

# भारत सरकार

# Government of India जल शक्ति मंत्रालय.

# Ministry of Jal Shakti जल संसाधन .नदी विकास एवं गंगा संरक्षण विभाग

# Department of Water Resources, River Development & Ganga Rejuvenation केन्द्रीय जल आयोग

# **Central Water Commission**



Tender No: LGD-1/CWC/HQ-92/ADCP/2020/01 dated: 18/01/2020

#### TENDER DOCUMENT

## **FOR**

- a) Supply, Installation, Testing, Commissioning and Maintenance of "Acoustic Doppler Current Profiler with DGPS & its Accessories" (1 Nos) at Baltara site under Lower Ganga Basin Organisation, Patna.
- b) Comprehensive Annual Maintenance Charges for 5 years including replacement of material & consumables and services beyond 2 years of standard warranty period.

Last date for submission of Tender : 03/02/2020 up to 10:00 AM

Date of opening of Tenders : 04/02/2020 at 11:00 AM

# OFFICER INVITING THE TENDER:

Executive Engineer, Lower Ganga Division-1, CWC,

Patna - 800016

Ph: 0612-2671541 Fax: 0612-2671541

(Certified that this document contains total 28 Pages)

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# **CHECK LIST**

# Please tick the appropriate column.

SL.	DOCUMENT	ENCLOSED		
NO.		YES	NO	
	TECHNICAL BID			
1.	Dated Covering Letter of Bidder			
2.	Dealership certificate from the manufacturer, if the bid is submitted by authorised dealer/representative.			
	List of clients to whom supply of similar type of hydro- meteorological equipment has been made including the value of supply			
3.	order and the present status of the order.			
4.	Prescribed Earnest Money Deposit in form of Demand Draft			
5.	Technical Schedules-T duly filled in and signed with Company/Firm's Seal on each page			
6.	Printed literature on all the equipments/items giving Specifications and details of accessories.			
7.	Original Tender Document dully filled in and signed on each page			

# **NOTICE INVITING TENDER**

The Executive Engineer, Lowwer Ganga Division-I, CWC, Patna, 18A, Arya Kumar Road, Rajendra Nagar, Patna-800016 invites e-Tender in sealed envelopes (in two parts bid system viz. Technical & Financial) from reputed & eligible manufacturers/ authorized dealers/ authorized representatives of foreign firms in India dealing with supply, installation, testing and commissioning of Hydro-meteorological equipment on behalf of President of India for the following works:

A	Name of Work	<ul> <li>a) Supply, Installation, Testing, Commissioning and Maintenance of "Acoustic Doppler Current Profiler with DGPS &amp; its Accessories" (1 Nos) at site Baltara under Lower Ganga Basin Organisation, Patna.</li> <li>b) Comprehensive Annual Maintenance Charges for 5 years including replacement of material &amp; consumables and services beyond 2 years</li> </ul>					
		warranty period.					
В	Estimated cost	Rs. 28,61,500.00 (Rupees Rupees Twenty Eight Lakh Sixty One Thousand Five Hundred only)					
С	Earnest Money Deposit	Rs. 57,230/- (Rupees Fifty Seven Thousand Two Hundred Thirty Only)					
D	Performance Guarantee	5% of the tendered value of the work					
Е	Cost of Tender Document	500/-					
F	Last date/time of submission of tender	03/02/2020 up to 10:00 AM					
G	Date/time of Opening of tender online	04/02/2020 at 11:00 AM					

- 1. Agreement shall be drawn with the successful tenderer on prescribed Form No. CPWD 8 (or other Standard Form as mentioned) which is available as a Govt. of India Publication. Bidders shall quote his rates as per various terms and conditions of the said form which will form part of the agreement.
- 2. Tender Document is available on Central Public Procurement (CPP) Portal URL <a href="www.eprocure.gov.in">www.eprocure.gov.in</a> and CWC website URL <a href="www.eprocure.gov.in">www.eprocure.gov.in</a>. The bids shall be submitted online only at Central Public Procurement (CPP) Portal URL <a href="www.eprocure.gov.in">www.eprocure.gov.in</a> up to 10:00 AM of 03/02/2020.
- 3. The tender documents can be downloaded online from <a href="www.cwc.gov.in">www.cwc.gov.in</a> or can be issued from the office of "Executive Engineer, Lower Ganga Division-I, CWC, Patna, 18A, Arya Kumar Road, Rajendra Nagar, Patna-800016" between 09:30 Hrs to 17:00 Hrs everyday except Sundays, Second Saturday of the month & Public Holidays on the payment of (non-refundable) Rs. 500/-, as the cost of the tender document and in case, the tender has been downloaded from the website (www.cwc.gov.in/tenders), at the time of submission of tenders, the firm has to enclose a demand draft of Rs. 500/- in favour of "Executive Engineer, Lowwer Ganga Division-I, CWC, Patna, 18A, Arya Kumar Road, Rajendra Nagar, Patna-800016" drawn on any scheduled bank payable at Patna towards the cost of the tender documents.
- 4. Interested eligible bidders may obtain further information/clarification, if required, from the office of the Executive Engineer, Lower Ganga Division-1, CWC, Patna, 18A, Arya Kumar Road, Rajendra Nagar, Patna-800016 during the office hours (09:30 hrs to 17:00 hrs) on working days (Monday to Saturday) except 2<sup>nd</sup> Saturday.
- 5. The tender document will be available for downloading online from 18/01/2020 to 01/02/2020.
- 6. E-Tender is available on Central Public Procurement (CPP) Portal URL <a href="www.eprocure.gov.in">www.eprocure.gov.in</a> and CWC website URL <a href="www.ewc.gov.in">www.ewc.gov.in</a>.
- 7. Bidder who has downloaded the tender shall not tamper/modify the tender form including downloaded price bid template in any manner. In case if the same is found to be tempered/ modified in any manner, tender will be completely rejected and EMD would be forfeited.
- 8. Government of India has made it mandatory to make all procurement with estimated value of Rs. 2 lakh or more through e-procurement mode. For conducting e-procurement, Central Water Commission has decided to use the CPP portal of NIC. Bids may be submitted online at Central Public Procurement (CPP) Portal URL www.eprocure.gov.in only.

9. For online submission of bids on CPP portal, bidders need to register with CPP. Bidders are advised to follow the instructions provided in the 'Instructions to the Contractors/Tenderer for the e-submission of the bids online through CPP portal. For any help, CPP Helpdesk may be contacted:

	CPP portal Helpdesk
For any technical related	0120-4200 462
queries please call at 24	0120-4001 002
x 7 Help Desk Number	0120-4001 005
	0120-6277 787
	International Bidders are requested to prefix +91 as country code
	Additional Help Desk Number 0120-4001005
	Technical - support-eproc(at)nic(dot)in
E-mail ID	Policy Related - cppp-doe(at)nic(dot)in
	Buyer Organization Name Contact
Central Water Commission	Executive Engineer, Lower Ganga Division-I, CWC, Patna,
Contact Person	18A, Arya Kumar Road,
	Rajendra Nagar, Patna-800016
Telephone/Mobile	0612-2671541,
	[between 09:30 hrs to 17:00 hrs on working days]
E-mail Id:	eelgd1-cwc@nic.in, mgd4cwcpat@gmail.com

- 10. Intending bidders are advised to check CPP Portal/ CWC website for any corrigendum / amendment.
- 11. The bidder has to submit following documents in hard copy in a sealed envelope before last date and time of submission of online bid otherwise the bid will not be considered for opening:
  - a) Demand Draft towards Earnest Money Deposit in original.
  - b) Demand Draft towards tender fee in original.
- 12. The Earnest Money in the form of Treasury Challan or Demand Draft or Pay order or Banker's Cheque or Deposit at Call Receipt or Fixed Deposit Receipt (drawn in favour of Executive Engineer, Lower Ganga Division-1, CWC, Patna) and tender fee shall be placed in separate sealed envelopes respectively. Both the envelope shall be submitted together in another envelope with the name of the work super scribing the envelope, in the O/o Executive Engineer, Lower Ganga Division-1, Central Water Commission, Patna up to 10:00 Hrs on 03/02/2020. The bid submitted shall be opened at 11:00 hrs on 04/02/2020.
- 13. The contractor whose bid is accepted will be required to furnish performance guarantee of 5% (Five percent) of the bid amount within the period specified in Schedule F. This guarantee shall be in the form Deposit at Call receipt of any scheduled bank/Banker's cheque of any scheduled bank /Demand Draft of any scheduled bank/Pay order of any Scheduled Bank (in case guarantee amount is less than Rs. 1,00,000/-) or Government Securities of Fixed Deposit Receipts or Bank Guarantee Bonds of any Scheduled Bank or the State Bank of India in accordance with the prescribed form. In case the contractor fails to deposit the said performance guarantee within the period as indicated in Schedule 'F', including the extended period if any, the Earnest Money deposited by the contractor shall be forfeited automatically without any notice to the contractor. The earnest money deposited along with bid shall be returned after receiving the aforesaid performance guarantee.
- 14. Eligibility Criteria: The bidders (Manufacturers & Firms) shall fulfill following qualifying requirements:
  - The bidder shall have completed satisfactorily at least three similar works of supply, installation, testing & commissioning of Hydro-meteorological equipment during last five years each of value not less than 11.5 lakhs.
     Or,
  - II. The bidder shall have completed satisfactorily at least two similar works of supply, installation, testing & commissioning of Hydro-meteorological equipment during last five years of value not less than 17.2 lakhs. Or,
  - III. The bidder shall have completed satisfactorily at least **one similar works** of supply, installation, testing & commissioning of Hydro-meteorological equipment during last five years of value not less than 23 lakhs.
  - IV. The bidder shall be either manufacturer or authorized dealer or authorized representative of Foreign Firms manufacturing Hydro-meteorological equipment and located in India.
  - V. The bidder's average annual turnover shall be not less than Rs.14.5 Lakh during last 3 consecutive financial years.

15. **Manner of Submission of Bids:** Bids are to be submitted in two parts namely "Technical Bid" and "Financial Bid in form of BOO".

