

TENDER DOCUMENT

FOR

DEVELOPMENT OF NAVIGATIONAL CHANNEL BY QUANTITY BASED DREDGING BETWEEN NAYAGHAT - GUPTARGHAT STRETCH OF NATIONAL WATERWAY NO-40 (RIVER GHAGHRA) FOR F.Y- 2024-25 & F.Y- 2025-26

TENDER NO. - IWAI/PTN/Dredging/Nayaghat-Guptarghat/River Ghaghra/2024-25



July 2024

Address of Issuing Office

**INLAND WATERWAYS AUTHORITY OF INDIA
(Ministry of Ports, Shipping & Waterways, Govt. of India)
Gaighat, Patna – 800007
E-mail address: dirpat@iwai.gov.in**

Head Office

**INLAND WATERWAYS AUTHORITY OF INDIA
(Ministry of Ports Shipping & Waterways, Govt. of India)
A – 13, Sector – 1, Noida-201 301 (U.P.)
Website: www.iwai.nic.in , <https://eprocure.gov.in/eprocure/app>.**

Sl. No.	Details
1.	BID DATA SHEET for Key Dates and Check List
2.	Tender issue letter
3.	Notice Inviting Tender
4.	Part-I
	(i)Tender Acceptance Letter
	(ii) Form of Tender
5.	Instruction to bidders (ITB) for submission of bid
6.	Part-II : General Conditions
	(i). Integrity Pact
	(ii). Schedules
	(iii). General conditions of contract
7.	Part-III : Technical Specifications & Special Conditions for ;
	PART A – Scope of Work
	Technical specifications and special conditions
	Other conditions for Dredging / excavation Work
8.	Part-IV : Drawings and Annexures
	Enclosure.1: Index Map of NW-40 Enclosure.2 : Index Map of Nayaghat–Guptarghat Enclosure. 3 :Locations of Site – Chainage wise details of proposed work Annexure-1 : Bank Guarantee Proforma for Furnishing EMD Annexure-2 : Declaration by the Bidder Annexure-3 : Details of Past Experience of Contractor for Similar Works Annexure-4 : Concurrent Commitments of The Bidder Annexure-5 : List of CSD's &Plant &equipment proposed for the Work Annexure-6 : List of Key Personnel proposed to be deployed Annexure-7 : Agreement Format Annexure-8 : B.G. Proforma for Furnishing Performance Guarantee Annexure-9 : B.G. Proforma for Drawing Work Advance Annexure-10 : Sample Form for Site Orders Book Annexure-11 : Proforma for Hindrance Register Annexure-12 : Notice for Appointment of Arbitrator
9.	Part-V : Schedule of Quantities / Financial Bid
	Bill of Quantities

1. BID DATA SHEET FOR KEY DATES AND CHECKLIST

Particulars	Description
Employer	Chairman, Inland Waterways Authority of India(IWAI), Gaighat Patna-800007 (Bihar)
Method of Selection	Least Cost System (LCS) selection method.
Name of the Work	Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26
a) Closing date for submission of Bid and mode b) Address for submission of hard copy of POA & payment instruments	Date :11.07.2024 Time : 1500 hrs (IST) Submission : Online submission The Chief Engineer, Inland Waterways Authority Of India, Gaighat, Patna, Bihar, PIN: 800007
PREBID MEETING	09.07.2024 at 1500 hrs.
Estimated cost of this work	INR 3,72,78,245.00 (Excl. GST)
EMD	INR 7,45,565/- (i.e. 2% of estimated cost of work i.e INR 3,72,78,245) EMD for the above mentioned amount shall be deposited to Inland Waterways Authority of India through RTGS / NEFT in the following account i.) Name of Bank Account: IWAI FUND ii.)Bank Name and Address:.. Canara Bank, Main Branch, South Gandhi Maidan, Patna- 800001 iii.) Bank Account Number: 0352105000002 iv.) IFSC: CNRB0000352 v.) MICR Code: 800015002 However, Micro and Small Enterprises (MSEs) as defined in MSE Procurement Policy issued by Department of Micro, Small and Medium Enterprises (MSME) or Start-ups as recognized by Department for Promotion of Industrial and Internal Trade (DPIIT) are exempt from submitting the EMD, on submission of documents to the extent as per the Government of India notifications.
Tender Fee	INR 5,900/- (Rs. Five Thousand Nine Hundred Only) including GST@18%, However, Micro and Small Enterprises (MSEs) as defined in MSE Procurement Policy issued by Department of Micro, Small and Medium Enterprises (MSME) or Start-ups as recognized by Department for Promotion of Industrial and Internal Trade (DPIIT) are exempt from submitting the tender fee / cost of tender document, on submission of documents to the extent as per the Government of India notifications. Tender fee for the above mentioned amount shall be deposited to Inland Waterways Authority of India through RTGS / NEFT in the following account: i.) Name of Bank Account: IWAI FUND ii.)Bank Name and Address:.. Canara Bank, Main Branch, South Gandhi Maidan, Patna- 800001 iii.) Bank Account Number: 0352105000002 iv.) IFSC: CNRB0000352 v.) MICR Code: 800015002

Particulars	Description
Minimum Bank Solvency	INR 1,49,11,298/- (i.e. 40% of the estimated cost of this work = INR 3,72,78,245 x 0.40) Bank Solvency certificate should not be older than Six(06) months from the Bid submission last date from a nationalized/scheduled bank in India
Bid Validity Period	120 days after last date of Bid Submission
Similar Works	“Similar Works” such as Dredging experience pertaining to port /river/lakes/canals/water bodies including management and manning of dredgers or river dredging vessel related marine works or Wet excavation in Dams
Authorized Representative	Name: Chief Engineer, IWAI, Patna
Contract Duration	24 months.
Bid Opening date	Date : 19.07.2024 Time : 1530 hrs
Document required for Technical bid Evaluation.	<ol style="list-style-type: none"> 1. Scanned copy of UTR no of payment towards tender cost and EMD or exemption document proof. 2. Bank solvency with issuing bank authority for verification. 3. Tender acceptance letter on letter head with scanned tender document with seal and signature. 4. Duly signed tender form and Self Declaration for Undertaking for not blacklisted from any department. 5. Copy of valid Registration certificate. 6. Audit report/balance sheet/Financial turn over/IT return for last 3 years (2021-22, 2022-23 & 2023-24). 7. PAN and GST registration copy. 8. Prequalification work experience document (Work order &Completion Certificate). 9. Local office and establishment details. 10. Authorization letter for bidding, negotiation, signing of agreement and execution work (as the case maybe).
Location of Assignment	Nayaghat - Guptarghat stretch in National Waterway No.40(River Ghaghra) in U.P.

Particulars	Description
Price Preference	Since Splitting of scope / quantity of work is not feasible keeping in View the nature of work involved, price preference clause for MSME registered firms / bidders will not be applicable.
Performance Guarantee	5% of the tendered value of the work as performance security in the form of either RTGS/NEFT payable at any nationalized/schedule bank OR an irrevocable bank guarantee bond of any scheduled bank or State Bank of India in accordance with the form prescribed within 15 days of the issue of the work order.
Security Deposit	A sum @ 10% of Bill amount shall be deducted from each running bill of the contractor till the sum reaches 5% of the contract value of the work. As per GFR, Manual for Procurement of Works 2019.
Time schedule	<ul style="list-style-type: none"> • Remittance of Performance security within 15 days from date of issue of LoA • Signing of agreement within 15 days from date of issue of LoA • Commencement of work within 45 days from issuance of LoA. • Work will be completed as per specifications within 24 months from the date of issue of Work order.
Liquidated Damages (Clause - 35 of GCC)	<p>The liquidated damages for the whole of the Works are 10% (Ten Percent) of the final Contract Price.</p> <ol style="list-style-type: none"> a. The Engineer in-charge or his representative will allocate the next shoal to be dredged along with the pre-dredging survey chart and estimated quantity to be dredged along with the estimated time of completion of that shoal. b. After the pre-dredging survey is carried out and quantity of dredging and time required for dredging is assessed, EIC will intimate the same in writing to the contractor c. If the contractor fails to maintain the required progress or to complete the shoal allocated within the estimated time of completion or extended date of completion, he shall, without prejudice to any other right or remedy available under the law to the authority on account of such breach, pay as agreed liquidated damages the amount calculated at the rates stipulated here under. d. The liquidated damages will be calculated on the delay of

	<p>particular location (shoal) on the value of dredging carried out on that location (shoal).</p> <p>(i) Liquidated Damages- For the first one month after the end date of the shoal LD @ 1.5% per month (pro-rata on day basis) will be levied. This will be computed on the value of the dredging to be carried out on that location (Shoal). Thereafter i.e. delay more than one month will attract LD @ 1.5 % per month of delay on contract value and to be computed on per day basis</p> <p>e. Provided always that the total amount of compensation for delay to be paid under this condition shall not exceed 10% of the Awarded Value of work.</p> <p>f. Engineer-In- Charge’s decision in writing shall be final & binding, may decide on the amount of tendered value of the work for every completed day/month (as applicable) that the progress remains below that specified or that the work remains incomplete.</p> <p>g. Engineer-in-charge will make available to the contractor the site to enable the contractor to commence & proceed with the execution of the work in accordance with agreed program. If there is any delay in making available any area of the work the EIC shall grant reasonable extension of time for completion of work. But the contractor shall not claim any compensation whatsoever on this account.</p> <p>h. The amount of liquidated damages may be adjusted or set-off against any sum payable to the Contractor under this or any other contract with the authority.</p> <p>i. The condition of persistent failure to execute the CONTRACT, and when the Total Amount of the Payment reduction & Liquidated Damages applied under the contract reach’s TEN (10 %) percent of the Contract Amount, the owner reserves the right to issue the NOTICE OF TERMINATION OF CONTRACT</p>
<p>Make in India</p>	<p>As per policy of Govt. of India to encourage ‘Make in India ‘and Promote manufacturing and production of goods and services in India, the provisions vide order no. P-45021/2/2017-PP(B.E-II) dated 29.05.2019 on the subject “Public Procurement (Preference to Make in India), Order 2017 – Revision” shall be fully applicable.</p>



INLAND WATERWAYS AUTHORITY OF INDIA
(Ministry of Ports, Shipping & Waterways, Govt. of India)
Gaighat, Patna – 800007
E-mail address: dirpat@iwai.gov.in
Websites: www.iwai.nic.in and https://eprocure.gov.in/eprocure/app.

2. TENDER ISSUE LETTER

Tender No: IWAI/PTN/Dredging/Nayaghat-Guptarghat/River Ghaghra/2024-25

To,

.....
.....
.....
.....

**Sub: Development of navigational channel by quantity based dredging between Nayaghat -
Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y-
2025-26**

Ref: Your letter no....., Dated:.....

Sir,

With reference to your letter cited above on the subject, please find enclosed herewith one set off tender document for the subject work. You are requested to go through the terms and conditions carefully and also visit the site to familiarize and submit your tender as per procedure explained therein.

The tender document can be downloaded from the IWAI's website www.iwai.nic.in and CPP Portal Website <https://eprocure.gov.in/eprocure/app>. The last date for submission of e- tender is on 18.07.2024 up to 3.00 PM. The Bids will be placed only online at <https://eprocure.gov.in/eprocure/app>. Issuance of tender document will not construe that such bidders are automatically considered qualified.

Yours faithfully

Chief Engineer

INLAND WATERWAYS AUTHORITY OF INDIA
(Ministry of Ports, Shipping & Waterways, Govt. of India)
Gaighat, Patna – 800007

E-mail address: dirpat@iwai.gov.in

Websites: www.iwai.nic.in and <https://eprocure.gov.in/eprocure/app>

3. NOTICE INVITING TENDER

TENDER NO. - IWAI/PTN/Dredging/Nayaghat-Guptarghat/River Ghaghra/2024-25

Name of Work: Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26

1. Inland Waterways Authority of India (IWAI) invites e-tenders in two cover system (Cover I - Technical bid and Cover II - Financial Bid) from experienced and resourceful Contractors for the work of “Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26”
2. Estimated Cost of the work is as under:

Sl. No.	Name of the work	Estimated Cost (Rs. in Lakh)	EMD (in lakh)	Duration of work (in months)
1.	Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no - 40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26	Rs.373.00 (Exclusive of GST)	Rs.7.46/-	24

3. Download of tender document : from 1830 hrs on 04.07.2024
4. Bid Submission start date &Time : 04.07.2024 at 1840 hrs
5. Bid Closing/Document Download End Date &Time : 1500 hrs on 18.07.2024
6. Bid Opening Date &Time : 19.07.2024 at 1530 hrs.

TERMS & CONDITIONS:-

The tender document can be downloaded from the IWAI’s website www.iwai.nic.in and CPP Portal Website <https://eprocure.gov.in/eprocure/app>. Bidders participating e-tender process are required to furnish a non-refundable deposit of Rs.5,900/- (Rupees Five thousand nine hundred only) inclusive of 18% GST (i.e. INR 5000/- tender fee + INR 900/- GST @ 18%) & through RTGS in the following bank particulars and submitted the proof along with UTR No. towards the remittance of payment of tender cost and upload a copy of the same in Technical Bid, on or before the last date and time of submission of tender. However, Micro and Small Enterprises (MSEs) as defined in MSE Procurement Policy issued by Department of Micro, Small and Medium Enterprises (MSME) or Start-ups as recognized by Department for Promotion of Industrial and Internal Trade (DPIIT) are exempt from submitting the Tender Fee / cost of Tender document, on submission of documents to the extent as per the Government of India notifications in this regard.

7. Tender fee shall be deposited to Inland Waterways Authority of India through RTGS / NEFT as mentioned in the Bid Data Sheet in the following account:

i) Name of Bank Account: IWAI FUND

ii) Bank Name and Address: Canara Bank, Main Branch, South Gandhi Maidan, Patna- 800001

iii) Bank Account Number: 0352105000002

iv) IFSC: CNRB0000352

v) MICR Code: 800015002

8. The Bids are to be submitted only online at <https://eprocure.gov.in/eprocure/app>.

9. The tenderer shall meet the following criteria:

- i. The tenderer shall be registered in appropriate class with CPWD, Railways, MES, State PWD / Irrigation Department, Port Trust etc., or shall have required experience in similar works namely dredging on rivers / canals / reservoir / ports / inland waterways and construction of bank protection under Irrigation / any State Government departments etc., executed in canals / rivers.
- ii. Tenderer shall have Permanent Account Number issued by Income Tax Dept. and must be an assessee.
- iii. Average annual financial turnover during last three years ending 31st March of the previous financial year should be at least 30% of the estimated cost. Experience of having successfully completed similar works during last 7 years ending last day of month previous to the one in which this tender is invited should be either of following:
 - a. Three similar works costing not less than 40% of the estimated cost (i.e. INR 1,49,11,298/-); or Dredged Quantity of 48,800 cum
 - b. Two similar works costing not less than 50% of the estimated cost; (i.e. INR 1,86,39,122.5/-); or Dredged Quantity of 61,000 cum
 - c. One similar work completed not less than 80% of the estimated cost (i.e. INR 2,98,22,596/-); or Dredged Quantity of 97,600 cum

AND

One completed work costing not less than the amount equal to 40% of the estimated cost put to tender with some Central Government Department/State Government Department/ Central Autonomous Body/ State Autonomous Body/ Central Public Sector Undertaking/ State Public Sector Undertaking/City Development Authority/ Municipal Corporation of City formed under any Act by Central/ State Government and published in Central/State Gazette.

