang=en> inviting applications from willing Central Design Organizations of the States for engagement as CDSOs. CEA shall first shortlist the

applications on the basis of the criteria decided by it. Thereafter, the CEA may hold an interaction with the authorized representatives of Central Design Organizations of the States, if required.

12. **Confidentiality of Data and Documents**

The intellectual property rights (IPR) of the data collected as well as deliverables produced for CEA shall remain with CEA. No one shall utilize or publish or disclose or part with, to a third party, any part of the data or statistics or proceedings or information collected for the purpose of his assignment or during the course of assignment for the CEA without the express written consent of the CEA. Central Design Organizations of the States shall be bound to hand over the entire set of records of assignment to the CEA before the expiry of the contract and before the final payment is released by the Department.

13. **Conflict of Interest**

Central Design Organizations of the States may in no case represent or give opinion or advice to any other person in any matter which is adverse to the interest of the CEA nor will it indulge in any activity outside the terms of the contractual assignment.

14. **Termination of Engagement**

The CEA reserves the right to terminate the engagement forthwith in following conditions:

- i. The CDSOs is unable to address the assigned work:
- ii. The CDSOs fails in timely achievement of the milestones as decided by the CEA; and

Note: CEA reserves the right to terminate the engagement, by serving thirty (30) days' written notice on CDSO. Termination shall come into effect on the day right after the completion of thirty (30) days of delivery of such notice. CDSO may terminate its service by notice of 60 days to CEA.

PROFORMA**Application for empanelment of CDSOs in CEA**

	Name of Central Design Organizations of the States in full (Block Letters)	
	Complete Address with Pin Code	
	<u>Nodal Person</u> Name : Designation:	
	Telephone/Mobile No. of 2 contact persons, first being Nodal Officer, second being alternate E-mail IDs	
	<u>Organizational Details</u> Year of Establishment: Details of Infrastructure and Facilities Available:	
	<u>Experience in Large Hydro/PSP Projects</u> Number of Hydro/PSP Projects Appraised during last 10 years: Areas of Expertise (Hydel Civil Design, Dam Design, HM design etc.): Details of Hydro/PSP Projects Evaluated:	
	<u>Competence in Relevant Areas</u> Details thereof:	

	<u>Additional Information</u> Relevant Certifications/Accreditations: Previous Collaboration with Government/PSUs:	
	The Departments which are proposed to be involved with work: Hydel Civil Design, Dam Design, Power House.	

	Name, designation and scale of pay of personnel proposed to be engaged for the work				
	Qualification and experience of personnel proposed to be engaged for above work and their willingness to take up the work:				
	Number of assignments completed and details of Organizations served with similar nature of work for large Hydro Projects	Sr No	From	To	Nature of work performed

Note: Additional information, if any, in support of suitability for the said engagement. Attach separate sheets, if necessary.

Date:

Name & Signature of the Authorized officer