'Technical Bid' shall not contain any financial information except commercial deviations, if any, proposed by the bidder. The commercial deviations by bidder, if any, shall be given in the prescribed schedule of 'Technical Bid' document.

## **Technical Bid' shall contain:**

- (1) Bidder's covering letter.
- (2) Dealership certificate from the manufacturer, if the bid is submitted by authorised dealer/representative.
- (3) List of clients to whom the supply of similar type of equipment has been made including the value of supply order and the present status of the order.
- (4) Schedules as given in 'Section I: Technical Bid Document of bid documents, duly filled in and signed by authorized signatory with Firm's seal on each schedule.
- (5) Printed literature of all the equipments, accessories and items being offered against this bid enquiry giving full specifications and details. The bidder shall clearly bring out technical deviations, if any, in specifications of the equipment, accessories and items being offered vis—a—vis specifications given in the bid documents, in the prescribed schedule in the 'Technical Bid Document'.
- (8) Any other information that shall establish credibility/ reliability/capability of the firm to undertake the proposed supply.
- (9) Technical Bid document may be downloaded, duly filled in as required and signed by the bidder with Firm's seal on each page before uploading to the site.
- (10) It shall be ensured that the 'Check List' of Bid Document is duly and completely filled in without leaving any item of Check List un-filled.

The bidders shall specifically note that they are not expected to stipulate any condition in their offer and further that if any such condition is included in the offer, the bid is liable to be rejected, treating the same as a conditional bid.

# Financial Bid shall contain:

- (1) Financial bid should be uploaded on CPP portal in form of BOQ only. No hard copy shall be accepted.
- 16. **Mode of Opening:** Bids received up to the due date & time shall be opened on the date and time specified in the bid documents by the Executive Engineer, Lower Ganga Division-1, CWC, Patna or his authorised representative in the presence of the interested bidders or their representatives. In the event of specified due date of opening the bids is declared as holiday, the bids shall be opened on next working day at the same time.

Technical Bid of bidders shall be opened first. Financial Bid/BOQ shall not be opened on the prescribed date of opening of bids but it shall be opened only after evaluation of Technical Bids.

Based on technical evaluation of bids, the bidders who fulfill all the technical and other specified requirements shall be short listed and they shall be duly informed about the time and date of opening the 'Financial Bid'. Financial Bid of short-listed Bidders only shall be opened by the Executive Engineer, Lower Ganga Division-1, CWC, Patna or his authorised representative in the presence of the interested bidders or their representatives.

- 17. Before submitting the tender the tenderer must ensure that it has understood the exact requirement of the Purchaser. In the case of any discrepancy or ambiguity felt by the tenderer in the scope of work and the desired deliverable functionality from the work, it is mandatory to raise the clarification in writing by the tenderer and in turn get that clarified from the purchaser in writing at least three days before the last date of tender submission. In the case of no such clarification required by the tenderer, it will be construed that all the requirements of the purchaser are understood by the tenderer. No communications will be entertained in this regard at any stage of work after the opening of the Tenders.
- 18. The competent authority on behalf of the President of India does not bind itself to accept the lowest or any other bid and reserves to itself the authority to reject any or all the bids received without the assignment of any reason. All bids in which any of the prescribed condition is not fulfilled or any condition including that of conditional rebate is put forth by the bidders shall be summarily rejected. Canvassing whether directly or indirectly, in connection with bidders is strictly prohibited and the whole or any part of the bid and the bidders shall be bound to perform the same at the rate quoted. The competent authority on behalf of President of India reserves to himself the right of accepting the whole or any part of the bid and the bidders shall be bound to perform the same at the rate quoted. The contractor shall not be permitted to bid for

works in this Division office responsible for award and execution of contracts, in which his near relative is posted a Divisional Accountant or as an officer in any capacity between the grades of Superintending Engineer and Junior Engineer (both inclusive). He shall also intimate the names of persons who are working with him in any capacity or are subsequently employed by him and who are near relatives to any gazetted officer in the Central Water Commission or in the Department of Water Resources, Ganga Rejuvenation & River Development, Govt. of India. Any breach of this condition by the contractor would render his/her bid to be summarily rejected.

- 19. The time allowed for carrying out the work will be 120 Days from the date of start as defined in schedule 'F' or from the first date of handing over of the site, whichever is later, in accordance with the phasing, if any, indicated in the tender documents.
- 20. No Engineer of Gazetted Rank or other Gazetted Officer employed in Engineering or Administrative duties in an Engineering Department of the Government of India is allowed to work as a contractor for a period of one year after his retirement from Government service, without the prior permission of the Government of India in writing. This contract is liable to be cancelled if either the contractor or any of his employees is found any time to be such a person who had not obtained the permission of the Government of India as aforesaid before submission of the bid or engagement in the contractor's Service. The bid for the works shall remain open for acceptance for a period of One Hundred Twenty days (120) days from the date of opening of bids. If any bidders withdraws his bid before the said period or issue of letter of acceptance, whichever is earlier, or makes any modifications in the terms and conditions of the bid which are not acceptable to the department, then the Government shall, without prejudice to any other right or remedy, be at liberty to forfeit 50% of the said earnest money as aforesaid. Further the bidders shall not be allowed to participate in the rebidding process of the work.
  - (a) This notice inviting Bid shall form a part of the contract document. The successful bidders/ contractor, on acceptance of his bid by the Accepting Authority shall within 10 days from the stipulated date of start of the work, sign the contract consisting of:-The Notice Inviting Bid, all the documents including terms & conditions, forming part of the bid as issued at the time of invitation of bid and the rates quoted at the time of submission of bid and acceptance thereof together with any correspondence leading thereto.
  - (b) Standard C.P.W.D. Form 8 or other Standard C.P.W.D. Form as applicable.
- 21. The prospective bidders may note that submission of Bid Documents does not necessarily mean that they fulfill the eligibility criterion. The eligibility of each bidder would be examined in detail at technical evaluation stage and in case it is found that if any bidder does not meet the prescribed eligibility conditions, his Bid shall summarily be rejected.
- 22. PAN in the name of Firm and not in the individual name should be submitted along with e-Tender. In case of proprietorship firm PAN in the name of proprietor will be accepted.
- 23. The Executive Engineer, Lowwer Ganga Division-I, CWC, 18A, Arya Kumar Road, Rajendra Nagar, Patna-800016, reserves the right to accept or reject any or all e-Tenders without assigning any reasons thereof.

Sd/-

Executive Engineer Lower Ganga Division-1, CWC, 18-A, Arya Kumar Road, Rajendra Nagar, Patna-800016 (Bihar)

# प्रतिलिपि:

- 1. अधीक्षण अभियंता (सम०), निचली गंगा बेसिन संगठन, केंद्रीय जल आयोग, पटना।
- 2. निदेशक- (प्रबो०) सह अधीक्षण अभियंता (एच० ओ० सी०), प्रबोधन निदेशालय केंद्रीय जल आयोग, पटना।
- 3. लेखा शाखा,निचली गंगा मंडल१-, केंद्रीय जल आयोग, पटना।
- 4. सूचनापट, निचली गंगा मंडल१-, केंद्रीय जल आयोग, पटना।
- 5. केंद्रीय जल आयोग का वेब पोर्टल www.cwc.gov.in अथवा www.old.cwc.gov.in I
- 6. ई-प्रकाशन, केंद्रीय सार्वजनिक खरीद पोर्टल www.eprocure.gov.in I

# KEY EVENTS AND DATES

E-Tender inviting authority Designation and Address at which documents are to be submitted in hard copy	Executive Engineer, Lowwer Ganga Division-I, CWC, 18A, Arya Kumar Road, Rajendra Nagar, Patna-800016 Phone No: 0612-2671541 Fax No : 0612-2671541
Mode of submission of E- Tender	The bids shall be submitted online only at Central Public Procurement (CPP) Portal URL <a href="https://www.eprocure.gov.in">www.eprocure.gov.in</a>
Name of Work	<ul> <li>a) Supply, Installation, Testing, Commissioning and Maintenance of "Acoustic Doppler Current Profiler with DGPS &amp; its Accessories" (1 Nos) at site Baltara under Lower Ganga Basin Organisation, Luc.</li> <li>b) Comprehensive Annual Maintenance Charges for 5 years</li> </ul>
	including replacement of material & consumables and services beyond 2 years warranty period.
Language(s) in which items to be printed	English/Hindi
Validity of the E-Tender	120 Days
Issuance of the E-Tender	e-Tender can be downloaded from 18.01.2020 (16.00hrs) from Central Public Procurement (CPP) Portal URL www.eprocure.gov.in
NIT No.	LGD-1/ CWC/HQ-92/ADCP/2020/01
Estimated Cost	: Rs. 28,61,500.00
Cost of e-Tender Document	: Rs. 500/-
Earnest Money (EMD)	: Rs. 57,230/-
Last date & Time for submission of e-Tender online	: 03/02/2020 at 10:00 hrs.
Date, time and address of Public Online e-Tender	: 04/02/2020 at 11:00 hrs. (Technical Bid)
Opening Event	O/o Executive Engineer, Lowwer Ganga Division-I, CWC, 18A, Arya Kumar Road, Rajendra Nagar, Patna-800016 Interested bidder or their representative not more than one persons per bid may be present at the above address.