Note: The successful completion of the similar work should be supported with a completion certificate issued by the department/ agency for whom the work has been executed.

- iv. Latest solvency certificate should not be older than six(06) months from the Bid submission last date from Nationalized / Scheduled Bank in India included in the Second Schedule of the RBI Act for not less than 40% of the estimated cost of the work as mentioned in the Bid Datasheet.
- v. Average annual financial turnover on contract works should be at least 30% of the estimated cost during the immediate last 3 consecutive financial years and should not have incurred any loss in more than two years during the last five years ending March of the previous financial year.
- vi. The tenderer shall furnish the Tender Cost and Earnest Money Deposit through RTGS (in IWAI Account) before closing date and time of submission of tender. Any/all submissions made without the Earnest Money Deposit and without the Tender Cost and / or received after the closing date mentioned shall be rejected.
- vii. Tender cost and EMD are exempted for SSI units or MSEs registered with Central Purchase Organization or the concerned Ministry or Department or Start-ups as recognized by Department

for Promotion of Industrial and Internal Trade (DPIIT) & copies of same shall be uploaded to avail benefit of exemption.

10. A pre-bid meeting will be held at **Office of the Inland Waterway Authority of India Patna** on 09.07.2024. The bidders are advised to visit the project site prior to the pre-bid meeting by contacting the Regional Office of IWAI at Patna. The minute of the pre-bid meeting will form part of the tender document therefore prospective bidders are requested to essentially attend the pre-bid meeting.
11. IWAI reserves the right to accept or reject any or all tenders fully & split the work without assigning any reason and no correspondence shall be entertained in this regard.

Chief Engineer

PART – I

4. (i) Tender Acceptance Letter
(ii) Form of Tender
5. Instruction to Bidders for submission of bid

PART-I

**4 (i) TENDER ACCEPTANCE LETTER
(To be given on Company Letter Head)**

Date:

To,

The Chief Engineer,
Inland Waterways Authority of India Gaighat,
Patna-800007

Sub Acceptance of Terms & Conditions of Tender.

Tender Reference No. IWAI/PTN/Dredging/Nayaghat-Guptarghat/River Ghaghra/2024-25

Name of Tender/ Work: Development of navigational channel by quantity based dredging between Nayaghat -
Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 &
F.Y- 2025-26

Dear Sir,

1. I/ We have downloaded / obtained the tender document(s) for the above mentioned Tender/ Work' from the web site(s) namely: www.iwai.nic.in OR <https://eprocure.gov.in/eprocure/appas> per your advertisement, given in the above mentioned website(s).
2. I / We hereby certify that I / we have read the entire terms and conditions of the tender Documents from Page No. _____ to _____ (including all documents like annexure(s), schedule(s), etc.), which form part of the contract agreement and I / we shall abide hereby by the terms / conditions / clauses contained therein.
3. I / We hereby unconditionally accept the tender conditions of above mentioned tender document(s) / minutes of the pre-bid meeting/ corrigendum(s) in its totality / entirety.
4. In case any provisions of this tender are found violated, then your department/ organization shall without prejudice to any other right or remedy be at liberty to reject this tender/bid including the forfeiture of the full said earnest money deposit absolutely.

Yours Faithfully,

(Signature of the Bidder, with Official Seal)

4 (ii). FORM OF TENDER

To,

The Chief Engineer,
Inland Waterways Authority of India
Gaighat, Patna-800007

Name of Tender/ Work: Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26

1. Having visited the site and examined the information and instruction for submission of tender, general conditions of contract, Special Condition of contract, Technical, General and Detailed specification, Schedules and Bill of Quantities, agreement and bank guarantee forms, etc. for the above named works, I/ We hereby tender for execution of the work referred to in the tender document in conformity with the said Conditions of Contract, Specifications, Schedule of quantities for the sum as stated in Bill of quantities of this tender Document or such other sum as may be ascertained in accordance with the said conditions of contract.
2. I/ We undertake to complete and Deliver the whole of the works comprised in the Contract within the time as stated in the tender and also in accordance in all respects with the specifications, designs, drawings and instructions as mentioned in the tender documents.
3. We are registered SSI units / MSEs registered with Central Purchase Organization / the concerned Ministry / Department / Start-ups as recognized by Department for Promotion of Industrial and Internal Trade (DPIIT) and Tender fees is exempted for submission of tender cost and EMD. Copies of same are also uploaded to avail benefit of exemption.

OR

I am tendering for the work mentioned in the table below duly furnishing Earnest Money Deposit (EMD) of INR 7,45,565/- (i.e. 2% of estimated cost of work) through RTGS in the following bank particulars.

- i.) Name of Bank Account: IWAI FUND
- ii.) Bank Name and Address: Canara Bank, Main Branch, South Gandhi Maidan, Patna- 800001
- iii.) Bank Account Number: 0352105000002
- iv.) IFSC: CNRB0000352
- v.) MICR Code: 800015002

Sl. No.	Name of the work	Details of EMD amount remitted (Rs. in lakhs)	Particulars of RTGS transfer along with UTR No. / BG Details	Name of the Bank
1	Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no. - 40 (River Ghaghra)			

4. I/ We agree to abide by this tender. I/ We agree to keep the tender open for a period of 120 days from the last date of submission of bid or extension thereto as required by the IWAI and not to make any modifications in its term and conditions.

5. I/ We agree, if I/ we fail to keep the validity of the tender open as aforesaid or I/ we make any modifications in the terms and conditions of my/ our tender if I/ We fail to commence the execution of the works as above, I/ We shall become liable for forfeiture of my/ our Earnest money, as aforesaid and IWAI shall without any prejudice to any other right or remedy, be at the liberty to forfeit the said Earnest Money absolutely otherwise the said earnest money shall be retained by IWAI towards part of security deposit to execute all the works referred to in the tender documents upon the terms and conditions contained or referred to therein and to carry out such deviations as may be ordered. Should this tender be accepted, I/ We agree to abide by and fulfill all the terms and conditions and provisions of this tender. No interest is payable on earnest money deposit and/ or security deposit.
6. I/ We have independently considered the amount of Liquidated Damages shown in the tender hereto and agree that it represents a fair estimate of the loss likely to be suffered by IWAI in the event of works not being completed in time.
7. If this tender is accepted, I/ We undertake to enter into execute at my/ our cost when called upon by the employer to do so, a contract agreement in the prescribed form. Unless and until a formal Agreement is prepared and executed this tender together with your written acceptance thereto shall constitute a binding contract.
8. If my/ our tender is accepted, I/We am/are to be jointly and severally responsible for the due performance of the Contract. I/Weal so declare that the firm has not been banned or blacklisted by any Govt. or its department or any Quasi Govt. agency or Public Sector Undertaking or Multilateral or International Aid Agency/Development Bank.
9. I/ We understand that you are not bound to accept the lowest or any tender you may receive and may reject all or any tender without assigning any reason.
10. I/ We certify that the tender submitted by me, us is strictly in accordance with the terms, conditions, specifications etc. as contained in the tender document, and it is further certified that it does not contain any deviation to the aforesaid documents.

Date

Signature

Name.....

Designation

Duly authorized to sign & submit tender for an on behalf of
(Name and address of firm)

M/s

.....
Telephone nos.....FAX No.....

Witness :

Signature.....

Name :.....

Occupation.....

AddressTelephone nos.

5. INSTRUCTIONSTOBIDDERSFORSUBMISSIONOFBID

- 1.0** All covering letters and information to be included in the bid shall be submitted along with the bid itself.
- 2.0** This tender schedule is only for the work of “Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26”.
- 3.0** The total estimated cost of works is Rs.373.00 lakhs exclusive of GST.
- 4.0** Tender should be submitted online at <https://eprocure.gov.in/eprocure/app> latest by 15:00 hours on 18.07.2024 **in two bid systems i.e., Technical Bid and Price Bid.** Technical Bid of the offer will be opened online at 15:30 hours on 19.07.2024 at IWAI, Patna.

Technical Bid

The technical bid shall be submitted online along with scanned copy of the following documents:

- a) Scanned copy of the ‘Tender Acceptance Letter’ duly signed and stamped.
- b) Scanned copy of the ‘Form of Tender’ duly signed and stamped.
- c) Scanned copy of the Tender document duly signed and stamped.
- d) Scanned copy of Self Declaration in the form as Annexure-2 **to** be submitted in letter head of the registered firm.
- e) Scanned copy of Payment Receipt made through RTGS (along with UTR No.) towards cost of the bidding documents must be uploaded. A certified copy of Payment Receipt is to be deposited in the office before the bid submission closing date &time.

Tender fee is exempted for SSI units or MSEs registered with Central Purchase Organization or the concerned Ministry or Department or Start-ups as recognized by Department for Promotion of Industrial and Internal Trade(DPIIT). Copies of the applicable credential shall be submitted to avail benefit of exemption.

- f) Scanned copy of Payment Receipt made through RTGS (along with UTR No.) towards remittance of Earnest Money Deposit must be uploaded. A certified copy of Payment Receipts to be deposited in the office before the bid submission closing date &time.

Earnest Money Deposit is exempted for SSI units or MSEs registered with Central Purchase organization or the concerned Ministry or Department or Start-ups as recognized by Department for Promotion of Industrial and Internal Trade (DPIIT). Copies of the applicable credential shall be submitted to avail benefit of exemption.

- g) Registration certificate from concerned Authorities.
- h) Details of experience in the form at **Annexure-3**(please read foot note also) and copies of experience certificate. (Experience certificate for the works of similar nature with satisfactory performance).
- i) Latest Solvency certificate for not less than INR 1,49,11,298/-issued by Nationalized/ Scheduled Bank, which should not be older than six(06) months from the last date of bid submission. The Solvency Certificate should have full address of banker for confirmation.
- j) Letter of Authority for signing and negotiation of tender (as the case maybe).
- k) Duly signed Integrity Pact (given in Part-II, General conditions)
- l) Permanent Account Number (PAN) issued by Income Tax Department.

- m) Concurrent commitments as per **Annexure-4**
- n) Details of dredging & excavation equipment proposed to be deployed for the work including their present location and current commitments in **Annexure-5**. Particularly such details need to be furnished on equipment proposed to be used.
- o) List of Key staff as per **Annexure-6**
- p) Audited balance sheets of profit and loss account / copies of Annual Turnover for the last 3 years i.e. ending March 2022, 2023 and 2024.
- q) Goods & Services Tax Registration number including copy of registration certificate.

The technical bid shall not contain any reference on price bid or quoted price of the bidder offer. Such bids will be treated as technically disqualified and their price will not be opened.

Price Bid

The price bid shall be submitted online for

- (i) Schedule of Prices duly filled in the specified form.
- (ii) This part shall not contain any terms & conditions. Any condition given in the price bid will be a sufficient cause for rejection of bid.
- (iii) GST extra (as applicable).

- 5.0** Bidders are advised to submit their offer strictly based upon technical specification, terms and conditions contained in documents and not to stipulate any deviations. Any change in this may lead to rejection of bid.

Earnest Money Deposit for the tendered work in the Notice inviting tender should be submitted in the following manner:

INR 7,45,565/- (i.e. 2% of estimated cost of work) deposited through RTGS / NEFT in the A/c. of Inland Waterways Authority of India as mentioned in Section-I, Bid Data Sheet

A certified copy of Payment Receipts towards Tender Cost and Earnest Money Deposit shall be submitted in the office of IWAI, Gaighat, Patna, Bihar, PIN 800007 on or before the closing date & time of submission of bid. In case the EMD & Tender fee does not credited in the specified Account No. of IWAI due to any reasons, the bid is liable for rejection.

The Earnest Money of the Successful Bidder submitted through RTGS mode will be retained as Security Deposit.

The Bid Security / Earnest Money will be forfeited if the Bidder withdraws the Bid after its submission during the period of Bid Validity or in the case of a Successful Bidder, if the Bidder fails within the specified time limit to sign the Agreement; and/or to furnish the required Performance Security.

All Bidders shall furnish EMD of the amount as mentioned in the Bid Data Sheet. However, Micro and Small Enterprises (MSEs) as defined in MSE Procurement Policy issued by Department of Micro, Small and Medium Enterprises (MSME) or Start-ups as recognized by Department for Promotion of Industrial and Internal Trade (DPIIT) are exempt from submitting the EMD on submission of documents to the extent as per the Government of India notifications in this regard.

Bids not accompanied by EMD shall be rejected as non-responsive.

No interest shall be payable by the Employer for the sum deposited as EMD.

The EMD of those Bidders whose Financial Bids have been opened but are not selected as “Successful Bidder” would be returned within seven (7) days of issuance of LoA to the successful Bidder.

The EMD of Bidders who have not qualified for opening of Price Bids would be returned within seven (7) days of opening of Price bid.

The EMD shall be forfeited by the Employer in the following events:

- i. If Bid is withdrawn during the bid validity period including any extension agreed to by the Bidder thereof.
- ii. If the Bidder tries to influence the evaluation process.
- iii. If the lowest Bidder raises any fresh issue and / or T&C during negotiations, it will be construed as withdrawal of the original bid and in that case EMD is liable to be forfeited.
- iv. In case the Bidder, submits false certificate in terms of any documents supported to this Tender.
- v. If the Bidder fails to sign the contract in accordance with Conditions of Contract on receipt of LoA.
- vi. In case the Bidder is found to indulge in corrupt or fraudulent practices at any stage of the execution of the contract.
- vii. If the Bidder fails to furnish the Performance Bank Guarantee in accordance with Conditions of Contract.
- viii. In case of a Bidder revoking or withdrawing his Tender or varying any terms of the Bid without the consent of the Employer in writing.
- ix. In case of forfeiture of EMD, as prescribed from (i) to (viii) above, the Bidder shall not be allowed to participate in the retendering process of the work.

Cost of Tender Document / Tender Fee

All Bidders are required to pay the cost of Tender Document as mentioned in **Section I, Bid Data Sheet**, through RTGS / NEFT. However, Micro and Small Enterprises (MSEs) as defined in MSE Procurement Policy issued by Department of Micro, Small and Medium Enterprises (MSME) or Start-ups as recognized by Department for Promotion of Industrial and Internal Trade (DPIIT) are exempt from submitting the Tender fee on submission of documents to the extent as per the Government of India notifications in this regard. The cost of Tender Document is Non-Refundable.