#### GENERAL INSTRUCTION TO BIDDERS

- 1. Bids shall be submitted online only at Central Public Procurement Portal (CPPP) website URL https://eprocure.gov.in
- 2. Not more than one e-Tender shall be submitted by one contactor or contractors having business relationship. Under no circumstance will father and his son(s) or other close relations who have business relationship with one another (i.e when one or more partner(s)/director(s) are common) be allowed to e-Tender for the same contract as separate competitors. A breach of this condition will render the e-Tenders of both parties liable to rejection.
- 3. e-Tenderer who has downloaded the e-Tender from Central Public Procurement Portal (CPPP) website https://eprocure.gov.in shall not tamper/modify the E-Tender form including downloaded price bid template in any manner. In case if the same is found to be tempered/modified in any manner, e-Tender will summarily be rejected and EMD would be forfeited.
- 4. Intending e-Tenderers are advised to visit CPPP website https://eprocure.gov.in/eprocure/app at least 7 days prior to closing date of submission of E-Tender for any corrigendum / amendment.
- 5. Applicant contractor must provide demand draft (DD) for Rs 500/- (Rupees Five Hundred only) as the cost of e-Tender forms/ documents and Rs. 57,230/- (Rupees Fifty Seven Thousand Two Hundred Thirty Only) as Earnest Money Deposit (EMD) obtained from any Nationalized/ scheduled Bank in favor of Executive Engineer, Lower Ganga Division-1, CWC, 18A, Arya Kumar Road, Rajendra Nagar, Patna-800016 payable at Patna with their application/ downloaded e-Tenders in separate envelopes. All applicable bank charges shall be borne by the applicant and he shall not have any claim what so ever on this account on department. In case of re-e-Tendering, the firms which have submitted the DD in earlier calls as the cost of e-Tender forms/ documents will require to submit DD along with their e-Tender/ application in subsequent calls also. e-Tender not accompanied with the cost of e-Tender documents and Earnest Money Deposit (EMD) is liable to be rejected.
- 6. Bids will be opened as per date/time as mentioned in the e-Tender Key Event Sheet. The bidder has to be ensured that the 'Check List' as given in Section-1 of Bid Document after 'List of Contents' is duly and completely filled in without leaving any item of Check List un-filled.
- 7. The bidder has to submit following documents in hard copy in sealed envelopes to the Executive Engineer, Lower Ganga Division-I, CWC, Patna before the last date and time of submission of online bid otherwise the bid will not be considered for opening
- 8. Envelope 1 Demand Draft towards e-Tender document cost in original. Envelope 2 Demand Draft towards Earnest Money Deposit in original.
- 9. Bid Documents shall state the supplies to be made as well as the date & time for submitting and opening Bids, the time allowed for carrying out the work, the amount of the 'Performance Guarantee' to be deposited by the successful Bidder. The copy of complete bid documents and other details required in connection with the work, signed for the purpose of identification by the Executive Engineer, Lower Ganga Division-1, CWC Patna-800016 shall be open for inspection by the Bidders at the office of the Executive Engineer, Lower Ganga Division-1, CWC, Patna on all working days between 10:00 hrs to 17:00 hrs (IST).
- 10. Any person/firm who submits a Bid shall fill up all the prescribed bidding schedules and rates. Bids, which propose alteration, in the works specified in the said form of invitation to Bid or in the time allowed for carrying out work or which contain any other condition of any sort shall be liable to rejection.
- 11. The Executive Engineer, Lower Ganga Division-I, CWC, Patna or his duly authorized representative shall open Bids in the presence of Bidders who may wish to be present at the time of opening. As bids are invited on two envelopes system, only Technical Bids shall be opened on the date & time prescribed in the bid documents. Financial Bids of only those bidders, who are found technically qualified based on evaluation of technical bids/BOQ, shall be opened on date & time decided by the Executive Engineer, Lower Ganga Division-1, CWC, Patna. The technically qualified bidders shall be intimated about the time and date of opening of their 'Financial Bids' through fax/e-mail/registered letters.
- 12. The the Executive Engineer, Lower Ganga Division-1, CWC, Patna shall have the right to reject all or any of the Bids without assigning any reason and shall not be bound to accept the lowest Bid.
- 13. All Packages of ADCP Equipment received from successful bidder after award of work shall be opened only in the presence of supplier.

#### CLAUSES OF CONTRACT

- 1.0 Performance Guarantee: The person/persons/firm whose Bid(s) may be accepted (herein after called the Supplier) shall furnish to the Executive Engineer, Lower Ganga Division-1, CWC, Patna a sum equal to 5% of Bid value as 'Performance Guarantee' in prescribed form within the prescribed time limit as given herein after.
- **2.0 Mode of Performance Guarantee**: Supplier shall furnish the Performance Guarantee at the rate mentioned above in the form of Unconditional & Irrevocable Bank Guarantee (on the Prescribed Form, which shall be made available within 15 days from the issue of Letter of Acceptance to the successful bidder.
  - **Liquidation of Bank**: If the bank, which has issued the bank guarantee goes into liquidation or for any reason is unable to make payment against the said bank guarantee, the loss caused there by shall fall on the Supplier and the Supplier shall forth with on demand furnish additional security to the Executive Engineer, Lower Ganga Division-1, CWC, Patna to make good the deficit. The Executive Engineer, Lower Ganga Division-1, CWC, Patna for this purpose shall be entitled to recover such amount from any dues of supplier against the Executive Engineer, Lower Ganga Division-1, CWC, Patna.
- **3.0 Penalty for Delay:** The Supplier is to deliver the materials on or before the date mentioned in the Letter of Intent (LOI), failing which, he shall be required to pay or allow one percent (1 %) of the total amount of the contract value for every week or part thereof but not exceeding 10 weeks to be deducted from his Performance Guarantee, that he shall exceed his time as and for liquidated damages.
- 4.0 In every case in which the payment or allowance mentioned in Clause 3.0 shall have incurred for 10 consecutive weeks, the Executive Engineer, Lower Ganga Division-1, CWC, Patna shall have the power to annul the contract and/or have the supply completed at the Supplier's risk and expenses without any further notice to him and the Supplier shall have no claim to compensation for any loss that he may incur.
- **5.0** Release of EMD: EMD of technically unsuccessful bidders shall be returned without opening of their Financial Bids/BOQ. EMD of other bidders except the successful bidder shall be released after issuance of LOI to successful bidder. EMD of successful bidder shall be released only after receiving the required Performance Guarantee.
- **6.0 Force Majeure**: The Supplier shall not be considered in default in performance of the obligations under this contract, if such performance is prevented or delayed by events such as war, hostilities, revolution, riots, civil commotion, epidemics, Tsunami, Hurricane, floods, droughts, earthquakes, or any other act of Nature, or for any cause beyond the reasonable control of the part affected, provided notice in writing of any such cause with necessary evidence that the obligation under this contract is hereby affected or prevented or delayed, is given within 30 (thirty) days from the happening of the event. As soon as the cause of Force Majeure has been removed, the supplier shall notify the Executive Engineer, Lower Ganga Division-1, CWC, Patna of such causation and the actual delay incurred in such affected activities adducing necessary evidence in support thereof. From the dates of occurrence of a case of Force Majeure, obligations of the supplier shall be suspended during the continuances of any liability so caused until the cause itself and the inability resulting there from has been removed.
- 7.0 Extension of Time: If the Supplier is unable to supply the materials within stipulated period due to Force Majeure or for the reasons beyond his control so as to necessitate an extension of the time allowed in this Bid, he shall apply in writing to the Executive Engineer, Lower Ganga Division-1, CWC, Patna who shall grant it in writing if reasonable ground exists for it, and without such written authority of the Executive Engineer, Lower Ganga Division-1, CWC, Patna and the Supplier shall not be exempted from the penalty levy-able under Clause-3. If during the agreed time, the supplier has made part supplies and remaining part of supply could not be made due to above reasons, the Supplier shall be entitled to such extension of times as may be determined by the Executive Engineer, Lower Ganga Division-1, CWC, Patna for completion the remaining supply.
- 8.0 On the completion of the delivery of materials, the Supplier shall be given a certificate to that effect by the Executive Engineer, Lower Ganga Division-1, CWC, Patna but the delivery shall not be considered complete until the Supplier shall have replaced / rectified faulty/ defective equipments/materials and shall have the approved instruments tested & installed and commissioned at the sites.
- 9.0 If at any time after the commencement of the supplies, the Executive Engineer, Lower Ganga Division-1, CWC, Patna shall for any reason, whatsoever, not require the whole or part thereof in quantity as specified in the Bid documents to be supplied, the Executive Engineer, Lower Ganga Division-1, CWC, Patna shall in addition to his power to cancel the contract in case of default on the part of the Supplier, have power to terminate all liability of Lower Ganga Division-1, CWC, Patna there under at any time after giving due notice in writing to the Supplier of his desire to do so in the event of such a notice being given.