Bank Solvency

All Bidders shall submit Bank Solvency certificate from a nationalized / scheduled bank in India for a minimum amount as mentioned in Bid Data Sheet, The bank solvency certificate submitted by the Bidders shall not be older than one (01) year from the Bid Submission Last Date. **In case Bidder does not adhere to this criterion, his bids shall be considered non-responsive and shall not be considered for further evaluation process.**

Taxes

The Bidders shall fully familiarize themselves with the applicability of all types of taxes and all such taxes, as prevailing on date of submission of the bid, must be included by the Bidder in the Financial Proposal along with the conditions mentioned therein, except for GST which will be claimed separately along with the RA Bills. It may be noted that the Bidder shall have

To be registered with GST and shall submit the proof of the same at the time of bid submission. The GST and all other relevant taxes shall be paid as per existing rules and regulations at the time of payment. **The bidders to be given undertaking for Input Tax Credit in GST as per mentioned in Clause -41,42, General Condition of Contract(GCC)**

- 7.0** Any annotations or accompanying documentation in the bid shall be in Hindi or English language only and in metric system. Tenders filled in any other language will be summarily rejected.
- 8.0** Bidders shall sign their proposal with the exact name of the firm to whom the bid document has been issued / downloaded. The bid shall be duly signed and sealed by an authorized person of the bidder's organization as following:
- 8 (a) If the Tender is submitted by an individual, it shall be signed by the proprietor above his full name and full name of his firm with its current business address.
- 8 (b) If the Tender is submitted by the proprietary firm, it shall be signed by the proprietor above his full name and full name of his firm with its name and current business address.
- 8 (c) If the Tender is submitted by a firm in partnership, it shall be signed by all the partners of the firm above, their full names and current business address, or by a partner holding the power of attorney for the firm for signing the Tender in which cases a certified copy of the power of attorney shall accompany the Tender. A certified copy of the partnership deed and current business address of all the partners of the firm shall also accompany the Tender.
- 8 (d) If the Tender is submitted by a limited company, or a limited Corporation, it shall be signed by a duly authorized person holding the power of attorney for signing the tender in which case a certified copy of the power of attorney shall accompany the Tender. Such limited company or corporation may be required to furnish satisfactory evidence of its existence before the contract is awarded. 'Satisfactory evidence' means the certificate of incorporation of the limited company or corporation under Indian Companies Act,1956.
- 8 (e) All witnesses and sureties shall be persons of status and their full names, occupations and addresses shall be stated below their signatures. All signatures affixed in each page in the tender will be dated.
- 9.0** Bidders shall clearly indicate their legal constitution and the person signing the tender shall state his capacity and also the source of his ability to bind the bidder. The power of attorney or authorization or any other document constituting adequate proof of the ability of the signatory to bind the bidder shall be annexed to the bid. The Owner may reject outright any bid unsupported by adequate proof of the signatory's authority.
- 10.0** The bid document shall be completed in all respects and shall be submitted together with the requisite information and appendices. They shall be complete and free from ambiguity, change or interlineation. In case IWAI requires any information/clarification(s) from the Bidder in respect of the bid documents, the bidder shall be required to furnish the same in writing, to IWAI at the earliest where no time is specified by IWAI to furnish the same. A failure to furnish the same shall entitle IWAI to cancel/ reject the bid.
- 11.0** If the space in the bid form or in the Appendices thereto is insufficient, additional pages shall be separately added. These pages shall be consecutively page numbered and shall also be signed by the Bidder.
- 12.0** Bidders should indicate at the time of quoting against this bid their full postal addresses, telephone numbers and other communication details enabling IWAI to contact the bidder in case the need so arise.

13.0 IWAI shall have an unqualified option under the said bid bond to claim the amount there under in the event of the Bidder failing to keep the bid valid up to the date specified or refusing to accept work or carry it out in accordance with the bid if the IWAI decides to award the Work to the Bidder.

14.0 The EMD shall be retained with the IWAI until finalization of tenders. Further, security deposit as per the Clause of Security shall be payable by the successful bidder. If the tenderer fails to furnish the security deposit in accordance with tender conditions EMD shall be forfeited. **In the event of the Bidder becoming the successful Contractor, the amount of EMD would be adjusted against the Security deposit.**

The earnest money deposit (EMD) submitted by all the bidders except the lowest bidder shall be refunded immediately latest within a week from the date of approval of the award of the contract to the lowest bidder (s)/decision to re-tender or otherwise closure of the proposal as the case may be, by the competent authority. No interest shall be payable on EMD by IWAI.

In case of Joint Venture (JV), only Lead Partner can deposit EMD and same will be refunded to the bank account of the Lead Partner provided by the bidders / tenderers in the bid.

In case, where the Office-In-Charge considers that an item of EMD instead of being refunded, be carried to the credit of the IWAI-Fund, then the fact required to be recorded on the Deposit Receipt with the Officers initial records, and request the Accounts / Finance Wing to effect necessary adjustment in Accounts. Accordingly, the concerned bidders shall be communicated this fact within the period specified for EMD refund.

16.0 The Tender Evaluation Committee (TEC) shall open the tenders in the presence of the intending tenderers who may be present at the date and time of opening informed in the bid document or subsequently. If any of the tenderer or his agent is not present at the time of opening of tender, the TEC shall, on opening of tenders of the absentee tenderer, prepare a statement of the attested and unattested corrections in the tender over their signature. Such a list shall then be binding on the absentee tenderer.

17.0 The successful tenderers shall be required to execute a contract agreement in the given format. In case of any refusal/ failure on the part of such successful tenderer to execute such a contract shall be deemed to be a failure on the part of such successful bidder to comply with the terms contained herein.

Qualification of the Bidder

This invitation for online bids is open to all reputed and resourceful contractors fulfilling the criteria given under Terms and Conditions in the Tender Notice and as regards the size / value of experience in execution of similar works during past seven years, the factor specified below shall be used to bring the value of such completed works at the level of current financial year i.e. FY2024-25.

Year Before	Multiplying Factor
One.....	1.07
Two.....	1.14
Three.....	1.21
Four.....	1.28
Five.....	1.35
Six	1.42
Seven.....	1.49

19.0 Each Bidder shall submit only one online Bid for the work. A Bidder who submits more than one Bid will cause proposals with the Bidder's participation to be disqualified.

20.0 The Bidder shall bear all costs associated with the preparation and submission of his Bid, and the Owner will, in no case, be responsible or liable for those costs regardless of the conduct or outcome of the bidding process.

21.0 The bidder is expected to examine carefully all instructions, conditions of contract, contract data, terms, specifications, forms and drawings in the Bid Document. Failure to comply with the requirements of Bid Documents shall be at the bidder's own risk. Pursuant to clause 33 here of, bids, which are not substantially responsive to the requirements of the Bid Documents, shall be rejected.

22.0 Clarification of Bidding Documents

A prospective Bidder requiring any clarification of the bidding documents may notify the Tender Inviting Authority in writing, by facsimile or email at the address indicated in the Tender Notice / Notice Inviting Tender. The tender inviting authority will respond to any request for clarification received earlier than 7 days prior to the deadline for submission of bids. Copies of the response will be forwarded to all purchasers of the bidding documents / will be uploaded to the web sites, including a description of the inquiry, but without identifying its source.

23.0 Amendment of Bidding Documents:

Before the deadline for online submission of bids, the Owner may modify/amend/make addition in the bidding documents for any reason, whether at its own initiative or in response to clarification requested by a prospective bidder by issuing addenda/corrigendum. Any addendum/corrigendum/ minutes of pre bid meeting uploaded on website shall be part of the bidding documents. Corrigendum/Addendum/Minutes of pre bid meeting will be available on website. The modification /amendment/ additions in the bidding document shall be binding on the prospective bidders. To give prospective bidders reasonable time in which to take a corrigendum / addendum / minutes of pre bid meeting into account in preparing their bids, the Owner may extend, as necessary, the deadline for submission of bids.

24.0 Bid Prices:

The Contract shall be for the whole Works, as described, based on the cost schedule submitted by the Bidder. The bidder shall quote rates and prices for all items of the Works described in the cost schedule. The prices shall include all the taxes, levies, cess, royalty, terminal tax, or any other local, State or Central taxes as applicable / charged by Central or State Government or Local authorities on all materials that the contractor has to purchase for the performance of the contract and services and the Authority will not entertain any claim for compensation whatsoever in this regard. The rates quoted by the bidder shall be deemed to be inclusive of all such taxes, duties, cess, levies, etc. including 1% Labour Welfare Cess except for GST which shall be indicated and claimed separately. Labour Welfare Cess @ 1% of the value of the contract shall be deducted from the RA bills of the Contractor and deposited by IWAI as per norms of Govt. of India.

Bidders are to download BOQ through <https://eprocure.gov.in/eprocure/appand> cannot modify BOQ, they can enter only in the Blue Coloured portion of BOQ. The Bidder shall quote rate for Per item Basic price, inclusive of Freight ,Insurance, Transportation, packing, Inspection if applicable etc. The GST has to be mentioned separately

Prices quoted by the Bidder shall remain firm and fixed and valid till the validity time. The prices quoted shall be for destination of the consignees.

Form No. 'C' or 'D' & 31/32 will not be issued by the "Authority". Road permit, way bill etc. are to be arranged by the Bidder.

The rates and prices quoted by the Bidder shall be fixed for the duration of the Contract and shall not be subject to adjustment except for POL component in dredging, as per the prescribed formula. The prices shall be quoted by the bidder entirely in Indian Rupees. All payments shall be made in Indian Rupees.

25.0 Bid Validity: Bids shall remain valid for a period of 120 days after the last date for bid submission. A bid valid for a shorter period will be treated as non-responsive and shall be rejected.

In exceptional circumstances, prior to expiry of the original time limit, the IWAI may request the bidder to extend the period of validity for a specified additional period. The request and the bidders' responses shall be made in writing. A bidder may refuse the request without forfeiting his bid security. A bidder agreeing to the request will not be required or permitted to modify his bid, but will be required to extend the validity of his bid security.

26.0 Bidder shall submit offers that fully comply with the requirement of the bidding document including conditions of contract. Conditional offer or alternate offer will not be considered in the process of tender evaluation.

27.0 The Bidder shall submit online bid and the Bid shall be signed by a person or persons duly authorized to sign on behalf of the Bidder. All pages of the Bid shall be signed by the person or persons signing the Bid. The Bid shall contain no overwriting, alterations or additions, except those to comply with instructions issued by the Tender Inviting Authority.

28.0 Submission of Bids: The Bidder shall submit online bids. Complete online Bids (including Technical and Financial) must be received by the bid submission closing date and time. The Tender inviting Authority may extend the deadline for submission of bids by issuing an amendment, in which case all rights and obligations of the Owner and the bidders previously subject to the original deadline will then be subject to the new deadline.

29.0 Modification and Withdrawal of Bids: Bidders may modify or withdraw their bids online before the deadline prescribed. Withdrawal or modification of a Bid between the deadline for submission of bids and the expiration of the original period of bid validity specified or as extended shall result in the forfeiture of the Bid security.

Bid Opening and Evaluation

Online Bid opening shall be carried out in two stages. Firstly, 'Technical Bid' of all the online bids received shall be opened on the date and time mentioned in the Bid Data Sheet. 'Financial Bid' of those bidders whose technical bid has been determined to be responsive and on evaluation fulfills the criteria shall be opened on a subsequent date, which will be notified to such bidders.

The Owner will open the online "Technical Bid" of all the bids received in the presence of the bidders/bidders' representatives who choose to attend at the time, date and place specified. In the event of the specified date for the submission of bids being declared a holiday for the Owner, the Bids will be opened at next immediate convenient time & date which will be notified through the website.

Bidder's names and such other details like EMD furnished, as the Owner may consider appropriate will be announced by the Owner after the opening.

After the opening of the technical bids, their evaluation will be taken up with respect to bid security, qualification and other information furnished in Technical bid. Thereafter, on fulfilling the criteria laid down in Bid Evaluation, a list will be drawn up of the responsive bids whose financial bids are eligible for consideration.

The Owner shall inform the bidders, whose technical bids are found responsive, of the date, time and place of opening of the financial bids. The bidders so informed, or their representative, may attend the

online opening of financial bids.

At the time of the online opening of the 'Financial Bid', the names of the bidders whose bids were found responsive and the Bid prices, the total amount of each bid and such other details as the Owner may consider appropriate will be announced by the Owner.

31.0 Process to be Confidential

Information relating to the examination, clarification, evaluation, and comparison of bids and recommendations for the award of a contract shall not be disclosed to bidders or any other persons not officially concerned with such process until the award to the successful Bidder has been announced. Any attempt by a Bidder to influence the Owner's processing of bids or award decisions may result in the rejection of his Bid.

32.0 Clarification of Bids and Contacting the Owner

During the evaluation of the bids, the owner may, at its discretion, ask the bidder to provide any additional information/clarification in relation to its bids as may be deemed fit by the owner. The bidder shall in all cases where such request has been made by the owner, submit such information/clarification within such period and in such manner as may be specified by the owner in the request so made. In the event of failure of the bidder to furnish such additional information as may be requested by the owner, the owner may, in its sole discretion, deem such bid as non-responsive. The bidder shall not have any right to challenge the same or any claims arising from such bid being deemed non-responsive by the owner.

No bidder shall contact the owner on any matter relating to its bid from the time of the bid opening to the time the contract is awarded. Any attempt by the bidder to influence the Owner's bid evaluation, bid comparison or contract award decision may result in the rejection of his bid.

33.0 Examination of Bids and Determination of Responsiveness

During the detailed evaluation of "Technical Bids", the Owner will first determine whether each Bid (a) meets the eligibility criteria (b) has been properly signed; (c) is accompanied by the required securities; and (d) is responsive to the requirements of the bidding documents.

After the above process is completed, the technical specification/offer of the responsive bidders will be examined with respect to technical specifications provided in the tender document. Clarifications, if any, at this stage in respect of the technical parameters offered by the bidder will be sought from the bidders. Thereafter, the bids, which conform, to the terms, conditions, and specifications of the bidding documents, without material deviation or reservation will be considered as responsive for evaluation.

34.0 Evaluation of Bids

Selection of the bidder for the tendered work will be based on technical and financial evaluation.

Technical evaluation shall be based on the bidder satisfying the eligibility criteria stated in **Clause 10 of Terms and Conditions** under the Tender Notice AND the bidder furnishing all documents / certificates/ undertakings as specified in Clause 4.0 under INSTRUCTIONS FOR SUBMISSION OF BID.

Verification of the facts furnished by the bidders may be made prior to finalizing the technical evaluation.

If the bidder does not fulfill the above criteria his bid shall be technically disqualified and his financial bid shall not be opened.