- (a) The Executive Engineer, Lower Ganga Division-1, CWC, Patna shall be entitled to direct the Supplier to complete the supply of the material which are ready for delivery up to the date of expiry of the notice and thereafter to cease the supply of all the materials. The supplies received and accepted up to that date shall be paid for at the Bid rate, and;
- (b) The Supplier shall have no claim to any payment or compensation what-so-ever on account of any profit or advantage which he might have derived in consequence of the full execution of the contract but which he did not obtain owing to its premature termination or for any loss which he might have sustained on this account.
- 10. Conformity to Specifications: The materials shall be of the best quality & description and strictly in accordance with the specification given in the Bid documents and the Supplier shall receive payment for such materials only as are approved and passed by the Executive Engineer, Lower Ganga Division-1, CWC, Patna.
- 11. Rejection of Materials: In the event of the material being considered by the Executive Engineer, Lower Ganga Division-1, CWC, Patna, to be inferior to that described in the bid documents, the Supplier shall on demand in writing, forth with remove the same at his own cost and in the event of his neglecting to do so within such period as may be mentioned by the Executive Engineer, Lower Ganga Division-1, CWC, Patna, he may get such rejected material removed at the Supplier's risk and cost. The expenses incurred in doing so shall be deducted from any sums due or which may become due to the Supplier or by encasing the required portion of Performance Guarantee.
- 12. The Supplier hereby declares that the goods/stores/articles supplied or to be supplied to the Executive Engineer, Lower Ganga Division-1, CWC, Patna under this contract, shall be of the best quality and workmanship and shall be strictly in accordance with the specifications and particulars mentioned in Clause-10 hereof and the Supplier hereby guarantees that the said goods/stores/articles shall continue to conform to the description and quality aforesaid, for entire period of "Warranty" from the date of successful installation, testing & commissioning of the said goods/stores/article and acceptance thereof by the Executive Engineer, Lower Ganga Division-1, CWC, Patna and that notwithstanding the fact that the Executive Engineer, Lower Ganga Division-1, CWC, Patna may have inspected and or approved the said goods/stores/articles, be discovered not to conform to the description and quality aforesaid or to have deteriorated and the decision of the Executive Engineer, Lower Ganga Division-1, CWC, Patna in that behalf shall be final and conclusive and binding on all the parties, the Executive Engineer, Lower Ganga Division-1, CWC, Patna shall be entitled to reject the said good/store/articles or such portion thereof as may be discovered not to conform to the said description and quality. On such rejection, the goods/articles/stores shall be at the supplier's risk & cost and the provisions contained in the Clause-11 hereof shall mutatis mutants apply to the removal of the goods/stores/articles rejected under this clause. The Supplier shall if called upon to replace the said goods/stores/articles or such portion thereof as has been rejected by the Executive Engineer, Lower Ganga Division-1, CWC, Patna or otherwise, the Supplier shall pay to the Executive Engineer, Lower Ganga Division-1, CWC, Patna such damages as may arise by reason of the breach of the condition herein contained. Nothing herein contained shall prejudice any other right of the Executive Engineer, Lower Ganga Division-1, CWC, Patna in that behalf under this contract or otherwise.
- 13. The Supplier shall supply at his own expense all tools, plant and implements required for the due fulfillment of his contract and the material shall remain at his risk till the date of final delivery, installation testing and commissioning unless it shall have been in the mean time removed for use by the Executive Engineer, Lower Ganga Division-1, CWC, Patna.
- 14. No material shall be brought to site for delivery on Saturdays and Sundays and holidays without the written permission of the Executive Engineer, Lower Ganga Division-1, CWC, Patna.
- 15. Warrantee: All the materials supplied against this Bid shall be under 'On Site Warranty' for a minimum period of 24 months from the date of successful installation, testing and commissioning and acceptance thereof by the Executive Engineer, Lower Ganga Division-1, CWC, Patna. 'On Site Warranty' shall be provided at the places of the installation of the Equipments.
- 16. Penalty for Delay in Service during Warranty Period: The supplier is required to provide the necessary on site service including parts replacement as well as replacement of complete equipment in case of any defect during Warranty Period. Onsite service shall normally be provided within a period of 15 days but not later than 30 days from the date of written complaint lodged by the Executive Engineer, Lower Ganga Division-1, CWC, Patna or his authorized representative. In case, service is not provided within above period, a penalty @ 1% of the total amount of contract value for every week of delay or part thereof shall be deducted from his performance guarantee/payment due, if any.
- 17. **Arbitration:** Incase, of any dispute, controversy or claim arising out of or relating to this Contract or the breach, termination or invalidity thereof shall, on the initiative of either party, be referred for settlement to an arbitration tribunal consisting of one arbitrator to be nominated by the Executive Engineer, Lower Ganga Division-1, CWC,

Patna, one by the Supplier and the third by mutual agreement of the parties. If either of the parties fails to appoint its arbitrator within sixty days after receipt of notice for the appointment of an arbitrator, the arbitrator on behalf of the failing party shall be appointed by District Court at Patna upon request of the other party. If the third arbitrator is not appointed within sixty days of the appointment of the respective arbitrators, such arbitrator shall be appointed by the District Court at Patna upon the request of either party.

The arbitration shall be conducted in accordance with the prevailing rule & regulations and law of India and shall be held at Patna, India. The decision of the majority of the arbitrators shall be final and binding upon the parties. Performance under the Contract shall continue during the arbitration proceeding.

# 18. Compensation for Breach of Terms & conditions:

- 18.1 On the breach of any terms or conditions of this contract by the Supplier, the Executive Engineer, Lower Ganga Division-1, CWC, Patna shall be entitled to forfeit the earnest money deposit and/or performance guarantee or the balance to thereof that may, at that time, be remaining to be released and retain the same as damages and compensation for the said breach but without prejudice to right of the Executive Engineer, Lower Ganga Division-1, CWC, Patna to recover any further sums as damage from any sums due or which may become due to the Supplier by Lower Ganga Division-1, CWC, Patna or otherwise however.
- 18.2 All compensation or other sums of money Payable by the Supplier under the terms of this contract may be deducted from or paid by the sale of a sufficient part of the Bank Guarantee or from any sums which may become due to the Supplier by CWC, Patna on any account what-so-ever and in the event of his 'Performance Guarantee' deposit being reduced by reasons of any such deductions or sale as aforesaid, the Supplier shall within 10 days make good the same by another Bank Guarantee of equivalent amount of any scheduled bank of India endorsed in favor of the Executive Engineer, Lower Ganga Division-1, CWC, Patna.
- 19. Executive Engineer, Lower Ganga Division-1, CWC, Patna shall have the right to cause an audit and technical examination of the works and the final bill of the Supplier including all supporting vouchers, abstract etc. to be made after payment of final bill and if as a result of such audit and technical examination, any sum is found to have been overpaid in respect of any work done by the Supplier under the contract or any work claimed by him to have been done by him under this contract and found not to have been executed, the Supplier shall be liable to refund the amount of the overpayment and it shall be lawful for the Executive Engineer, Lower Ganga Division-1, CWC, Patna to recover the same from him in the manner described in clause 18.1 or in any other manner legally permissible and if as a result of audit and technical examination, it is found that Supplier was paid less then what was due to him under the contract in respect of any work executed by him under it, the amount of such under payment shall be duly paid by the Executive Engineer, Lower Ganga Division-1, CWC, Patna to the Supplier.

PROVIDED that Executive Engineer, Lower Ganga Division-1, CWC, Patna shall not be entitled to recover any sum overpaid, nor the Supplier shall be entitled to payment of any sum paid short where such payment has been agreed upon between the Executive Engineer, Lower Ganga Division-1, CWC, Patna on the one hand and the Supplier on the other hand under any term of the contract permitting payment for work after assessment by the Executive Engineer, Lower Ganga Division-1, CWC, Patna.

20. Time of Completion: The time allowed for carrying out the Supply, Installation, Testing & Commissioning of "Acoustic Doppler Current Profiler with DGPS & its accessories shall be 120 days from the date of the issue of 'Letter of Intent' to commence the work.

### 21. Methodology for Evaluation of Bids:

- 21.1 The evaluation of Technical Bids shall be first carried out. All technical details furnished by the bidders and technical & commercial deviations, if any, stipulated in the technical bids shall be examined and if found necessary, the clarifications and additional details may be sought from the bidders.
- 21.2 The bidders whose bids meet all the technical requirements and whose technical & commercial deviations, if any, are found to be acceptable after examination, shall be short listed and treated as technically qualified bidders.
- 21.3 Financial Bids/BOQ of only technically qualified bidders shall be opened and considered. The 'Financial Bids/BOQ' of technically disqualified bidders shall not be opened.

The evaluation of Bids for Supply, Installation, Testing, Commissioning and Maintenance of "Acoustic Doppler Current Profiler with DGPS & its Accessories" and Comprehensive Annual Maintenance Charges for 5 years, which should not be less than 3% per year of the cost of equipment, including replacement of material & consumables and services beyond 2 years warranty period at Baltara site under Lower Ganga Basin Organisation, Patna, shall be done combined and order shall be placed considering total bids as one bid.

- **22. Recommended Spares:** Recommended spares for running and maintenance of ADCP for a period of five years after prescribed 'On Site Warranty' period can be mentioned by the Bidders at any appropriate place but these shall not be considered in the financial evaluation of Bids for deciding the lowest Bidder.
- 23. Comprehensive Annual Maintenance Charges: The bidders shall quote their rates for Comprehensive Annual Maintenance Charges for the Equipment on yearly basis per site including man days, consumable and essential spares in the prescribed Schedule as per detailed terms and conditions specified in the Section-I of the Bid Documents. The rate of AMC, which should not be less than 3 % per year of the cost of equipment, for five years after onsite warranty, shall be considered combined for the financial evaluation of Bids for deciding the lowest Bidder. In case if the cost of AMC is quoted less than 3% per year of the cost of Instruments, the tender shall summarily be rejected.

Bidders may quote their rates for Comprehensive Annual Maintenance Charges for the equipment on yearly basis per site in the prescribed Schedule of the Bid Documents for further period of Three years as 2<sup>nd</sup> AMC period after the 1<sup>st</sup> AMC period of five years, but these shall not be considered in the financial evaluation of Bids for deciding the lowest Bidder. However, these rates of 2<sup>nd</sup> AMC for Three years shall be considered separately.

The bidders may note that award of 2<sup>nd</sup> AMC shall be on the sole discretion of the Executive Engineer, Lower Ganga Division-1, CWC, Patna and he may decide not to award 2<sup>nd</sup> AMC of work in full or part to any bidder. No claim what-so-ever shall be entertained by the Executive Engineer, Lower Ganga Division-1, CWC, Patna on this account.

- 24. Technical and Commercial Deviations: The bidders are not expected to stipulate any technical or commercial deviations in their bids. However, if any bidder proposes any technical or commercial deviation, the same shall be indicated in appropriate Schedule of 'Technical Bid Document' specifying clearly whether proposed deviations have any financial implications or not. The financial bid/BOQ once submitted online is final and it cannot normally be allowed to be modified subsequently.
- 25. The Executive Engineer, Lower Ganga Division-1, CWC, Patna reserves to himself the right of accepting the whole or any part of the Bid and the Bidder shall be bound to perform the same at the rates quoted.
- **26. Rejection of Bids:** Bids, in which any of the prescribed conditions are not fulfilled or are incomplete in any respect, are liable to be rejected. Further, the Executive Engineer, Lower Ganga Division-1, CWC, Patna does not bind himself to accept the lowest or any other Bid and reserves his right to reject any or all of the Bids received without assigning any reason.
- 27. Canvassing whether directly or indirectly, in connection with Bids is strictly prohibited and the Bids submitted by the Bidder who resort to canvassing shall be liable to rejection.
- 28. The Bidder shall not be permitted to Bid for supply, if any of near relative of the owner/Directors of the firm is posted in Lower Ganga Division-1, as Accounts Officer / Divisional Accountant or as an officer in any capacity between the grades of Superintending Engineer and Junior Engineer (both inclusive). The owner/Director of the firm shall also intimate the names of persons who are working with him in any capacity or are subsequently employed by him and who are near relatives to any gazetted officer in the Hydrological Observation Circle and Lower Ganga Basin Organization of CWC. Any breach of this condition by the Supplier would render him liable to be removed from the approved list of Suppliers of this Project.
- 29. Validity Period of Bid: The Bid for the works shall remain open for acceptance for a period of one hundred and twenty days (120) from the prescribed date of opening of Bids. If any Bidder withdraws his Bid before the said period or makes any modifications in the terms and conditions of the Bid, then the Executive Engineer, Lower Ganga Division-1, CWC, Patna shall, without prejudice to any other right or remedy, be at liberty to forfeit the aforesaid earnest money.
- **30. Signing of Contract Agreement:** This 'Notice Inviting Bid' shall form a part of the contract agreement. The successful Bidder, on acceptance of his Bid by the Accepting Authority, shall, within 15 days from the stipulated date of start of the work sign the contract consisting of:-
  - (a) The notice inviting Bid, all the documents including 'General Rules and Directions for the Guidance of Suppliers', 'Clauses of Contract', 'Additional Terms & Conditions', 'Scope of Work & Technical Specification', 'Drawings' and all bidding 'Schedules' forming the Bid as issued at the time of invitation of Bid and acceptance thereof together with any correspondence, minutes of meeting leading thereto.
  - (b) Standard CPWD Form-9: Part-1: Bid and Contract for Supply of Materials (Schedule-T) and CPWD Form-9: Part-2: Schedule of Quantities & Rates (Schedule F).

#### ADDITIONAL TERMS & CONDITIONS

In addition to 'Clauses of the Contract', the following 'Additional Terms and Conditions' shall also be part of the contract and shall be binding on both the parties of contract. Whenever any clause of 'Additional Terms and Conditions' is contradictory to the 'Clauses of the Contract', clauses of the 'Additional Terms and Conditions' shall be taken as have been issued in supersession of the 'Clauses of the Contract'.

- 1.0 The supply shall be executed as per the technical specifications & requirements given in the Bid documents.
- 2.0 Entire supply shall remain open for inspection to Executive Engineer, Lower Ganga Division-1, CWC, Patna or their authorized representative at all stages of execution till completion.
- 3.0 Training for equipment familiarization shall be provided by the prospective bidders. The details of such training/places etc. may be included in the offer.
- 4.0 On site Demonstration and Training to the staff (at least 5 persons) shall up to the satisfaction of the purchaser (Executive Engineer, Lower Ganga Division-1, CWC, Patna). Further, a comprehensive 2 days Training module for 5 personnel regarding downloading the raw data and interpretation of data downloaded shall be provided by the prospective bidders at Patna, the cost, if any, may be included in the financial bid/BOQ.
- 5.0 Computer unit for downloading of the data wherever required may be considered separate one at each station.
- 6.0 Prices should include any other software/hardware required to run offered software to down load data & study the
- 7.0 Literature on instruments offered shall be attached. The literature should contain the methodology/analogy on which system/equipment works. The formats of data presentation by the software may be mentioned.
- 8.0 The rate quoted for comprehensive annual maintenance contract for 5 years after the warranty period will be considered for bid evaluation. The payment towards the comprehensive annual maintenance contract will be made half yearly after on-site warranty period from the date of the installation of the equipment.
- 9.0 Warranty period (at least two years) of the equipment shall be clearly mentioned in the tender. During the warranty period bidder shall be responsible for any defects in the equipments and shall bear all the expenditure in respect of the rectification of such defects including replacement of faulty parts free of cost.
- 10.0 The consumable and essential spares in warranty/AMC period required to be procured with the equipment shall be listed out in the offer along with the prices. Prices of consumable and spare parts will not be considered for evaluation of bid. In warranty or AMC period, the consumables or spares are to be borne by the supplier without any extra cost to the purchaser.
- 11.0 Location: The probable installation sites is (a) Baltara. However, exact location will be given by Engineer–in-charge or his representative at site.
- 12.0 Bids will be opened in the office of the Executive Engineer, Lower Ganga Division-1, CWC, Patna. The bidder shall be responsible for safe transport of equipment to the respective installation site.
- 13.0 The supplier shall provide such packing of the Goods as is required to prevent their damage or deterioration during transit to their final destination i.e. installation site. The packing shall be sufficient to withstand without limitation, rough handling during the transit and exposure to extreme temperatures, salt and precipitation during transit and open storage. The supplier will be required to make separate package for each installation site. Each package will be marked in three sides with proper paint/indelible ink, the following:
  - (i) Project (ii) Order No. (iii) Country of origin of goods (iv) Supplier's Name and (v) Packing list reference number.
- 14.0 Tenderer shall be responsible to store all the equipments & accessories etc. safely till it is installed and commissioned. Tenderer shall also be responsible for demonstration of the same at site.
- 15.0 The stations, where the proposed equipment are to be installed, are in the remote areas and do not have regular electric supply. The provision of batteries, chargers solar panels etc., if required, shall be included in the bid itself while quoting the rates for the equipment.

- 16.0 The consignee will as soon as possible, but not later than 30 days of the date of arrival of stores at destination notify the bidder of any loss or damage to the stores that may have occurred during transit.
- 17.0 The department reserves the right to split the work and award the same to more than one tenderer.
- 18.0 Any corrections/cuttings in the Bid document shall be initialed by the bidder. Price must be quoted both in figures and words. In case of discrepancies, amount written in words will be taken as correct.
- 19.0 In case the bidder offering to supply the goods under this contract which the Bidder did not manufacture or otherwise produce. The necessary authorization (documentary evidence) for the goods manufacturer or producer to supply the goods shall be established to the purchaser's satisfaction. The information in respect of the legal status, place of registration and the principal place of business or the company or the firm etc. should be submitted.
- 20.0 Any taxes, duties, cost of exchanges on materials in respect of this contract shall be payable by the bidder.
- 21.0 It is the responsibility of the bidder to get himself familiar with the sites & the working conditions before bidding.
- 22.0 The cost of customs & Excise duty etc may be included appropriately, since the purchaser cannot provide any document whereby such duties can be exempted.

# SCOPE OF WORK AND TECHNICAL SPECIFICATIONS

#### 1.0 General:

All supply covered in this contract shall be made in accordance with the detailed specifications described herein after. In case, the specifications of the any item of supply are not given herein, the supply shall be made in all respects in accordance with relevant Bureau of Indian Standards (BIS) specifications, best engineering practices and the instructions of the Executive Engineer, Lower Ganga Division-1, CWC, Patna, given from time to time. In case BIS Specifications for any item of equipment or accessories are not available, these shall be as per mutually agreed International Specifications. The ADCP has to be provided at the Baltara site under LGBO detailed as under:

Sl.No.	Site	Quantity	Divison
1.	Baltara GDSQ Site(located in Khagaria district of Bihar)	1 Nos	Lower Ganga Divison-1,CWC,Patna
	Total	1 Nos	

1.2 **Site Conditions:** The Supplier shall satisfy himself as to the nature & location of the proposed ADCP as well as terrain and local conditions and particularly those having bearing on performance of ADCP Equipment proposed to be supplied under this bid enquiry, handling & storage of equipments and materials, availability of labour and working space, weather conditions or similar other physical conditions at the site having bearing on performance/characteristics of equipments, and facilities needed particularly for installation of equipments and for providing **'On Site Warranty'** and **'Annual Maintenance Contract'**.

Any default or failure on the part of Supplier to acquaint him with all the information concerning these conditions shall not relieve him from the responsibility for the execution of the contract unless the contract expressively provides that responsibility thereof is assumed by the Executive Engineer, Lower Ganga Division-1, CWC, Patna.

1.3 The information and data stated herein and incorporated in the bid documents elsewhere is for information only and the Executive Engineer, Lower Ganga Division-1, CWC, Patna does not guarantee that the available data/records represent completely and accurately the existing conditions and does not guarantee any interpretation of these data or the correctness of any information. The Supplier shall assume full responsibility for any deductions, interpretations and conclusions drawn there from by him.

# 2.0 Scope of Work:

The Acoustic Doppler Current Profiler (ADCP) is to be used for automated discharge measurements from a bridge/cableway or a small boat/catamaran. The ADCP has to be mounted on a Trimaran and can be securely operated from a bridge, trolley of the cableway or towed with the help of a boat for recording the observation. Typical applications are verification of velocity-area data, discharge measurements on rivers. The ADCP will be deployed in a roving mode, being transported from one site of interest to the other. Trimaran will be part of delivery: however, cable/ropes/cable way or the boat is not to be included in the delivery. The discharge measuring system should be deployed at the nominated site throughout the year.

# 2.1 Conditions and requirements:

- The ADCP shall be of such a design that it operates reliably and accurately under the prevailing environmental and hydraulic conditions.
- The ADCP shall be easy to operate and maintain.
- All materials on the ADCP exterior shall be non-corrosive.
- The ADCP shall be small, light and easy to transport
- The sensor-head shall be sturdy and impact resistant.
- The ADCP shall be installed in such a way that no air will be sucked underneath the transducers of the profiler.
- The ADCP shall be easy to install and deploy on a small trimaran/float, which can be securely towed with the help of a boat without compromising on the safety of boat and trimaran/float. For this purpose, matching rigging material should be part of the delivery. It can also be towed from bridge for which necessary accessories has to be provided by contractor.
- If mounted on a boat, the X-direction of the ADCP shall be in parallel with the longitudinal axis of the boat.
- The ADCP shall have small dead zones at the surface and the bottom as it will be used in very shallow and deeper water.
- A portable PC (Laptop), meeting the requirements of the current profiler is to control the ADCP to monitor the data
  acquisition process, to store the collected data and to visualize collected data files. Laptop shall also be part of the
  delivery and accordingly price shall be quoted.