The evaluation of the financial bid will be based on the lowest financial offer received for the work.

35.0 Award of Contract

Subject to Clause 36, the Owner will award the Contract to the Bidder after evaluation as per Clause 34.

Owner has the right to accept any Bid and to reject any or all Bids and split the work or Increase and Decrease work. Notwithstanding Clause 35.1, the Owner also reserves the right to cancel the bidding process and reject all bids, at any time prior to the award of Contract, without thereby incurring any liability to the affected Bidder or bidders or any obligation to inform the affected Bidder or bidders of the grounds for the Owner's action.

- 35.3 Award of work under "Make in India" policy: As per the policy of Government of India to promote Make in India the provisions vide order No. o-45021/2/2017-B.E.II dated 15.06.2017 of Ministry of Commerce and Industry on the subject "public procurement (preference to Make in India) shall be applicable to the extent possible.

36.0 Notification of Award and Signing of Agreement.

The bidder whose Bid has been accepted will be notified of the award by the Owner prior to expiration of the Bid validity period and this letter will be called "Letter of Acceptance" or "Work order" which will state the sum that the Owner will pay to the Contractor in consideration of the execution and completion of the Works by the Contractor as prescribed by the Contract (hereinafter and in the Contract called the "Contract Price") and also the time period for completion of the works.

The notification of award will constitute the formation of the Contract, subject only to the furnishing of a performance security in accordance with the provisions of Clause 37.

The Agreement will incorporate all agreements between the Owner and the successful Bidder. It will be signed in the proforma given at **Annexure.7** by the Owner and the successful Bidder after the performance security is furnished and within 15 days of issuance of Letter of Acceptance.

Upon the furnishing of the Performance Security by the successful Bidder, the other Bidders will be informed that their Bids have been unsuccessful.

37.0 Performance Security

Within 15 (fifteen) days of issue of the Letter of Acceptance, the successful Bidder shall deliver to the Owner a Performance Security equivalent to 5% of the contract price in the form of irrevocable Bank Guarantee from nationalized / scheduled bank of India.

The Contractor shall be required to deposit an amount equivalent to 5% of the contract value of the work as Performance Security in the form of an irrevocable bank guarantee bond of any nationalized / scheduled bank of India in accordance with the form prescribed **Annexure-8** or shall be deposited to IWAI account through NEFT / RTGS as mentioned in the Bid Data Sheet within 15 days of the issue of the LoA.

Failure of the successful bidder to comply with the requirement of sub-clause 37.1 shall constitute sufficient ground for cancellation of the award and forfeiture of the bid security.

38.0 Corrupt or Fraudulent Practices

The Owner will reject a proposal for award if it determines that the Bidder recommended for award has

engaged in corrupt or fraudulent practices in competing for the contract in question and will declare the firm ineligible, either indefinitely or for a stated period of time, to be awarded a contract with Inland Waterways Authority of India and any other agencies, if it at any time determines that the firm has engaged in corrupt or fraudulent practices in competing for the contractor, or in execution.

The Owner requires the bidders/Contractors to strictly observe the laws against fraud and corruption enforced in India, namely, Prevention of Corruption Act, 1988.

Instructions to the Bidders for the submission of bids online through the e -Procurement Portal <https://eprocure.gov.in/eprocure/app>

Possession of valid Digital Signature Certificate (DSC) and enrollment/registration of the consultants/bidders on the e-procurement/e-tender portal is a prerequisite for e-tendering.

Bidder should do the enrollment in the e-Procurement site using the <https://eprocure.gov.in/eprocure/app> option available "Enroll Here" on the home page. Portal. Enrollment is free of charge. During enrollment/registration, the bidders should provide the correct/true information including valid email-id. All the correspondence shall be made directly with the contractors/bidders through email- ID provided.

Bidder need to login to the site through their user ID/ password chosen during enrollment/registration.

Then the Digital Signature Certificate (Class II or Class III Certificates with signing key usage) issued by SIFY/TCS/ nCode/ eMudra or any Certifying Authority recognized by CCA India on eToken/ Smart Card, should be registered.

The DSC that is registered only should be used by the bidder and should ensure safety of the same.

Contractor/Bidder may go through the tenders published on the site and download the required tender documents/schedules for the tenders he/she is interested.

After downloading / getting the tender document/schedules, the Bidder should go through them carefully and then submit the documents as asked.

If there are any clarifications, this may be obtained online through the tender site, or through the contact details. Bidder should take into account of the corrigendum published before submitting the bids online.

Bidder then logs in to the site through the secured log in by giving the user id/ password chosen during enrolment/registration and then by giving the password of the eToken/ Smart Card to access DSC.

Bidder selects the tender which he/she is interested in by using the search option and then moves it to the 'my favourites' folder.

From the favourite's folder, he selects the tender to view all the details indicated.

It is construed that the bidder has read all the terms and conditions before submitting their offer. Bidder should go through the tender schedules carefully and upload the documents as asked; otherwise, the bid will be rejected.

Bidder, in advance, should get ready the bid documents to be submitted as indicated in the tender document/schedule and generally, they can be in general PDF/xls/rar/jpg formats. If there is more than one document, they can be clubbed together and can be provided in the requested format. Each document to be uploaded through online for the tenders should be less than 2 MB. If any document is more than 2MB, it can be reduced through zip/rar and the same can be uploaded, if permitted.

If there are any clarifications, this may be obtained through the site, or during the pre -bid meeting if any. Bidder should take into account the corrigendum published from time to time before submitting the

online.

The Bidders can update well in advance, the documents such as certificates, annual report details etc., under My Space option and these can be selected as per tender requirements and then send along with bid documents during bid submission. This will facilitate the bid submission process faster by reducing upload time of bids.

Bidder should submit the Tender Fee/ EMD as specified in the Bid Data Sheet. The original payment instruments should be posted/ couriered/ given in person to the Tender Inviting Authority within the due date as mentioned in this tender document. Scanned copy of the instrument should be uploaded as part of the offer, if asked for.

While submitting the bids online, the bidder reads the terms & conditions and accepts the same to proceed further to submit the bid packets.

The bidder has to select the payment option as offline to pay the Tender FEE/ EMD as applicable and enter details of the instruments.

The details of the DD/any other accepted instrument, physically sent, should tally with the details available in the scanned copy and the data entered during bid submission time. Otherwise submitted bid will not be acceptable.

The bidder has to digitally sign and upload the required bid documents one by one as indicated. Bidders to note that the very act of using DSC for downloading the bids and uploading their offers shall be deemed to be a confirmation that they have read all sections and pages of the bid document including General conditions of contract without any exception and have understood the entire document and are clear about the requirements of the tender requirements.

The bidder has to upload the relevant files required as indicated in the cover content. In case of any irrelevant files, the bid will be rejected.

If the price bid format is provided in a spread sheet file like BoQ_xxxx.xls, the rates offered should be entered in the allotted space only and uploaded after filling the relevant columns. The Price Bid/BOQ template must not be modified/replaced by the bidder, else the bid submitted is liable to be rejected for this tender.

The bidders are requested to submit the bids through online e-tendering system to the Tender Inviting Authority (TIA) well before the bid submission end date & time (as per Server System Clock). The TIA will not be held responsible for any sort of delay or the difficulties faced during the submission of bids online by the bidders at the eleventh-hour.

After the bid submission, the acknowledgement number, given by the e-tendering system should be printed by the bidder and kept as a record of evidence for online submission of bid for the particular tender and will also act as an entry pass to participate in the bid opening date.

The bidder should ensure/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 likely /liable to be rejected.

The time settings fixed in the server side & displayed at the top of the tender site, will be valid for all actions of requesting, bid submission, bid opening etc., in the e-tender system. The bidders should follow this time during bid submission.

All the data being entered by the bidders would be encrypted using PKI encryption techniques to ensure the secrecy of the data. The data entered will not be viewable by unauthorized persons during bid submission & not be viewable by any one until the time of bid opening.

Any bid document that is uploaded to the server is subjected to symmetric encryption using a system generated symmetric key. Further this key is subjected to asymmetric encryption using buyers/bid opener's

public keys. Overall, the uploaded tender documents become readable only after the tender opening by the authorized bid openers.

The confidentiality of the bids is maintained since the secured Socket Layer 128 bit encryption technology is used. Data storage encryption of sensitive fields is done.

The bidder should logout of the tendering system using the normal logout option available at the top right hand corner and not by selecting the (X) exit option in the browser.

Any queries relating to the tender document and the terms and conditions contained therein should be addressed to the Tender Inviting Authority for a tender or the relevant contact person indicated in the tender.

Any queries relating to the process of online bid submission or queries relating to CPP Portal in general may be directed to the 24x7 CPP Portal Helpdesk. The contact number for the helpdesk is 1800 2337315.

PART – II

6. GENERAL CONDITIONS.

- (i) Integrity Pact**
- (ii) Schedules**
- (iii) General Conditions of Contract.**

PART – II

To be signed by the bidder and same signatory competent / authorized to sign the relevant contract on behalf of IWAI.

(i) INTEGRITY AGREEMENT

This Integrity Agreement is made at on this day of 20.....

BETWEEN

Chairperson, Inland Waterways Authority of India represented through The Chief Engineer, Inland Waterways Authority of India, Gaighat, Patna, Bihar Pin 800007.

(Hereinafter referred as the ‘Principal/Owner’, which expression shall unless repugnant to the meaning or context hereof include its successors and permitted assigns)

AND

.....
(Name and Address of the Individual/firm/Company)

through(Hereinafter referred to as the (Details
of duly authorized signatory)

“Bidder/Contractor” and which expression shall unless repugnant to the meaning or context hereof include its successors and permitted assigns)

Preamble

WHEREAS the Principal/ Owner has floated the Tender No.(hereinafter referred to as “Tender/Bid”) and intends to award, under laid down organizational procedure, contract for “Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26

AND WHEREAS the Principal/Owner values full compliance with all relevant laws of the land, rules, regulations, economic use of resources and of fairness/transparency in its relation with its Bidder(s) and Contractor(s).

AND WHEREAS to meet the purpose aforesaid, both the parties have agreed to enter into this Integrity Agreement (hereinafter referred to as “Integrity Pact” or “Pact”), the terms and conditions of which shall also be read as integral part and parcel of the Tender/Bid documents and Contract between the parties.

NOW, THEREFORE, in consideration of mutual covenants contained in this Pact, the parties hereby agree as follows and this Pact witnesses asunder:

Article 1: Commitment of the Principal/Owner

- 1) The Principal/Owner commits itself to take all measures necessary to prevent corruption and to observe the following principles:
 - (a) No employee of the Principal/Owner, personally or through any of his/her family members, will in connection with the Tender, or the execution of the Contract, demand, take a promise for or accept, for self or third person, any material or immaterial benefit which the person is not legally entitled to.

- (b) The Principal/Owner will, during the Tender process, treat all Bidder(s) with equity and reason. The Principal/Owner will, in particular, before and during the Tender process, provide to all Bidder(s) the same information and will not provide to any Bidder(s) confidential / additional information through which the Bidder(s) could obtain an advantage in relation to the Tender process or the Contract execution.
 - (c) The Principal/Owner shall endeavor to exclude from the Tender process any person, whose conduct in the past has been of biased nature.
- 2) If the Principal/Owner obtains information on the conduct of any of its employees which is a criminal offence under the Indian Penal code(IPC)/Prevention of Corruption Act, 1988 (PC Act) or is in violation of the principles herein mentioned or if there be a substantive suspicion in this regard, the Principal/Owner will inform the Chief Vigilance Officer and in addition can also initiate disciplinary actions as per its internal laid down policies and procedures.

Article 2: Commitment of the Bidder(s)/Contractor(s)

1. It is required that each Bidder/Contractor (including their respective officers, employees and agents) adhere to the highest ethical standards, and report to the IWAI all suspected acts of fraud or corruption or Coercion or Collusion of which it has knowledge or becomes aware, during the tendering process and throughout the negotiation or award of a contract.
2. The Bidder(s)/Contractor(s) commit himself to take all measures necessary to prevent corruption. He commits himself to observe the following principles during his participation in the Tender process and during the Contract execution:
 - a) The Bidder(s)/Contractor(s) will not, directly or through any other person or firm, offer, promise or give to any of the Principal/Owner's employees involved in the tender process or execution of the contract or to any third person any material or other benefit which he/she is not legally entitled to, in order to obtain in exchange any advantage of any kind whatsoever during the Tender process or during the execution of the contract.
 - b) The Bidder(s)/Contractor(s) will not enter with other Bidder(s) into any undisclosed agreement or understanding, whether formal or informal. This applies in particular to prices, specifications, certifications, subsidiary contracts, submission or non-submission of bids or any other actions to restrict competitiveness or to cartelize in the bidding process.
 - c) The Bidder(s)/Contractor(s) will not commit any offence under the relevant IPC/PC Act. Further the Bidder(s)/Contractor(s) will not use improperly, (for the purpose of competition or personal gain), or pass on to others, any information or documents provided by the Principal/Owner as part of the business relationship, regarding plans, technical proposals and business details, including information contained or transmitted electronically.
 - d) The Bidder(s)/Contractor(s) of foreign origin shall disclose the names and addresses of agents/representatives in India, if any. Similarly, Bidder(s)/Contractor(s) of Indian Nationality shall disclose names and addresses of foreign agents/representatives, if any. Either the Indian agent on behalf of the foreign principal or the foreign principal directly could bid in a tender but not both. Further, in cases where an agent participates in a tender on behalf of one manufacturer, he shall not be allowed to quote on behalf of another manufacturer along with the first manufacturer in a subsequent/parallel tender for the same item.
 - e) The Bidder(s)/Contractor(s) will, when presenting his bid, disclose any and all payments he has made, is committed to or intends to make to agents, brokers or any other intermediaries in connection with the award of the Contract.
3. The Bidder(s)/Contractor(s) will not instigate third persons to commit offences outlined above or be an accessory to such offences.

4. The Bidder(s)/Contractor(s) will not, directly or through any other person or firm indulge in fraudulent practice means a will full misrepresentation or omission of facts or submission of fake/forged documents in order to induce public official to act in reliance thereof, with the purpose of obtaining unjust advantage by or causing damage to justified interest of others and/or to influence the procurement process to the detriment of the Government interests.
5. The Bidder(s)/Contractor(s) will not, directly or through any other person or firm use Coercive Practices (means the act of obtaining something, compelling an action or influencing a decision through intimidation, threat or the use of force directly or indirectly, where potential or actual injury may be fall upon a person, his/her reputation or property to influence their participation in the tendering process).