- The ADCP shall support accurate Bottom Tracking.
- The ADCP shall support Bluetooth connectivity.
- The ADCP shall support use of DGPS, to be used during moving bed conditions.
- The ADCP shall have an acoustic frequency and operating modes suitable for robust bottom tracking in the
  presence of suspended material near river bed and for deeper profiling in high sediment concentrations as well as a
  fast sampling mode.
- All relevant data from ADCP, compass, echo-sounder and other devices shall be stored on laptop PC for validation and post processing.
- The Tenderer shall provide adequate training to officials at all the locations on site.
- The current profiler shall be supplied with the required accessories, software and operator"s manual.
- □ A DGPS system shall be part of the delivery and included in the bid price. It should be integrated into the Trimaran/ADCP. The DGPS shall meet the following requirements and should be independent and should not require radio link.
  - (i) fully compatible with the ADCP system, hardware and software and should preferably an integrated solution.
  - (ii) DGPS should be based on satellite based augmentation system (SBAS)
  - (iii) same or stand-alone power supply
  - (iv) position accuracy of the DGPS shall be  $\leq 1 \text{ m}$
  - (v) update rate of  $\leq 10$  hertz

5.0

Scope of Work during AMC:

- (vi) position conversion to the co-ordinate system used for the streams
- (vii) proper and accurate referencing to boat in order to allow accurate conversion of Doppler velocity into actual water velocity (including direction)

3.0	Te	chnical Specifications: Refer schedule-T on page-25
4.0 <b>H</b>	ard	ware and software: Laptop PC suitable for communicating with the ADCP and other devices for running
		e associated ADCP software in the field, and for communicating with office based PCs for subsequent data nsfer through Real Time interfacing (RS232, RS432, and RS485).
,		ification: a. Laptop should be make of standard brand and should have the following minimum
		Intel Core i7 Processor (2.8 GHz, 6 MB L2 cache, 1066 MHz FSB)
		15.6 or 14/14.1 inch TFT Screen; 4 USB Ports
		8 GB DDR3 RAM upgradeable to 16 GB or More
		HDD 500 GB 5400 rpm
		DVD Writer: Integrated 8X DVD Writer and Integrated Stereo
		Speaker, Key Board with Touch Pad.
		Windows 10 Operating System Preloaded and MS Office 2010 licensed copy software and Good quality Carry Bag will be part of delivery.
		With Blue Tooth Connectivity
		·
	U.	<b>Set-up:</b> Preparation of the instrument for data collection, setting of depth-cell size, number of depth cells and ping rate, averaging, storage interval. In case the instrument features in-built compass then software assisted compass calibration shall be supported. Set-up of bottom tracking
	1.	<b>Data collection:</b> The PC software shall control the data collection process, record the data in a file system on disk and report aberrations.
	2.	Monitoring: The collected data shall be graphically visualized.
	3.	Processing:
		Calculation of bin-wise discharge and total discharge
		User input/selection of extrapolation methods to bottom, surface and stream banks
		Display of input data and processing results in graphical and numerical format
		Having the capability of internal memory storage
	4.	<b>Data export:</b> Data export to spread sheet and ASCII formats shall be supported.
	6.	Accessories:
		Tools
		Spare parts
		Mounting brackets
		Shipping case

services under the contract to keep all the four ADCP"s in good working order:

The scope of work is as follows- M/s ......(Supplier) agrees to provide the following

(a) The services to be provided by the Supplier under this contract shall include maintenance, in accordance with the

terms and conditions laid down in the contract, of the ADCP system including all accessories and attachments of the equipments/ systems installed for getting the data at the sites and maintenance and up-gradation of all software installed in the ADCP, including/ providing of all required consumables, additional spare parts, repair of the defective equipment or the units/ parts thereof.

- (b) Purchaser or any authorized CWC officials working Under Lower Ganga Division-I, CWC, Patna shall notify Supplier of any errors and malfunctions, which occur and noticed when equipment are in use, by fax/telephone/e-mail/special messenger directly or through his Service Engineer(s) at his office address during normal working hours or at their residence after normal office hours and/or on holidays.
- (c) Supplier shall provide maintenance services to the Customer at the sites where these ADCPs are installed and attend the defect(s) reported by the Customer, within a period of 4 (Four) days on receipt of the written complaint or by fax and e—mail.
- (d) The Supplier shall, at his own cost, carry out repair of the defective equipment or parts thereof, to the satisfaction of the Customer and return the equipment after satisfactory repair within 15 (Fifteen) days from the date of written complaint/ request made. All charges towards collection, transportation of defective equipment, return of equipment after repair including cost of repair defective equipment or parts thereof, shall be borne by the Supplier and no charges on this account shall be paid by the Customer. The Supplier shall keep sufficient spares on stock to keep the ADCP in running condition during the repair of defective equipment.
- (e) Operating System (OS) Support: This contract is inclusive of OS support on all the ADCP systems covered under this contract. Any problem related with OS maintenance, reloading of OS with all device drivers, system configuration and network configuration will be attended and rectified by the Supplier. All required device drivers will be provided by the supplier including OS up-gradation.
- (f) Anti-Virus Software (AVS) Support: The contract includes the regular up gradation of all AVS during the CAMC on all the systems. Any problem related with AVS support will be attended and rectified by the Supplier. All required AVS support will be provided by the supplier.

### 6.0 Penalty Clauses during AMC:

- 6.1 Upon receipt of notification of defect in the system from Purchaser or any authorized CWC officials working under Lower Ganga Division-1, CWC Patna, if Supplier fails to take immediate corrective measures to rectify the defect, within the stipulated maximum response time stated above, the supplier is liable to pay penalty for unsatisfactory performance of maintenance services, in accordance with the criteria laid down below:
- 6.2 An ADCP continues to remain unattended by the Supplier for more than a day in excess of the time schedule of 4 days reckoned from the time of the fault detection and subsequent reporting by any means. An ADCP shall be treated as faulty if the supplier fails to respond within 5<sup>th</sup> days. Supplier is liable to pay penalty as below:
  - Penalty per ADCP per day = INR 1,000/- (Rupees One Thousand) only
- 6.3 If the Supplier fails to return the ADCP"s after satisfactory repairs within 15 days from date of complaint made, this will be considered as a failure of an ADCP. The supplier is liable to pay penalty as bellow:
  - Penalty per ADCP per day = INR 1,000/- (INR one Thousand) only
  - The maximum limit of the total penalty in a year on account of Clause 6.2 & 6.3 above shall be limited to the value of maintenance contract for corresponding year or 5 % of the total value of the contract whichever is higher.
- 6.4 The authority to decide the penalty shall be Executive Engineer, Lower Ganga Division-I, Central Water Commission, Patna.

#### 7.0 Terms of Payment:

- a) The Supplier agrees to maintain the system for a period of Five years i.e. from dd/mm/yyyy to dd/mm/yyyy beyond 2 years warranty period in accordance with the provisions laid out in the agreement and at the rates given below:-
- b) Any taxes and/or other Governmental levies as applicable or becoming applicable later due to or under any law shall be deducted from the above said amount. However the service tax as per actual will be paid by the supplier and same will be paid to the supplier by Customer on production/ submission of original copy of the receipt to the Co-supplier.
- c) The maintenance and repair cost shall be paid on half yearly basis on satisfactory performance of maintenance services for each completed half year period.
- d) The payment shall be made by Executive Engineer, Lower Ganga Division-1, CWC, Patna.

- e) The Supplier shall provide a Performance Guarantee in favor of Executive Engineer, Lower Ganga Division-1, CWC, Patna for an amount of 5% of the total value of the contract in the form of "Unconditional" & Irrevocable Bank Guarantee (on the Prescribed Form, which shall be made available along with Letter of Intent)" of any scheduled bank of India within 15 days from the issue of "Letter of Intent" to the successful bidder to commence the work.
- f) The Performance Guarantee submitted by the supplier shall be valid upto six months beyond the completion of maintenance contract as mentioned above.

#### 8.0 Other Terms and Conditions:

#### a) Period of Agreement

This maintenance contract agreement is initially for a period of 5 (Five) years i.e. from dd/mm/yyyy to dd/mm/yyyy beyond 2 years warranty period.

#### b) Renewal of Agreement

This agreement could, thereafter, be renewed for successive periods as mutually decided from time to time.

## c) Access to Purchaser's site/supplier's office & Records relates to past experience of such equipment in India.

The purchaser shall provide free access to the sites where the defect has occurred. (e.g. Remote Station equipment may be under lock & key for which the customer shall make sure that free access to such sites are made available for necessary actions at supplier's end). The customer will also arrange for the security clearance, wherever required in advance to ensure that supplier's engineers get the access to site immediately.

# (d) Spares/Equipments

The Purchaser has no spares/equipment for maintenance and Purchaser is not responsible for any import/ purchase of any of such components as required during the maintenance, the same shall also be the sole responsibility of the Supplier. If the Supplier fails to repair the equipment due to non-availability of the spares/ technological changes the same may be replaced by the Supplier with equivalent equipment/ spare of same specification and reputed make with prior permission of the Engineer-in-charge and the costs in this process shall be borne by the Supplier. Non-returning of the defective spares/ equipment after due repair within stipulated time as specified above shall attract the penalty as per Clause-2 of this Contract.

#### (e) Consumables

Supplier shall be responsible for providing & replacement of all consumable items like batteries of Laptop and ADCP Power Unit, cables, tubes, silica gel, connectors and other similar items.

#### (f) Force Majures

Failures arising of any circumstance not normal such as damages caused due to fire, theft, riots, accidents, floods or any other natural calamities and other exceptional circumstances shall be outside the previews of this agreement. However decision of the Engineer-in-charge about such failures shall be final.

#### (g) Periodical routine services

Periodical routine services at least half yearly shall be provided by the supplier in addition to one time performance check of all the ADCP at the time of ensuing CAMC agreement. If the unit performance is not satisfactory, supplier will arrange for repair / replacement of ADCP as required with full satisfaction of Engineer-in-charge.

#### (h) Jurisdiction

All disputes or differences between the Parties to this agreement, meaning or effect of this agreement of the respective rights and liabilities of the parties here to or their enforcement there under, shall be referred as per the provisions of the Indian Arbitration Act and only the courts in Patna shall have jurisdiction in all matters arising out of or connected with this agreement.

- (g) The personnel of Supplier will comply with all the security regulations in CWC premises.
- (h) All the maintenance calls will be informed to the Supplier. Service report will be given after attending/completing the each call.
- (i) Notices: Any notice given by one party to other pursuant to this Contract shall be sent to the other party in writing by registered post or fax confirmed in writing to the other party"s address specified in this contract.