Article 3: Consequences of Breach

Without prejudice to any rights that may be available to the Principal/Owner under law or the Contract or its established policies and laid down procedures, the Principal/Owner shall have the following rights in case of breach of this Integrity Pact by the Bidder(s)/Contractor(s) and the bidder/contractor accepts and undertakes to respect and uphold the Principal/Owner's absolute right:

1. If the Bidder(s)/Contractor(s), either before award or during execution of Contract has committed a transgression through a violation of Article 2 above or in any other form, such as to put his reliability or credibility in question, the Principal/Owner after giving 14 days' notice to the contractor shall have powers to disqualify the Bidder(s)/Contractor(s) from the tender process or terminate/determine the Contract, if already executed or exclude the Bidder/Contractor from future contract award processes. The imposition and duration of the exclusion will be determined by the severity of transgression and determined by the Principal/Owner. Such exclusion maybe forever or for a limited period as decided by the Principal/Owner.
2. Forfeiture of EMD/Performance Guarantee/Security Deposit: If the Principal / Owner has disqualified the Bidder(s) from the tender process prior to the award of the contract or terminated/determined the contract or has accrued the right to terminate/determine the contract according to Article 3(1), the Principal/Owner apart from exercising any legal rights that may have accrued to the Principal/Owner, may in its considered opinion forfeit the entire amount of Earnest Money Deposit, Performance Guarantee and Security Deposit of the Bidder/Contractor.
3. Criminal Liability: If the Principal/Owner obtains knowledge of conduct of a bidder or Contractor, or of an employee or a representative or an associate of a bidder or Contractor which constitutes corruption within the meaning of IPC Act, or if the Principal/Owner has substantive suspicion in this regard, the Principal/Owner will inform the same to law enforcing agencies for further investigation.

Article 4: Previous Transgression

- 1) The Bidder declares that no previous transgressions occurred in the last 5 years with any other Company in any country confirming to the anticorruption approach or with Central Government or State Government or any other Central/State Public Sector Enterprises in India that could justify his exclusion from the Tender process.
- 2) If the Bidder makes incorrect statement on this subject, he can be disqualified from the Tender process or action can be taken for banning of business dealings/ holiday listing of the Bidder/Contractor as deemed fit by the Principal/Owner.
- 3) If the Bidder/Contractor can prove that he has resorted / recouped the damage caused by him and has installed a suitable corruption prevention system, the Principal/Owner may, at its own discretion, revoke the exclusion prematurely.

Article 5: Equal Treatment of all Bidders/Contractors/Subcontractors

- 1) The Bidder(s)/Contractor(s) undertake(s) to demand from all subcontractors a commitment in conformity with this Integrity Pact. The Bidder/Contractor shall be responsible for any violation(s) of the principles laid down in this agreement/Pact by any of its Subcontractors/sub-vendors.
- 2) The Principal/Owner will enter into Pacts on identical terms as this one with all Bidders and Contractors.
- 3) The Principal/Owner will disqualify Bidders, who do not submit, the duly signed Pact between the Principal/Owner and the bidder, along with the Tender or violate its provisions at any stage of the Tender process, from the Tender process.

Article 6: Duration of the Pact

This Pact begins when both the parties have legally signed it. It expires for the Contractor/Vendor 12 months after the completion of work under the contract or till the continuation of defect liability period, whichever is more and for all other bidders, till the Contract has been awarded.

If any claim is made/lodged during the time, the same shall be binding and continue to be valid despite the lapse of this Pacts as specified above, unless it is discharged/determined by the Competent Authority of IWAI.

Article 7: Other Provisions

- 1) This Pact is subject to Indian Law, place of performance and jurisdiction is the Headquarters of the Division of the Principal/Owner, who has floated the Tender.
- 2) Changes and supplements need to be made in writing. Side agreements have not been made.
- 3) If the Contractor is a partnership or a consortium, this Pact must be signed by all the partners or by one or more partner holding power of attorney signed by all partners and consortium members. In case of a Company, the Pact must be signed by a representative duly authorized by board resolution.
- 4) Should one or several provisions of this Pact turn out to be invalid; the remainder of this Pact remains valid. In this case, the parties will strive to come to an agreement to their original intentions.
- 5) It is agreed term and condition that any dispute or difference arising between the parties with regard to the terms of this Integrity Agreement / Pact, any action taken by the Owner/Principal in accordance with this Integrity Agreement/ Pact or interpretation thereof shall not be subject to arbitration.

Article 8: LEGAL AND PRIOR RIGHTS

All rights and remedies of the parties hereto shall be in addition to all the other legal rights and remedies belonging to such parties under the Contract and/or law and the same shall be deemed to be cumulative and not alternative to such legal rights and remedies aforesaid. For the sake of brevity, both the Parties agree that this Integrity Pact will have precedence over the Tender/Contact documents with regard any of the provisions covered under this Integrity Pact.

IN WITNESS WHEREOF the parties have signed and executed this Integrity Pact at the place and date first above mentioned in the presence of following witnesses:

.....
(For and on behalf of Principal/Owner)

.....
(For and on behalf of Bidder/Contractor)

WITNESSES:

1.....
(signature, name and address)

2.....
(Signature, name and address)

Place:.....

Date:

(ii) SCHEDULES

SCHEDULE 'A': Salient Features of the work.

Name of Work: Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26

Estimated cost: Rs. 373.00 lakhs excluding GST.

Earnest Money: Rs.7,45,565/-

Security Deposit: 5% of contract price.

A sum @ 10% of Bill amount shall be deducted from each running bill of the contractor till the sum reaches 5% of the contract value of the work.

As per GFR, Manual for procurement of works 2019.

SCHEDULE 'B': General Rules & Directions with reference to General Conditions of Contract:-

- | | | | |
|--------|--|---|--|
| (i) | Officer inviting tender | : | Chief Engineer, IWAI, Patna |
| (ii) | Tender Accepting Authority | : | Chief Engineer, IWAI, Patna |
| (iii) | (a) Time allowed for submission of Performance Guarantee as per clause 3.1 of GCC from the date of issue of letter of acceptance | : | 15 days |
| | (b) Maximum allowable extension Beyond the period provided in (iii) (a)above | : | 7 days. |
| (iv) | Percentage on Cost of Material sand Labour to cover all overheads & profits | : | included in the estimate |
| (v) | Standard Schedule of Rates | : | Not applicable |
| (vi) | Specifications to be followed | : | Not applicable |
| (vii) | Deviation Limit beyond which Clause 16.3, 16.4, 16.5&16.6 | : | 20% with approval of the Competent Authority |
| (viii) | Competent Authority for grant extension of time under clause34:-As per Delegation of Power of IWAI | | |
| (ix) | Competent Authority to levy liquidated damages for delay under clause35:-As per Delegation of Power of IWAI | | |
| (x) | Competent Authority to determine the contract as per clause36:-As per Delegation of Power of IWAI | | |
| (xi) | Milestones as per table given below:- | | |

(Clause 34.5 & 34.6 shall be applicable only when the amount of the contract is more than 10Crores).

Sl. No.	Milestone	Time Allowed (from date of start) in months	Amount to be withheld in case of non-achievement of mile stone
1	Mobilization	1.5 months	As per the tender
2	Dredging	24 months (including mobilization period)	-do-

- (xii) **Competent authority to reschedule the milestones as per clause 34.5** : Chief Engineer, IWAI, Patna.
- (xiii) **Competent authority for foreclosure of contract in full or in part due to abandonment or reduction in scope of work as per Clause –31: As per Delegation of Power of IWAI**
- (xiv) **Incentive for early completion** : Not applicable

(iii) **GENERAL CONDITION OF CONTRACT**

C O N T E N T S

CLAUSE-1	:	DEFINITIONS
CLAUSE-2	:	INTERPRETATIONS
CLAUSE-3	:	PERFORMANCE GUARANTEE
CLAUSE-4	:	SECURITY DEPOSIT
CLAUSE-5	:	SUFFICIENCY OF TENDER
CLAUSE-6	:	CONTRACT DOCUMENTS
CLAUSE-7	:	DISCREPANCIES AND ADJUSTMENT OF ERRORS
CLAUSE-8	:	DUTIES AND POWERS OF ENGINEER-IN-CHARGE'S REPRESENTATIVE
CLAUSE-9	:	ASSIGNMENT AND SUB-LETTING
CLAUSE-10	:	FACILITIES TO OTHER CONTRACTORS
CLAUSE-11	:	CHANGE IN CONSTITUTION OF THE FIRM TO BE INTIMATED
CLAUSE-12	:	COMMENCEMENT OF WORK
CLAUSE-13	:	WORKS TO BE CARRIED OUT IN ACCORDANCE WITH SPECIFICATIONS DRAWINGS AND ORDERS ETC.
CLAUSE-14	:	SETTING OUT THE WORKS
CLAUSE-15	:	URGENT WORKS
CLAUSE-16	:	DEVIATIONS, VARIATIONS, EXTENT & PRICING
CLAUSE-17	:	CONTRACTOR'S SUPERVISION
CLAUSE-18	:	INSTRUCTIONS AND NOTICE
CLAUSE-19	:	PLANT AND EQUIPMENT
CLAUSE-20	:	PATENT RIGHTS
CLAUSE-21	:	MATERIALS
CLAUSE-22	:	LAWS GOVERNING THE CONTRACT
CLAUSE-23	:	WATCH & WARD AND LIGHTING
CLAUSE-24	:	WORK DURING NIGHT OR ON SUNDAYS AND HOLIDAYS
CLAUSE-25	:	LABOUR
CLAUSE-26	:	MATERIALS OBTAINED FROM EXCAVATION SUCH AS FOSSILS, COIN ETC.
CLAUSE-27	:	FORCE MAJEURE
CLAUSE-28:	:	LIABILITY FOR DAMAGE, DEFECTS OR IMPERFECTIONS AND RECTIFICATION THEREOF

CLAUSE-29	:	CONTRACTOR'S LIABILITY AND INSURANCE
CLAUSE-30	:	SUSPENSION OF WORKS
CLAUSE-31	:	FORE CLOSURE OF CONTRACT IN FULL OR IN PART DUE TO ABANDONMENT OR REDUCTION IN SCOPE OF WORK
CLAUSE-32	:	TERMINATION OF CONTRACT ON DEATH
CLAUSE-33	:	CARRYING OUT PART WORK AT THE RISK & COST OF THE CONTRACTOR
CLAUSE-34	:	COMPLETION TIME AND EXTENSIONS
CLAUSE-35	:	LIQUIDATED DAMAGES FOR DELAY
CLAUSE-36	:	WHEN THE CONTRACT CAN BE DETERMINED
CLAUSE-37	:	INSPECTION AND APPROVAL
CLAUSE-38	:	COMPLETION CERTIFICATE & COMPLETION PLANS
CLAUSE-39	:	MEASUREMENTS
CLAUSE-40	:	PAYMENT ON ACCOUNT
CLAUSE-41	:	TAXES, DUTIES AND LEVIES ETC
CLAUSE-42	:	TAX DEDUCTION AT SOURCE
CLAUSE-43	:	PAYMENT OF FINAL BILL
CLAUSE-44	:	OVERPAYMENTS AND UNDER PAYMENTS
CLAUSE-45	:	FINALITY CLAUSE
CLAUSE-46	:	SUM PAYABLE BY WAY OF COMPENSATION TO BE CONSIDERED IS REASONABLE WITHOUT PREFERENCE TO ACTUAL LOSS
CLAUSE-47	:	SETTLEMENT OF DISPUTES & ARBITRATION
CLAUSE-48	:	CLAIM
CLAUSE-49	:	INTEREST

GENERAL CONDITIONS OF CONTRACT

CLAUSE - 1: DEFINITIONS

In the contract, the following words & expression shall, unless context otherwise requires, have the meaning thereby respectively assigned to them:

- (i) **Contract:** means the documents forming the tender and acceptance thereof and the formal agreement executed between the competent authority on behalf of the Chairman, Inland Waterways Authority of India and the contractor, together within the documents referred to therein including these conditions, the specifications, designs, drawings and instructions issued from time to time by the Engineer-in-charge and all these documents taken together shall be deemed to form one contract and shall be complementary to one another
- (ii) **Contract sum;** means the amount arrived at by multiplying the quantities shown in the schedule of quantities and price by the respective item rates as allowed.
- (iii) **Contractor:** means the successful tenderer who is awarded the contract to perform the work covered under this tender document and shall be deemed to include the contractor's successors, executors, representatives or assign approved by the Engineer-in-charge.
- (iv) **Employer** means the Chairman, Inland Waterways Authority of India and his successors.
- (v) **IWAI/Authority/ Department/ Owner** shall mean the Inland Waterways Authority of India, which invites tenders on behalf of the Chairman, IWAI and includes therein-legal representatives, successors and assigns.
- (vi) **Engineer-In-Charge (EIC)** means the Engineer officer authorized to direct supervise and are In-charge of the works for the purpose of this contract who shall supervise and be in charge of the work.
- (vii) **Engineer-in-charge representative** shall mean any officer of the Authority nominated by the Engineer-in-charge for day to day supervision, checking, taking measurement, checking bills, ensuring quality control, inspecting works and other related works for completion of the project.
- (viii) **Chairman:** means Chairman of Inland Waterways Authority of India.
- (ix) **Vice Chairman:** means the Vice Chairman of the Authority
- (x) **Chief Engineer:** means the Chief Engineer of the Authority.
- (xi) **Director:** means the **Director** of the Authority, as the case maybe.
- (xii) **Deputy Director:** means the Deputy **Director** of the Authority, as the case maybe.
- (xiii) **Assistant Director:** means the Assistant Chief Engineer of the Authority, as the case maybe.
- (xiv) **Assistant Hydrographic Surveyor** means the Assistant Hydrographic Surveyor of the Authority, as the case maybe
- (xv) **Work Order :** means letter from the Authority conveying the acceptance of the tender/offer subject to such reservations as may have been stated therein.
- (xvi) **Day :** means a calendar day beginning and ending at mid-night.
- (xvii) **Week :** means seven consecutive calendar days
- (xviii) **Month: means** the one Calendar month.
- (xix) **Site :** means the waterway and / or other places through which the works are to be executed.

- (xx) **Vessel** : Any inland vessel / dredger operating in the National Waterway including the dredging units of IWAI for carrying out the work.
- (xxi) **Drawings** : means the drawings referred to in the specifications and / or appended with the tender document, any modifications of such drawing approved in writing by the Engineer- in-Charge and shall also include drawings/charts issued for actual execution of the work time to time by the Engineer-in-Charge.
- (xxii) **Urgent Works**: means any urgent nature which in the opinion of the Engineer-In-Charge become necessary at the time of execution and / or during the progress of work to obviate any risk or accident or failure or to obviate any risk of damage to the vessel structure, or required to accelerate the progress of work or which becomes necessary for security or for any other reason the Engineer- in-Charge may deem expedient.
- (xxiii) **Work / works**: means work / works to be executed in accordance with the contract.
- (xxiv) Schedules referred to in these conditions shall mean the relevant schedules annexed to the tender papers.
- (xxv) District specifications means the specifications followed by the State Government in the area where the work is to be executed.
- (xxvi) Tendered value means the value of the entire work as stipulated in the letter of award.

CLAUSE – 2: INTERPRETATIONS

Where the contract so requires, words imparting the singular only shall also include the plural and vice versa. Any reference to masculine gender shall whenever required include feminine gender and vice versa.

Heading and marginal notes in these General Conditions shall not be deemed to form part thereof or be taken into consideration in the interpretation of construction thereof of the contract.

CLAUSE – 3: PERFORMANCE GUARANTEE

The Contractor shall be required to deposit an amount equivalent to 5% of the contract value he work as Performance Security in the form of an irrevocable bank guarantee bond of any nationalized / scheduled bank of India in accordance with the form prescribed Annexure-8 or shall be deposited to IWAI account through NEFT / RTGS as mentioned in the Bid Data Sheet within 15 days of the issue of the work order.

After recording of the completion certificate for the work by the competent authority, and completion of defects liability period, the performance guarantee shall be returned to the contractor without any interest.

In the event of contract being determined under the provision of any of the clauses/ conditions of agreement, the performance guarantee shall be forfeited in full and shall be absolutely at the disposal of the authority.

CLAUSE – 4: SECURITY DEPOSIT

A sum @ 10% of Bill amount shall be deducted from each running bill of the contractor till the sum reaches 5% of the contract value of the work.

As per GFR, Manual for Procurement of Works.

The total security deposit shall remain with IWAI till the completion of the contract and handing over of the site back to IWAI and the defect liability period is over or the payment of

the final bill payable in accordance with agreement conditions whichever is later, provided the Engineer- in-Charge is satisfied that there is no demand outstanding against the contractor.

No interest will be paid on security deposit.

If the contractor neglects to observe or fails to perform any of his obligations under the contract, it shall be lawful for the Employer/ EIC to forfeit either in whole or in part, the security deposit furnished by the contractor. However, if the contractor duly performs and completes the contract in all respects and presents in absolute "NO DEMAND CERTIFICATE" in the prescribed form, the IWAI shall refund the security deposit to the contractor after deduction of cost and expenses that the Authority may have incurred and other money including all losses and damages which the Authority is entitled to recover from the Contractor.

In case of delay in the progress of work, the Engineer- in-Charge shall issue to the contractor a memo in writing pointing out the delay in progress and calling upon the contractor to explain the causes for the delay within 3 days of receipt of the memo and 10 days from issuance of memo whichever is earlier. If the Engineer-in-Charge is not satisfied with the explanations offered, he may forfeit the security deposit and / or withhold payment of pending bills in whole or in part and/ or get the measures of rectification of progress of work accelerated to the pre-defined level at the risk and cost of the contractor.

All compensation or other sums of money payable by the contractor under the terms of the contract or any other contract or on any other account whatsoever, may be deducted from or paid by the sale of a sufficient part of his security or from the interest arising there from or from any sums which may be due or may become due to the contractor by the Authority on any account whatsoever. Also in the event of the contractor's security deposit being reduced by reasons of such deductions or sale, as aforesaid the contractor shall, within 14 days of receipt of notice of demand from the Engineer-in-Charge make good the deficit in his security deposit.

In case the contractor fails to commence the works or when the contractor has defaulted for more than thirty days or when any amount is to be recovered from the contractor as penalty or deduction and the contractor fails to remit such amount even after due notice is given to him in this regard, IWAI at its own discretion may recover the sum from his security deposit.

CLAUSE – 5: SUFFICIENCY OF TENDER

The contractor shall be deemed to have satisfied himself before tendering as to the correctness and sufficiency of his tender for the works and of the rates quoted in the schedule of Quantities and Prices which shall (except as otherwise provided in the contract) cover all his obligations under the contract and all matters and things necessary for the proper execution and completion of the works in accordance with the provisions of the contract and its operation during execution of work.

CLAUSE – 6: CONTRACT DOCUMENTS

The language in which the contract documents shall be drawn up shall be English and if the said documents are written in more than one languages, the language according to which the contract is to be constructed and interpreted shall be English.

The Contractor shall be furnished free of charge certified true copy of the contract document.

A copy of the Contract Documents furnished to the Contractor as aforesaid shall be kept by the Contractor on the Site in good condition and the same shall at all reasonable time be

available for inspection and use by the Engineer-in-Charge, his representatives or by other Inspecting officers of the Authority.

None of these Documents shall be used by the Contractor for any purpose other than that of this contract.

CLAUSE – 7: DISCREPANCIES AND ADJUSTMENT OF ERRORS

Detailed drawings shall be followed in preference to small-scale drawings and figured dimensions in preference to scaled dimensions. The case of discrepancy between the Schedule of Quantities and prices, the Specifications and/ or the drawings, the following order of precedence shall be observed :-

- (a) Description in the Schedule of Quantities and Prices.
- (b) Relevant Specifications and Special Conditions, if any.
- (c) Drawings.
- (d) Indian Standards Specifications of BIS.

The contractor shall study and compare the drawings, specifications and other relevant information given to him by the Engineer-in-Charge and shall report in writing to the Engineer-in-Charge any discrepancy and inconsistency which he notes. The decision of the Engineer-in-Charge regarding the correct intent and meaning of the drawings and specifications shall be final and binding.

Any error in description, quantity or price in Schedule of Quantities and Prices or any omission there-from shall not vitiate the Contract or release the Contractor from the execution of the whole or any part of the work(s) comprised therein according to drawings and specifications or from any of his obligations under the contract.

If on check there is difference in the amount worked out by contractor in the schedule of quantities and prices and General summary the same shall be adjusted in accordance with the following rules:

- (a) In the event of error/discrepancy occurring in the rates written in figures and words, then the rate which corresponds with the amount worked out by the contractor shall, unless otherwise proved, be taken as correct. If the amount of an item is not worked out by the contractor or it does not correspond with the rate written either in figures or in words, then the rate quoted by the contractor in words shall be taken as correct. When the rate quoted by the contractor in figures and words tally, but the amount is not worked out correctly, the rate quoted by the contractor will, unless or otherwise proved, be taken as correct.
- (b) All errors in totaling in the amount column and in carrying forward totals shall be corrected.
- (c) The totals of various sections of schedule of quantities and price amended shall be carried over to the General Summary and the tendered sum amended accordingly. The tendered sum so altered shall, for the purpose of tender, be substituted for the sum originally tendered and considered for acceptance instead of the original sum quoted by the tenderer. Any rounding off of quantities or in sections of schedule of quantities and prices or in General summary by the tenderer shall be ignored.

CLAUSE-8: DUTIES AND POWERS OF THE ENGINEER-IN-CHARGE REPRESENTATIVE

The duties of the representative of the Engineer-in-Charge are to watch and supervise the works and to test and examine any materials/ parts to be used or workmanship achieved in connection with the works.

The Engineer-in-Charge may, from time to time in writing, delegate to his representative any of the powers and authorities, vested in the Engineer-in- Charge and shall furnish to the contractor a copy of all such written delegation of powers and authorities. Any written instruction or written approval given by the representative of the Engineer-in-Charge to the contractor within the terms of such delegation shall

bind the contractor and the Authority as though it has been given by the Engineer-in-Charge.

Failure of the representative of the Engineer-in-Charge to disapprove any work or materials shall be without prejudice to the power of the Engineer-in-Charge thereafter to disapprove such work or materials and to order the pulling down, removal or breaking up thereof. The contractor shall, at his own expense, again carry out such works as directed by the Engineer-in-Charge.

If the Contractor is dissatisfied with any decision of the representative of the Engineer-in-Charge, he will be entitled to refer the matter to the Engineer-in-Charge who shall thereupon confirm, reverse or vary such decision and the decision of the Engineer-in-Charge in this regard shall be final and binding on the contractor.

CLAUSE – 9: ASSIGNMENT AND SUB-LETTING

The Contractor shall not sub-let, transfer or assign the whole or any part of the work under the contract. Provided that the Engineer-in-Charge may at his discretion, approve and authorize the Contractor to sub-let any part of the work, which in his opinion, is not substantial, after the contractor submits to him in writing the details of the part of the work(s) or trade proposed to be sublet, the name of the sub-contractor thereof together with his past experience in the said work/trade and the form of the proposed sub-contract. Nevertheless any such approval or authorization by the Engineer-in-Charge shall not relieve the contractor from his any or all liabilities, obligations, duties and responsibilities under the contract. The contractor shall also be fully responsible to the Authority for all the acts and omissions of the sub-contractor, his employees and agents or persons directly employed by the contractor. However, the employment of piece rate works shall not be construed as sub-letting.

CLAUSE – 10: FACILITIES TO OTHER CONTRACTORS

The contractors shall, in accordance with the requirements of the work as decided by the Engineer-in-Charge, afford all reasonable facilities to other contractors engaged contemporaneously on separate contracts and for departmental labour and labour of any other agency properly authorized by Authority or any statutory body which may be employed at the site for execution of any work not included in the contract which the Authority may enter into in connection with or ancillary to the works. In all matters of conflict of interest, the Engineer-in-Charge shall direct what compromise should be made and his decision shall be final and binding on the parties.

CLAUSE – 11: CHANGE IN THE CONSTITUTION OF THE FIRM TO BE INTIMATED

Where the contractor is a partnership firm, prior approval in writing of the Engineer-in-Charge shall be obtained before any change is made in the constitution of the firm. Where the contractor is an individual or a Hindu Undivided Family business concern, such approval, as aforesaid, shall like-wise be obtained before the contractor enters into any partnership agreement where under the partnership firm would have the right to carry out the works hereby undertaken by the contractor. If prior approval as aforesaid is not obtained the contractor shall be deemed to have been assigned in contravention to Clause 36 hereof and the same action will be taken and the same consequences shall ensue as provided for in the said clause-36.

CLAUSE – 12: COMMENCEMENT OF WORK

The contractor shall commence the work at the respective sites within 15 days of the issue of Letter of Award. If the contractor commits default in mobilization of resources, and equipment as aforesaid, the Engineer-in-Charge shall without prejudice to any other right or remedy be at liberty to cancel the contract and forfeit the earnest money/security deposit.

CLAUSE-13: WORKS TO BE CARRIED OUT IN ACCORDANCE WITH SPECIFICATION DRAWINGS AND ORDERSETC.

The contractor shall execute the whole and every part of the work in the most substantial and workman like manner in strict conformity with the specifications laid down in the contract document or as may be laid down by the Engineer-in-Charge under the terms of the contract. The contractor shall also conform exactly, fully and faithfully to the designs, drawings specifications and instructions in writing in respect of the work, duly signed by the Engineer- in-Charge as may be issued from time to time.

The contractor shall be entitled to receive, on demand, in addition to the contract documents, in accordance with the provisions of contract, the documents set forth herein in respect of the work on commencement or during the performance of the contract:

- (a) Specifications or revisions thereof other than standard printed specifications and charts/drawings issued to the contractor from time to time
- (b) Explanations, instructions etc.

Such further drawings, explanation, modifications and instruction, as the Engineer-in-Charge may issue to the contractor from time to time in respect of the work shall be deemed to form integral part of the contract and the contractor shall be bound to carry out the work accordingly.

In the case of any class of work for which there is no specifications, such work shall be carried out in accordance with the Bureau of Indian Standards specifications. In case there are no such specifications in the BIS, work shall be carried out as per manufacturer's specifications, if manufacturer's specifications are also not available then as per District specifications. In case there are no such specifications as required, above the work shall be carried out in all respect in accordance with the instructions and requirements of the Engineer-in-Charge.

All instructions and orders in respect of the work shall be given by the Engineer-in-Charge in writing. However, any verbal instructions or order shall be confirmed by the Engineer-in-Charge as soon as practicable without loss of time and only such written instruction shall be deemed to be valid.

CLAUSE – 14: SETTING OUT THE WORKS

The contractor shall provide all assistance and adhere to the instruction of E.I.C during the course of surveying, inspection, etc.

CLAUSE – 15: URGENT WORKS

If any urgent work (in respect of which the decision of the Engineer-in-Charge shall be final and binding) becomes necessary, the contractor shall execute the same as may be directed by Engineer-in-Charge, provided the directions are in accordance and confirmatory with provisions in Clause –8.

CLAUSE – 16: DEVIATIONS, VARIATIONS, EXTENT AND PRICING

The Engineer-in-Charge shall have power (i) to make alteration in, omissions from, additions to, or substitutions for the original specifications, drawings, designs and instructions that may appear to him to be necessary or advisable during the progress of the work, and (ii) to omit part of the works in case of non-availability of a portion of the site or for any other reasons and the contractor shall be bound to carry out the works in accordance with any instructions given to him in writing signed by the Engineer-in-Charge and such alterations, omissions, additions or substitutions shall form part of the contract as if originally provided therein and any altered, additional or substituted work which the contractor may be directed to do in the manner specified above as part of the works, shall be carried out by the contractor on the same conditions in all respects including price on which he agreed to do the main work except as hereafter provided.

The time for completion of the works shall, in the event of any deviations resulting in additional cost over the tendered value sum being ordered, be extended, if requested by the contractor, as follows:

- (i) In the proportion which the additional cost of the altered, additional or substituted work, bears to the original tendered value plus

- (ii) 20% of the time calculated in (i) above or such further additional time as may be considered reasonable by the Engineer-in-Charge after approval of the Competent Authority.

In the case of extra item(s) (items that are completely new, and are in addition to the items contained in the contract), the contractor may within fifteen days of receipt of order or occurrence of the item(s) claim rates, supported by proper analysis, for the work and the Engineer-in-Charge shall within one month of the receipt of the claims supported by analysis, after giving consideration to the analysis of the rates submitted by the contractor, determine the rates on the basis of the market rates and the contractor shall be paid in accordance with the rates so determined.

In the case of substituted items (items that are taken up with partial substitution or in lieu of items of working the contract), the rate for the agreement item (to be substituted) and substituted item shall also be determined in the manner as mentioned in the following Para.

- (a) If the market rate for the substituted item so determined is more than the market rate of the agreement item (to be substituted), the rate payable to the contractor for the substituted item shall be the rate for the agreement item (to be substituted) so increased to the extent of the difference between the market rates of substituted item and the agreement item (to be substituted).
- (b) If the market rate for the substituted item so determined is less than the market rate of the agreement item (to be substituted), the rate payable to the contractor for the substituted item shall be the rate for the agreement item (to be substituted) so decreased to the extent of the difference between the market rates of substituted item and the agreement item (to be substituted).

In the case of contract items, substituted items, contract cum substituted items, which exceed the deviation limits laid down in Schedule 'B', the contractor may within fifteen days of receipt of order or occurrence of the excess, claim revision of the rates, supported by proper analysis for the work in excess of the above mentioned limits, provided that if the rates so claimed are in excess of the rates specified in the schedule of quantities, the Engineer-in-Charge shall within one month of receipt of the claims supported by analysis, after giving consideration to the analysis of the rates submitted by the contractor, determine the rates on the basis of the market rates and the contractor shall be paid in accordance with the rates so determined.