#### (i) Termination for Insolvency

The Purchaser at any time terminates the Contract by giving written notice to the Supplier if the supplier becomes bankrupt or otherwise insolvent. In this event, termination will be without compensation to the Supplier, provided that such termination will not prejudice or affect any right of action or remedy which has accrued or will accrue thereafter to the Customer.

## (k) Termination for Convenience

The Purchaser, by written notice sent to the Supplier, may terminate the Contract, in whole or part, at any time for its convenience. The notice of termination shall specify that termination is for the Customer's convenience, the extent to which performance of the supplier under the Contract is terminated, and the date upon which such termination becomes effective.

#### (I) Termination for Default

The Purchaser, without prejudice to any other remedy for breach of contract, by written notice of default sent to Supplier, may terminate this contract in whole or in part.

- i) If the Supplier fails to perform any obligation(s) under this contract.
- ii) If the Supplier, in the judgment of the Customer has engaged in corrupt or fraudulent practices in completing for or in executing the contract.

For the purpose of this Clause:

"Corrupt practice" means the offering, giving, receiving or soliciting of anything of value to influence the action of a public official in contract execution.

"Fraudulent practice" means a misrepresentation of facts in order to influence the execution of contract to the detrimental of the Department.

- (n) If the Supplier has, without reasonable cause, suspended the progress of the work or has failed to proceed with the work with due diligence so that in the opinion of the Engineer-in-charge (which shall be final and binding) he will be unable to complete the work, the Customer may rescind or terminate the contract in whole or part thereof. The Customer shall be free to secure the completion of work by other Supplier. The Customer may without prejudice to his any other rights or remedy against the supplier may recover the cost of expenditure incurred by him in addition to the penalty as referred in Clause-2 of this contract.
- (o) The Supplier shall be responsible to make good all the damages caused to the existing equipment due to negligence.
- (p) In case of termination of contract due to insolvency and for default, the pending works shall be got done by the customer at the cost of the Supplier.

# (q) Subcontracts

The Supplier shall notify the Customer in writing of all subcontracts awarded under this contract and this shall not relieve any liability or obligation under the contract to the Supplier.

# (r) Assignment

The Supplier shall not assign, in whole or any part, its obligations to perform under this contract, to other supplier without prior written permission of the Department.

#### (s) Supplier's Obligations

The Supplier is obliged to work closely with the Department's staff, act within its own authority and abide by directives issued by the Department and implementation activities.

The Supplier will abide by the job safety measures prevalent in India and will free the Department from all the demands or responsibilities arising from accidents or loss of life the cause of which is the Supplier's negligence. The Supplier will pay all indemnities arising from such incidents and will not hold the Department responsible or obligated.

The Supplier is responsible for managing the activities of its personnel or sub-contracted personnel and will hold itself responsible for any misdemeanors.

The Supplier will treat as confidential all data and information about the Department, obtained in the execution of his responsibilities, in strict confidence and will not reveal such information to any other party without the prior written approval of the Department. The Governing language shall be English.

#### 9.0 Details required to be submitted with Technical Bid:

In addition to furnishing the technical details as required in bidding schedules, the bidder shall furnish following additional details with his technical offer:

- 9.1 The successful Bidder shall arrange installation, testing and commissioning of all the equipments after supply and also provide on site training on usage of the equipments as well as to handle minor problems to Lower Ganga Division-1, CWC, Patna's personnel.
- 9.2 The technical offer shall accompany detailed technical literature and leaflets of the equipments & accessories being offered against this bid enquiry by the bidder. The literature shall contain the detailed specifications of equipments and accessories as well as methodology/ analogy on which system/ equipment works. The formats of data presentation by the software shall also be included.
- 9.3 The documents of valid registration, contracts, authorization letter from original manufacturer, dealership certificate for arranging supply of stores/instruments etc should be supplied by the bidder.
- 9.4 The Bidder shall provide, along with Technical bid, a certificate from the manufacturer of the equipment that manufacturer will be able to supply all the necessary spares for at least for 8 years after installation, testing and commissioning of all the equipments and bidder shall also provide at least one on-site refresher training in addition to onsite training on usage of the equipments as well as to handle minor problems as and when required by the Executive Engineer, Lower Ganga Division-1, CWC, Patna during execution of contract.
- 9.5 The Bidder shall provide a letter of undertaking from each of the Original Equipment manufacturer (OEM) for the equipment supplier that in case the bidder authorized by them defaults in execution of this tender, the OEM(s) will take all steps for successful execution of the tender without any additional cost to the Govt.
- 9.6 All Technical, Operation and Maintenance Manuals shall be supplied in duplicate with the equipments Calibration, Tool Kit and carrying case shall be supplied with the equipments. The recommended list of spares for running and maintenance for one year after 'On Site Warranty' period shall be given in the prescribed schedule. Delivery period after placement of the order shall be indicated.

# 10.0 Rates, Prices & Payments:

- 10.1 The rates to be quoted shall reflect the element of basic price as well as taxes and duties, if any. The taxes & duties payable as well as the freight, Insurance during transit, packing & forwarding charges etc shall be shown separately. All the rates shall be quoted in Indian Rupees. However, the necessary document for Custom clearance or any other related purpose shall be arranged by the Executive Engineer, Lower Ganga Division-1, CWC, Patna on written request by the contractor for the items required for this work.
- 10.2 Prices shall be F.O.R. to Installation sites with shipment by required mode of transportation inclusive of freight, insurance packaging and forwarding charges.
- 10.3 The rates quoted shall be written both in figures in words. If there is any discrepancy in the rates quoted in figures and words, the rates quoted in words would be considered.
- 10.4 All equipment shall be delivered to the site-"Baltara"
- 10.5 The Agent's Commission is not payable.
- 10.6 The rates and prices quoted shall be inclusive of all other incidental charges, if any. No payment will be made for goods rejected at site on testing.
- 10.7 The rates quoted by the bidder shall remain firm during the execution of entire work of supply, installation, testing and commissioning and shall deem to have incorporated fluctuations in the cost of labour, equipment, materials etc required for the aforesaid work.
- 10.8 The prices to be quoted by the Bidders shall be for the same unit as indicated in the 'Schedules'.
- 10.9 Income tax & Service tax shall be deducted at source from the bills of the Supplier as per the prevailing rates.
- 10.10 **Payment**: The payment shall be made through PFMS by Executive Engineer, Lower Ganga Division-1, CWC, Patna as per following schedule:
  - On submission of original invoices along with mandate form/cancelled cheque, commercial certificate, declaration by seller etc for successful delivery of equipments & accessories at installation sites @ 30 % of the total amount of the equipments.
- 2) After successful installation, testing & commissioning of the equipments and accessories and onsite training to Lower Ganga Division-1, CWC, Patna's personnel @ 60 % of the total amount of the equipments.

- Balance payment @ 10% of the total amount of the equipments value will be made after successful completion
  of "On Site Warranty period" of the equipments.
- 10.11 Release of Performance Guarantee: The Performance Guarantee shall be released six months after the expiry of prescribed On Site Warranty Period and AMC Period as stipulated in bid documents read in conjunction with 7.0 (e) & (f) above.
- 10.12 The recommended spares for running & maintenance of equipments for a period of three years after 'On Site Warranty Period' shall be quoted in appropriate schedules of bidding documents.
- 10.13 The consignee shall as soon as possible, but not later than 30 days of the date of arrival of stores at destination, notify the bidder of any loss or damage to the stores that may have occurred during transit.
- 10.14 Quoted Prices shall include any other software/hardware required to run offered software to down load data from data logger and analysis the data.
- 10.15 The charges for post warranty AMC, which should not be less than 3 % per year of the cost of equipment, shall be payable half yearly after the end of each half year on satisfactory performance of AMC by the supplier

#### 11.0. ENTIRE AGREEMENT & SERVICEABILITY:

This agreement constitutes the entire agreement between the parties with respect to the subject matter hereof taking precedence over and in continuation of any prior or contemporaneous written agreements of understanding. Unless otherwise provided herein, this agreement shall not be modified, amended, rescinded, or waived, in whole or part, except by a written instrument signed by the authorized representatives of both parties.

In witness whereof, the parties have executed this agreement as of the date indicated below:

For Supplier	For Purchaser
(M/s)	(Central Water Commission)
Signed:	Signed
Name:	Name:
Title:	Title:
Station:	Station:
Date:	Date:
In the presence of:	In the presence of:

# Special Instructions to the Contractors/Bidders for the e-submission of the bids online through this e-Procurement Portal

- Bidder should do Online Enrolment in this Portal using the option Click Here to Enroll available in the Home Page.
  Then the Digital Signature enrollment has to be done with the e-token, after logging into the portal. The e-token may be obtained from one of the authorized Certifying Authorities such as eMudhraCA/ GNFC/ IDRBT/ MtnlTrustline/ SafeScrpt/ TCS.
- 2. Bidder then logs into the portal giving user id / password chosen during enrollment.
- 3. The e-token that is registered should be used by the bidder and should not be misused by others.
- 4. DSC once mapped to an account cannot be remapped to any other account. It can only be Inactivated.
- 5. The Bidders can update well in advance, the documents such as certificates, purchase order details etc., under My **Documents** option and these can be selected as per tender requirements and then attached along with bid documents during bid submission. This will ensure lesser upload of bid documents.
- 6. After downloading / getting the tender schedules, the Bidder should go through them carefully and then submit the documents as per the tender document, otherwise, the bid will be rejected.
- 7. The BOQ template must not be modified/replaced by the bidder and the same should be uploaded after filling the relevant coulmns, else the bidder is liable to be rejected for that tender. Bidders are allowed to enter the Bidder Name and Values only.
- 8. If there are any clarifications, this may be obtained online through the e-Procurement Portal, or through the contact details given in the tender document. Bidder should take into account of the corrigendum published before submitting the bids online.
- 9. Bidder, in advance, should prepare the bid documents to be submitted as indicated in the tender schedule and they should be in PDF/XLS/RAR/DWF formats. If there is more than one document, they can be clubbed together.
- 10. Bidder should arrange for the EMD as specified in the tender. The original should be posted/couriered/given in person to the Tender Inviting Authority, within the bid submission date and time for the tender.
- 11. The bidder reads the terms and conditions and accepts the same to proceed further to submit the bids
- 12. The bidder has to submit the tender document(s) online well in advance before the prescribed time to avoid any delay or problem during the bid submission process.
- 13. There is no limit on the size of the file uploaded at the server end. However, the upload is decided on the Memory available at the Client System as well as the Network bandwidth available at the client side at that point of time. In order to reduce the file size, bidders are suggested to scan the documents in 75-100 DPI so that the clarity is maintained and also the size of file also gets reduced. This will help in quick uploading even at very low bandwidth speeds.
- 14. It is important to note that, the bidder has to Click on the Freeze Bid Button, to ensure that he/she completes the Bid Submission Process. Bids Which are not Frozen are considered as Incomplete/Invalid bids and are not considered for evaluation purposes.
- 15. In case of Offline payments, the details of the Earnest Money Deposit(EMD) document submitted physically to the Department and the scanned copies furnished at the time of bid submission online should be the same otherwise the Tender will be summarily rejected
- 16. The **Tender Inviting Authority (TIA)** will not be held responsible for any sort of delay or the difficulties faced during the submission of bids online by the bidders due to local issues.
- 17. The bidder may submit the bid documents online mode only, through this portal. Offline documents will not be handled through this system.
- 18. At the time of freezing the bid, the e-Procurement system will give a successful bid updation message after uploading all the bid documents submitted and then a bid summary will be shown with the bid no, date & time of submission of the bid with all other relevant details. The documents submitted by the bidders will be digitally signed using the e-token of the bidder and then submitted.