The provisions of the paragraph 16.4 above shall also apply to the decrease in the rates of items for the work in excess of the limits laid down in Schedule 'B', and the Engineer-in-Charge shall after giving notice to the contractor within one month of occurrence of the excess and after taking into consideration any reply received from him within fifteen days of the receipt of the notice, revise the rates for the work in question within one month of the expiry of the said period of fifteen days having regard to the market rates.

Under the circumstances, the contractor shall at any stage not suspend the work on account of non-settlement of rates of such Deviated/Extra/Substituted items.

CLAUSE - 17: CONTRACTOR'S SUPERVISION

The contractor shall either himself supervise the execution of the works or shall appoint at his own expense, a qualified and experienced Engineer as his accredited agent approved by the Engineer-in-Charge, if contractor has himself not sufficient knowledge or experience to be capable of receiving instruction or cannot give his full attention to the works. The contractor or his agent shall be present at the site(s) and shall supervise the execution of the works with such additional assistance in each trade, as the work involved shall require and considered essential by the Engineer-in-Charge. Further the directions/instructions given by the Engineer-in-Charge to the contractor's agent shall be considered to have the same force as if these had been given to the contractor himself.

If the contractor fails to appoint a suitable agent as directed by the Engineer-in-Charge, the Engineer-in-Charge shall have full powers to suspend the execution of the works until such date as a suitable

agent is appointed by the contractor and takes over the charge of supervision of the work. For any such suspension, the contractor shall be held responsible for delay so caused to the work.

CLAUSE - 18: INSTRUCTIONS AND NOTICE

Except as otherwise provided in this contract, all notices to be given on behalf of the Authority and all other actions to be taken on its behalf may be given or taken by the Engineer-in-Charge or any officer for the time being entrusted with the functions, duties and powers of the Engineer-in-Charge.

All instructions, notices and communications etc. under the contract shall be given in writing and any such oral orders / instructions given shall be confirmed in writing and no such communication which is not given or confirmed in writing shall be valid.

All instructions, notices and communications shall be deemed to have been duly given or sent to the contractor, if delivered to the contractor, his authorized agent, or left at, or posted to the address given by the contractor or his authorized agent or to the last known place of abode or business of the contractor or his agent of services by post shall be deemed to have been served on the date when in the ordinary course of post these would have been delivered to him and in other cases on the day on which the same were so delivered or left.

The Engineer-in-Charge shall communicate or confirm the instructions to the contractor in respect of the execution of work through a "Site Order Book" maintained in the office of the Engineer-in-Charge and the contractor or his authorized representative shall confirm receipt of such instructions by signing the relevant entries in this book. If required by the Contractor, he shall be furnished a certified true copy of such instruction(s). The pro-forma for Site Order Book to be maintained at site is given in **Annexure –10**.

The "Hindrance Register" shall be maintained at the site of work, where any hindrance which comes to the notice of the representative of the Engineer-in-Charge shall be recorded and immediately a report will be made to the Engineer-in-Charge within a week. The Engineer-in-Charge shall review the Hindrance Register at least once in a month. The pro-forma on which the Hindrance Register shall be maintained is given in **Annexure –11**.

CLAUSE -19: PLANT AND EQUIPMENT

The plants and equipment required for the execution of dredging works and all additional necessary plant, equipment and machinery required for the execution of the work under the contract shall be brought to the site by the Contractor at his cost and shall use such methods and appliances for the purpose of all the operations connected with the work covered by the contract, which shall ensure the completion of work(s) within the specified time.

The contractor shall operate, maintain, repair and safeguard the plants and equipment during the tenancy of the contract in accordance with terms and conditions, specifications of the contract and instructions of the Engineer in Charge.

Subject to the availability of any item(s), plant, equipment and machinery, the Authority at the written request of the contractor, may issue to the contractor on hire for being deployed on the work contracted for, at pre-determined rates, terms and conditions at the sole discretion of the Engineer-in-Charge.

CLAUSE – 20: PATENT RIGHTS

The contractor shall indemnify the Authority, its representatives or its employees against any action, claim or proceeding relating to infringement or use of any patent or design or any alleged patent or design rights and shall pay any royalties or other charges which may be payable in respect of any article or material or part thereof included in the contract. In the event of any claim being made or action being brought against the Authority or any agent, servant or employee of the Authority in respect of any such materials as aforesaid the contractor shall immediately be notified thereof. Provided that such indemnification shall not apply when such infringement has taken place in complying

with the specific directions issued by the Authority but the contractor shall pay any royalties or other charges payable in respect of any such use, the amount so paid being reimbursement to the contractor only if the use was the result of any drawings and or specifications issued after submission of the tender.

CLAUSE – 21: MATERIALS

The contractor shall at his own expenses provide / arrange all materials required for the bona- fide use on work under the contract.

All materials/parts to be provided by the contractor shall be in conformity with the specifications laid down in the contract and the contractor shall furnish from time to time proof and samples, at his own cost, the materials/parts as may be specified by the Engineer- in-Charge. Further the Engineer-in-Charge shall also have powers to have such tests, in addition to those specified in the contract, as may be required and the contractor shall provide all facilities to carry out the same. The cost of materials/parts consumed in such tests and also the expenses incurred thereon including the cost of the testing charges, shall be borne by the contractor in all cases and also where such tests which are in addition to those provided in the contract disclose that the materials are in conformity with the provisions of the contract.

The Engineer-in-Charge or his representative shall be entitled at any time to inspect and examine any plants, materials/parts intended to be used in the works, either on the site or at factory or workshop or other place(s) where such materials are assembled, fabricated, manufactured or any place where these are lying or from where these are being obtained. For this, purpose, the contractor shall afford such facilities as may be required for such inspection and examination.

CLAUSE - 22: LAWS GOVERNING THE CONTRACT

The Courts at **Noida** only shall have the jurisdiction for filing the award of the arbitration and for any other judicial proceedings.

CLAUSE - 23: WATCH & WARD AND LIGHTING

The Contractor shall provide and maintain at his expense all lights, guards, fencing and watch & ward when and where necessary or as required by the Engineer-in-Charge for the protection of the works or forth safety and convenience of those employed on the works or the public.

CLAUSE - 24: WORK DURING NIGHT OR ON SUNDAYS AND HOLIDAYS

Subject to any provisions to the contrary contained in the contract, none of the works shall be carried out during Sundays and national holidays without the permission in writing of the Engineer-in-Charge. However, when work is unavoidable or necessary for safety of life, property or works, contractor shall take necessary action immediately and advise the Engineer- in-Charge accordingly.

The Engineer-in-Charge at its discretion may, however, direct the contractor that the work may be carried out on holidays, Sundays and/or in extra shifts to ensure completion of works under the contract as scheduled.

CLAUSE - 25: LABOUR

- (a) The contractor shall employ labour in sufficient numbers to maintain the required rate of progress and of quality to ensure workmanship of the degree specified in the contract and to the satisfaction of the Engineer-in-Charge. The Contractor shall not employ in connection with the works any person who has not completed eighteen years of age the minimum age specified in Indian Labour Law.
- (b) If any foreigner is employed by the contractor on the work within the site the later shall ensure that such foreigner possesses the necessary special permit issued by the Civil Authorities in writing and also comply with the instructions issued there-from from time to time. In the event of any lapse

in this regard on the part of such foreigner the contractor shall be personally held responsible for the lapse & Authority shall not be liable in any event.

- (c) The Contract is liable for cancellation if either the contractor himself or any of his employee is found to be a person who has held Class-I post under the Authority immediately before retirement and has within two years of such retirement accepted without obtaining the previous permission of the Authority or of the Chairman as the case may be and employment as contractor for, or in connection with the execution of the public works, or as an employee of such contractor. If the contract is terminated on account of the failure of the contractor to comply with the above clause, the Authority shall be entitled to recover from him such damages as may be determined by the Engineer-in-Charge with due regard to the inconvenience caused to the Authority on account of such termination without prejudice to the Authority's right to proceed against such officer.

The contractor shall furnish and deliver fortnightly to the Engineer-in-Charge, a distribution return of the number and description by trades of the works of people employed on the works. The contractor shall also submit on the 4th and 19th of every month for the period of second half of the preceding month and first half of the current month respectively to the Engineer-in-Charge, a true statement in respect of the following.

- i) Any accident if occurred during the said fortnight showing the circumstances under which it happened and the extent of damage and injury caused by it and.
- ii) The number of female workers who have been allowed maternity benefit as provided in the Maternity Benefit Act 1961 or Rules made there-under and the amount paid to them.

The Contractor shall pay to laborer employed by him either directly or through sub-contractors wages not less than wages as defined in Minimum Wages Act 1948 and Contract Labour (Regulation and Abolition) Act 1970 amended from time to time and rules framed there-under and other labour laws affecting contract labour that may be brought in force from time to time.

The Contractor shall also comply with the provisions of all Acts, Laws, any Regulation or Bye Laws of any Local or other Statutory Authority applicable in relation to the execution of works such as:

- i) Payment of Wages Act, 1936(Amended)
- ii) Minimum Wages Act, 1948(Amended).
- iii) The Contract Labour (Regulation & Abolition) Act, 1970 with Rules framed there under as amended.
- iv) Workmen Compensation Act, 1923 as amended by Amendment Act no.65 of 1976.
- v) Employer's Liability Act 1938(Amended)
- vi) Maternity Benefit Act. 1961(Amended)
- vii) The Industrial Employment (Standing orders) Act 1946(Amended).
- viii) The Industrial Disputes Act. 1947(Amended)
- ix) Payment of Bonus Act.1965 and Amended Act No. 43 of 1977 and No. 48 of 1978 and any amended there of:
- x) The Personal Injuries (Compensation Insurance) Act 1963 and any modifications thereof and rules made there-under from time to time. The Contractor shall take into account all the above and financial liabilities in his quoted rates and nothing extra, whatsoever, shall be payable to him on this account.

The list is indicative only, otherwise the contractor should be aware of all the Acts/Labour Laws and should follow diligently on the work. The contractor shall be fully and personally responsible for the violation of any Act/Labour Law

The Contractor shall be liable to pay his contribution and the employees contribution to the State Insurance Scheme in respect of all labour employed by him for the execution of the contract, in accordance with the provision of "the Employees State insurance Act 1948" as amended from time to time. In case the Contractor fails to submit full details of his account of labour employed and the contribution payable, the Engineer-in-Charge shall recover from the running bills the contribution amount as assessed by him. The amount so recovered shall be adjusted against the actual contribution payable for Employees State Insurance.

The Engineer-in-Charge shall on a report having been made by an inspecting officer as defined in the Contract Labour (Regulation and Abolition) Act and Rules or on his own in his capacity as Principal Employer, have the power to deduct from the amount due to the contractor any sum required for making good the loss suffered by worker(s) by reason of non-fulfillment of the conditions of the Contract for the benefit of Workers, non-payment of wages or on account of deduction made from the wages of the workers which are not justified by the terms of the contract or non-observance of the said Act and Rules framed there under with amendments made from time to time.

The Contractor shall indemnify the Authority against any payments to be made under and for observance of the Regulation Laws, Rules as stipulated in Clause-25.4 above without prejudice to his right to claim indemnity from his sub-contractors. In the event of the contractor's failure to comply with the provisions of all the Acts/Laws stipulated in Clause-25.4 or in the event of decree or award or order against the contractor having been received from the competent authority on account of any default or breach or in connection with any of the provisions of the Acts/Laws/Rules mentioned in Sub-Clause 25.4 above, the Engineer-in-Charge without prejudice to any other right or remedy under the contract shall be empowered to deduct such sum or sums from the Bill of the contractor or from his security deposit or from other payment due under this contract or any other contract to satisfy within a reasonable time the provisions of the various Acts/Laws/Rules/Codes as mentioned under Sub-Clause 25.4 above, on the part of the contractor under the contract on behalf of and at the expenses of the contractor and make payment and /or provide amenities/ facilities/services accordingly. In this regard, the decision of the Engineer-in-Charge shall be conclusive and binding on the contractor.

In the event or the Contractor committing a default or breach of any of the provisions of the aforesaid Contract's Labour (Regulation and Abolition) Act and Rules as amended from time to time or furnishing any information or submitting or filling any form/Register/Slip under the provisions of these Regulations which is materially incorrect then on the report of the Inspecting officer as defined in the relevant Acts and Rules as referred in Clause 25.4 above, the Contractor shall without prejudice to any other liability pay to the Authority a sum not exceeding Rs.50/- (Rs. Fifty only) as liquidated damages for every default, breach or furnishing, making, submitting, filling materially incorrect statement as may be fixed by the Engineer-in-Charge. The decision of the Engineer-in-Charge in this respect shall be final & binding.

The Contractor shall at his own expenses comply with or cause to be complied with the Provisions/Rules provided for welfare and health of Contract Labour in the Contract Labour (Regulation and Abolition) Act and other relevant Acts and Rules framed there under or any other instructions issued by the Authority in this regard for the protection of health and for making sanitary arrangements for workers employed directly or indirectly on the works. In case the contractor fails to make arrangements as aforesaid, the Engineer-in-Charge shall be entitled to do so and recover the cost thereof from the contractor.

The Contractor shall at his own expense arrange for the safety or as required by the Engineer-in-Charge, in respect of all labour directly or indirectly employed for performance of the Works and shall provide all facilities in connection therewith. In case the contractor fails to make arrangements and provide necessary facilities as aforesaid, the Engineer-in-Charge shall be entitled to do so and recover the cost thereof from the Contractor. But this will not absolve the contractor of his responsibility or otherwise thereof.

Failure to comply with "Provisions/Rules made for Welfare and Health of Contract Labour" Safety

Manual, or the provisions relating to report on accidents and grant of maternity benefits to female workers and the relevant Acts/Rules referred in clause 25.4 above shall make the contractor liable to pay to the Authority as liquidated damages an amount not exceeding Rs. 50/- for each default or materially incorrect statement. The decision of the Engineer-in-Charge in such matters based on reports from the inspecting Officers as defined in the relevant Acts and Rules as referred in clause 25.4 above shall be final and binding and deductions for recovery of such liquidated damages may be made from any amount payable to the contractor. In the event of any injury, disability or death of any workmen in or about the work employed by the contractor either directly or through his sub-contractor, contractor shall at all time indemnify and save harmless the Authority against all claims, damages and compensation under the Workmen Compensation Act, 1923 as amended from time to time or in other Law for the time being in force and Rules there-under from time to time and also against all costs, charges and expenses of any smooth action by proceedings arising out of such accidents or injury, disability or death of a workmen and against all sum or sums which may with the consent of the contractor be paid to compromise or compound any claim in this regard. If any award, decree or order is passed against the contractor for recovery of any compensation under the Workmen Compensation Act, 1923, for any injury, disability or death of a workman by any competent court, the said sum or sums shall be deducted by the Engineer-in-Charge from any sum then due or that may become due to the contractor or from his security deposit or sale thereof in full or part under the contract or any other contract with the Authority towards fulfillment of the said decree, award or orders.