- 19. After the bid submission, the bid summary has to be printed and kept as an acknowledgement as a token of the submission of the bid. The bid summary will act as a proof of bid submission for a tender floated and will also act as an entry point to participate in the bid opening event.
- 20. Successful bid submission from the system means, the bids as uploaded by the bidder is received and stored in the system. System does not certify for its correctness.
- 21. The bidder should see that the bid documents submitted should be free from virus and if the documents could not be opened, due to virus, during tender opening, the bid is liable to be rejected
- 22. The time that is displayed from the server clock at the top of the tender Portal, will be valid for all actions of requesting bid submission, bid opening etc., in the e-Procurement portal. The Time followed in this portal is as per Indian Standard Time (IST) which is GMT+5:30. The bidders should adhere to this time during bid submission.
- 23. All the data being entered by the bidders would be encrypted at the client end, and the software uses PKI encryption techniques to ensure the secrecy of the data. The data entered will not be viewable by unauthorized persons during bid submission and not viewable by any one until the time of bid opening. Overall, the submitted bid documents become readable only after the tender opening by the authorized individual.
- 24. During transmission of bid document, the confidentiality of the bids is maintained since the data is transferred over secured Socket Layer(SSL) with 256 bit encryption technology. Data encryption of sensitive fields is also done.
- 25. The bidders are requested to submit the bids through online e-Procurement system to the TIA well before the bid submission end date and time (as per Server System Clock).

# Schedule-T (ADCP)

# Technical Specifications for 1 No. of Acoustic Doppler Current Profiler being offered (To be submitted along with Technical Bid)

I	Technology	Specificatio ns offered by the bidders	Whether matching as per tender document	
1	ADCP system for current & discharge measurements with wireless capability	Currents & Discharge measurement from a moving platform with automatic adaptive sampling based on flow conditions, requiring no manual intervention. Customizable: A manual override, to allow the user to fully customize the system Featuring a flat transducer face for reduced size, weight and flow disturbance Operating modes, broadband, pulse coherent and automatic Bluetooth wireless communication for a cable-free operation The system should be operable from a sailing boat/bridge or cable way.		
II	ADCP	C (500 1000 1 H )		
1	Frequency requirement	Operating on a frequency of 500-1200 kHz, to perform measurements in a wide range of river conditions from shallow 0.4m deep streams to rushing rivers and tidal estuaries, without compromising on the resolution.		
2	Water profiling range	0.4m to 40 m		
3	Velocity accuracy	+/- 0.25% of the water velocity relative to ADCP, ±2mm/s		
4	Deployment	fitted on a Trimaran float option for over-the-side mount		
5	Velocity range	Measure water velocities of up to 5m/s		
6	Data output Rate Number of depth	Data output rate of up to 2 Hz Up to 128 cells		
7	cells	10 11 1707		
8	Depth Cell size Bottom tracking operation mode	10 cms minimum, automatically controlled by ADCP Broadband or Pulse Incoherent		
	Velocity range	Up to 9m/s		
	Depth range	0.4m to 80 m		
	Accuracy	±0.25% of bottom velocity relative to ADCP, ±2mm/s		
III	Transducer	Di di mata di Male Tana di Garati G		
	1. Type	Phased array transducer or Multi Transducer configuration for reduced size, weight and flow disturbance Phased array (flat surface) or Multi Transducer Dedicated vertical beam for depth measurement up.		
	2. Vertical beam	configuration Janus four beams at 20° or 30° to beam angle 80m		
	3. Float	Floating Platform-Trimaran Polyethylene type (3-hull) float or equivalent highly resistant to flipping /Submersion and suitable for discharge measurements in water velocities up to 5m/s and tomaintain the ADCP transducer at a constant depthin the water with minimal water flow disturbance. To house battery and optional GPS  Bare Weight of float ~10Kgs		
	4. Internal 16 MB internal memory			
	memory  5 Communications RS 222 Physicoth or Padio Communication			
IV	5.Communications  Standard sensors	RS-232 Bluetooth or Radio Communication		
1 V	Stanuaru sensors	Range from -5° to 45°C,		
	1. Temperature	Accuracy ±0.5°C,		
		Resolution 0.01°		
	2. Tilt	Range ±90°,		

		Accuracy ±0.3°,					
		Resolution 0.02°					
	3. Compass	Range 0-360°					
	(fluxgate type)	Accuracy ±2°,					
		Resolution 0.01°					
V	Power						
	1. DC Point	12V DC to 18V DC, power not exceeding 1.5W					
	2.Communications	RS-232, 1200 to 115,200 baud. Bluetooth,115,200baud, 200m					
	Software	range.					
VI	DGPS						
	1. DGPS	Smart Antena DGPS in single housing					
	2. GPS	GPS interface with ADCP s/w, for positioning and moving bed					
	Integration	applications					
VII.	Hardware and	Laptop PC suitable for communicating with the ADCP and					
	software	other devices for running the associated ADCP software in					
		the field, and for communicating with office based PCs for					
		subsequent data transfer through Real Time interfacing (RS232,					
		RS432, RS485). should be make of standard brand and should have the following minimum specification:					
	A. Laptop	☐ Intel Core i7 Processor (2.8 GHz, 6 MB L2 cache, 1066					
		MHz FSB)					
		☐ 15.6 or 14/14.1 inch TFT Screen; 4 USB Ports					
		□ 8 GB DDR3 RAM upgradeable to 16 GB or More					
		□ HDD 500 GB 5400 rpm					
		□ DVD Writer: Integrated 8X DVD Writer and					
		Integrated Stereo					
		☐ Speaker, Key Board with Touch Pad.					
		☐ Windows 10 Operating System Preloaded and MS Office					
		2010 licensed copy software and Good quality Carry Bag will					
		be part of delivery.					
	<b>7</b> G .	☐ With Blue Tooth Connectivity					
	B. Set-up:	depth cells and ping rate, averaging, storage interval. In case the					
		instrument features in-built compass then software assisted compass calibration shall be supported. Set- up of bottom					
		tracking					
	C. Data	The PC software shall control the data collection process,					
	collection:	record the data in a file system on disk and report aberrations.					
	D. Monitoring:	The collected data shall be graphically visualized					
	E. Processing:	☐ Calculation of bin-wise discharge and total discharge					
		<ul> <li>User input/selection of extrapolation methods to bottom, surface and stream banks</li> </ul>					
		☐ Display of input data and processing results in graphical and					
		numerical format					
		☐ Having the capability of internal memory storage					
	F. Data export:	Data export to spread sheet and ASCII formats shall be					
	G. Accessories:	supported.					
		☐ Spare parts					
		☐ Mounting brackets					
		☐ Shipping case					
Dat	e:						
Plac	ce:						
		(Signature of Bidder along with Seal of the Company)					
		(Signature of Diduer along with Seal of the C	ompany)				

# Schedule - F (ADCP)

# FINANCIAL BID/BOQ

# Table A

Sl. No.	Description of Item	Unit	Rate in INR [Inclusive of all taxes] (In figure & words)	Quantity	Amount in INR. [Inclusive of all taxes]		
					In figure	In words	
1	Supply, Installation, Testing, Commissioning and Maintenance of Acoustic Doppler Current Profiler & Its Accessories with DGPS at various sites under Lower Ganga Division-1, CWC, Patna			1			

# Table B

Sl.No.	Description of Item	Unit	Rate in INR (In figure & words) inclusive of all taxes  1st yr   2nd yr   3rd yr   4th yr   5th yr		Total amount per unit (in INR) inclusive of all taxes	Qty	Total amount for AMC for 1 Unit for 5 Years (in INR), (In figures and words)			
2 fo	Comprehensive Annual Maintenance Charges for 5 Years including replacement of material & Consumables and services beyond 2 years onsite warranty period	Per set			J - J -	, ,			1	inclusive of all taxes

### Table C

Sl.No.	Description of Item	Amount in INR (In figure) inclusive of all taxes	Amount in INR (In words) inclusive of all taxes
3.	Total Amount as per Table A above		
4.	Total Amount as per Table B above		
5.	Grand Total		

# All the prices must be in both words and figures

The evaluation for determining the lowest bid shall include:

- (a) The cost of equipment at final destination;
- (b) Cost of installation, testing, commissioning, maintenance and training and any other services essential for completion of works;
- (c) All the taxes, octroy, levies etc. as applicable;
- (d) Cost of essential spares/consumables required for running & maintenance of all the equipments for two years or the warranty period, whichever is later; and
- (e) Cost of Annual maintenance contract for each equipment including replacement of defective material for next five (5) years beyond onsite warranty period.
- (f) Financial bid without giving the above mentioned detail will summarily be rejected.