Provided always that the contractor shall have no right to claim payments/claims whatsoever on account of his compliance with his obligations under this clause and Labour Regulations.

The contractor shall not otherwise than in accordance with the statutes ordinance and Government Regulations or orders for the time being in force import, sell, give, barter or otherwise dispose of any alcoholic liquor or drugs to permit or suffer any such import, sale, gift, barter or disposal by his sub-contractor, agent or employees.

The contractor shall not give, barter or otherwise dispose of to any person or persons any arms or ammunition of any kind or permit to suffer the same as aforesaid.

The Contractor shall employ for the execution of the works only such persons as are skilled and experienced in their respective trades and Engineer-in-Charge shall be at liberty to object to and require the contractor to remove from the works any persons employed by the Contractor for the execution of the works who, in the opinion of the Engineer-in-Charge, misconduct himself or is incompetent or negligent in the proper performance of his duties. The contractor shall forthwith comply with such requisition and such person shall not be again employed upon the works without permission of the Engineer-in-Charge.

Release of Security deposit after labour clearance: Security deposit of the work shall not be refunded till the contractor produces a clearance certificate from the Labour Officer. As soon as the work is virtually completed, the contractor shall apply for clearance certificate to the Labour Officer under intimation to Engineer-in-Charge. The Engineer-in-Charge on the receipt of such communication shall write to Labour Officer to intimate if any complaint is pending against the contractor in respect of the work. If no complaint is pending on record till after three months after completion of work and/or no communication is received from Labour Officer to this effect till six months after the date of completion, it will be deemed to have received the clearance certificate and the security deposit will be released if otherwise due.

CLAUSE-26: MATERIALS OBTAINED FROM EXCAVATION SUCH AS COINS, FOSSILS, ETC.

Materials of any kind obtained from excavation on the site shall remain the property of the Authority and shall be disposed off as directed by the Engineer-in-Charge.

However if any of the materials thus obtained from excavation on the site is such as can be used in the execution of the work under the contract, the contractor will be allowed to use the same free of cost (except that any amount of royalty paid for in this regard by the Authority shall be recoverable from the contractor) for the aforesaid purpose provided the same is found suitable and is approved by the Engineer-in-Charge.

Fossils, coins, articles of value, structures and other remains or things of geological or archeological interest discovered on the site shall be the absolute property of the Authority. The contractor shall take reasonable precautions to prevent his labour or any other person from removing or damaging any such article or thing and shall acquaint the Engineer-in-Charge with such discovery and carry out the Engineer-in-Charge's directions as to the disposal of the same at the expense of the Authority.

CLAUSE – 27: FORCE MAJEURE

The term Force Majeure shall herein mean Riots (other than among the contractor's employees), Civil Commotion (to the extent no insurable), war (whether declared or not), invasion, act of foreign enemies, hesitation, civil war, rebellion, revolution, insurrection, military or usurped power, damage from aircraft, nuclear fission, acts of God, such as earthquake (above 7 magnitude on Richter Scale), lightning, unprecedented floods, fires not caused by contractor's negligence and other such causes over which the contractor has no control and are accepted as such by the Engineer-in-Charge, whose decision shall be final and binding. In the event of either party being rendered unable by Force Majeure to perform any obligation required to be performed by them under this contract, the relative obligation of the party affected by such Force Majeure shall be treated as suspended for the period during which such Force Majeure cause lasts, provided the party allowing that it has been rendered unable as aforesaid, thereby shall notify within 15 days of the alleged beginning and ending thereof giving full particulars and satisfactory evidence in support of such cause.

For delays arising out of Force Majeure, the bidder shall not claim extension in completion date for a period exceeding the period of delay attributable to the causes of Force Majeure and neither the Authority nor the bidder shall be liable to pay extra costs provided it is mutually established that Force Majeure conditions did actually exist.

If any of the Force Majeure conditions exists in the places of operation of the bidder even at the time of submission bid, he shall categorically specify in his bid and state whether they have been taken into consideration in their quotations.

CLAUSE - 28: LIABILITY FOR DAMAGE, DEFECTS OR IMPERFECTIONS AND RECTIFICATION THEREOF

If the contractor or his labour or his sub-contractor, injure, destroy or damage, battery, solar panel, lighting system, road, fence, enclosures, water pipe, cables, buildings, drains, electricity or telephone posts, wires, trees, grass line, cultivated land in the area in which they may be working or in the area contiguous to the premises on which the work or any part of it is being executed or if any damage is caused to any item belonging to IWAI or to any person during the progress of work, the Contractor shall upon receipt of a notice in writing in that behalf from the Engineer-in-Charge, make good the same at his cost.

If it appears to the Engineer-in-Charge or his representative at any time during the progress of work or prior to the expiration of the Defects Liability period that any work has been executed with unsound, imperfect or unskilled workmanship or that any materials or articles provided by the Contractor for execution of the work are unsound or of a quality inferior to that contracted for, or otherwise not in accordance with the Contract, or that any defect, shrinkage or other faults found in the work arising out of defective design or defective/improper materials or workmanship, the Contractor shall, upon receipt of a notice in writing in that behalf from the Engineer-in-Charge forthwith rectify or remove and reconstruct the work so specified in whole or in part, as the case may be, and/or remove the materials/articles so specified and provide other proper and suitable materials at his expense.

All damages caused by accidents or carelessness of the contractor or any of his employees or any property belonging to the Authority is wasted or is misused by the contractor or any of his employees shall be to the account of the contractor, who shall make good the loss.

Defects liability period for the civil works like bank protection, jetty, culvert etc. shall be 6 months from the date of completion of all works under the contract. Dredging / excavation will not have a defects liability period once the required lines & levels are achieved and the same measured and jointly recorded in post dredging survey charts and the chart approved by the E-I-C.

CLAUSE – 29: CONTRACTOR'S LIABILITY AND INSURANCE

From commencement to completion of the work(s) as a whole, the Contractor shall take full responsibility for the care thereof and for taking precautions to prevent loss or damage. He shall be liable for any damage or loss that may happen to the works or any part thereof and to the Authority's Plant, Equipment and Material (hired or issued to the Contractor) shall be in good order and condition and in conformity in every respect with the requirements of the Contract and instructions of the Engineer-in-Charge.

- i) Neither party to the contract shall be liable to the other in respect of any loss or damage which may occur or arise out of "Force Majeure" to the works or any part thereof on to any material or article at site but not incorporated in the works or to any person or anything or material whatsoever or either party provided such a loss or damage could not have been foreseen or avoided by a prudent person and the either party shall bear losses and damages in respect of their respective men and materials. As such liability of either party shall include claims/compensations of the third party also.
- ii) Provided, however, in an eventuality as mentioned in sub-clause - 29.2 (i) above, the following provisions shall also have effect:
 - (a) The Contractor shall, as may be directed in writing by the Engineer-in-Charge proceed with the completion of the works under and in accordance with the provisions and conditions of the contract, and
 - (b) The Contractor shall, as may be directed in writing by the Engineer-in-charge, re- execute the works lost or damaged, remove from the site any debris and so much of the works as shall have been damaged and carry the Authority's T & P, Plant and Equipment, Material etc. to the Authority's store. The cost of such re-execution of the works, removal of damaged works and carrying of Authority's store shall be ascertained in the same manner as for deviations and this shall be ascertained in the same manner as for deviations and this shall be added to the contract sum. Provided always that the Contractor shall, at his own cost, repair and make good so much of the loss or damage as has been occasioned by any failure on his part to perform his obligations under the contract or not taking precautions to prevent loss or damage or minimize the amount of such loss or damage, Final assessment of loss or damage

Shall be decided by the Engineer-in-Charge and his decision shall be final and binding.

The contractor shall take special precautions to see that public places and roads adjacent to contractor's yard are not blocked at any time either by his material or by his workmen. The roads are to be kept always clear and no equipment/materials shall be stacked.

The navigable waterways shall not be blocked by Contractor's vessels. The anchors dropped in the waterways shall be properly marked and removed after done with.

The contractor shall indemnify and keep indemnified the Authority against all losses and claims for death, injuries or damage to any person or any property whatsoever which may arise out of or in consequence of the construction and maintenance, of works during the contract period and also against all claims, demands, proceedings, damages, costs, charges and expenses whatsoever in respect of or in relation thereto, and such liabilities shall include claims/compensations of the third party.

(a) Before commencing execution of the work, the Contractor shall without in any way limiting his obligations and responsibilities under this condition, insure against any damage, loss or injury which may occur to any property (excluding that of the Authority but including the Authority building rented to the contractor wholly or in part and any part of which is used in part and any part of which is used by him for storing combustible materials) public liability by arising out of the carrying out of the contract. For this purpose the contractor shall take out, pay all costs and maintain throughout the period of his contract public liability with the following coverage.

- i) Public liability limits for bodily injury or death not less than Rs. 1,00,000 for one person and Rs. 2,00,000 for each accident.
 - ii) Property liability limits for each accident not less than Rs. 1,00,000;
 - iii) The Contractor shall prove to the Engineer-in Charge from time to time that he has taken out all the insurance policies referred to above and has paid the necessary premiums for keeping the policies alive till expiry of the Defects Liability Period.
- (b) The Contractor shall ensure that similar insurance policies are taken out by his sub-contractor (if any) and shall be responsible for any claims or losses to the Authority resulting from their failure to obtain adequate insurance protection in connection thereof. The Contractor shall produce or cause to be produced by his sub-contractors (if any) as the case may be, relevant, policy or policies and premium receipt as and when required by the Engineer-in-Charge.
- (c) If the contractor and/or his sub-contractor (if any) shall fail to effect and keep in force the insurance referred to above or any other insurance which he/they may be required to effect under the term of the Contract then and in any such case the Authority may, without being bound to effect and keep in force any such insurance and pay such premium or premiums as may be necessary for that purpose and from time to time deduct the amount so paid by the Authority from any moneys due or which may become due to the contractor or recover the same as a debt due from the contractor.
- (d) The contractor shall at his own expense arrange for the safety provisions as required in respect of the works covered under this contract as per the instruction of Engineer-in-charge. In case, the contractor fails to comply with the provisions of the safety the Engineer-in-Charge shall be entitled to and make the necessary arrangements at the risk and cost of the contractor. This will, however, not absolve the Contractor of his overall responsibility to execute the works under the contract.

CLAUSE – 30: SUSPENSION OF WORKS

The contractor shall on the receipt of order of the Engineer-in-Charge (whose decision shall be final and binding on the contractor) suspend the progress of the works or any part thereof for such time or times and in such manner as the Engineer-in-Charge may consider necessary.

The suspension of the work can be done by Engineer-in-Charge for any of the following reasons:

- (a) On account of any default on the part of the contractor or
- (b) for proper execution of the works or part thereof for the reasons other than the default of the contractor or
- (c) for the safety of the works or part thereof.

The contractor shall during the suspension period, properly protect and secure the works to the extent necessary and carry out the instructions given in that behalf by the Engineer-in-Charge.

If the suspension is ordered for the reasons under the Clause 30.2(b) and (c) above, the contractor shall be entitled to the extension of time equal to the period of every such suspension Plus 25% for the completion of the item or group of items of work for which a separate period of completion is specified in the contract and of which suspended work forms apart

CLAUSE – 31: FORECLOSURE OF CONTRACT IN FULL OR IN PART DUE TO ABANDONMENT OR REDUCTION IN SCOPE OF WORK

If at any time after acceptance of the tender the Authority decides to abandon or reduce the scope of the works for reason whatsoever and hence does not require the whole or any part of the works to be carried out, the Engineer-in-Charge (with the prior approval of competent authority mentioned in **Schedule ‘B’**) shall give notice in writing to that effect to the contractor and the Contractor shall have no claim to any payment of compensation or otherwise whatsoever, on account of any profit or advantage which he might have derived from the execution of the works in full but which he could not derive in consequence of the fore closure of the whole or part of the works.

CLAUSE – 32: TERMINATION OF CONTRACT ON DEATH

If the Contractor is an individual or a proprietary concern and the individual or the proprietor dies, or if the Contractor is a partnership concern and one of the partners dies, then, unless the Engineer-in-Charge is satisfied that the legal representatives of the individual contractor or of the proprietor of the proprietary concern and in the case of partnership, the surviving partners are capable of carrying out and completing the contract, the Engineer-in-Charge shall be entitled to terminate the Contract as to its incomplete part without the Authority being in anyway liable to payment of any compensation whatsoever on any account to the estate of the deceased Contractor and/or to the surviving partners of the Contractor's firm on account of termination of the Contract. The decision of the Engineer-in-Charge that the legal representatives of the deceased contractor or the surviving partners of the Contractor's firm cannot carry out and complete the works under the contract shall be final and binding on the parties. In the event of such termination, the Authority shall not hold the estate of the deceased Contractor and/or the surviving partners of the Contractor's firm liable for damages for not completing the contract. Provided that the power of the Engineer-in-Charge of such termination of contract shall be without prejudice to any other right or remedy which shall have accrued or shall accrue to him under the contract.

CLAUSE– 33: CARRYING OUT PART OF WORK AT THE RISK AND COST OF THE CONTRACTOR

If the contractor

- (i) At any time makes default during the currency of work or does not execute any part of the work with due diligence and continues to do so even after a notice in writing of 7 days in this respect from the Engineer-in-Charge; **or**
- (ii) Commits default in complying with any of the terms and conditions of the contract and does not remedy it or takes effective steps to remedy it within 7 days even after a notice in writing is given in that behalf by the Engineer-in-Charge; **or**
- (iii) Fails to complete the work (s) or items of work with individual dates of completion, on or before the date (s) so determined, and does not complete them within the period specified in the notice given in writing in that behalf by the Engineer-in-Charge.

The Engineer-in-Charge without invoking action under clause 36 may, without prejudice to any

other right or remedy against the contractor which have either accrued or accrue thereafter to IWAI, by a notice in writing to take the part work/part incomplete work of any item (s) out of his hands and shall have powers to:

- (a) Take possession of the site and any materials, constructional plant, implements, stores, etc., thereon; and/or
- (b) Carry out the part work/ part incomplete work of any items (s) by any means at the risk and cost of the contractor.

The Engineer-in-Charge shall determine the amount, if any, is recoverable from the contractor for completion of the part work/ part incomplete work of any item (s) taken out of his hands and execute at the risk and cost of the contractor, the liability of contractor on account of loss or damage suffered by IWAI because of action under this clause shall not exceed 10% of the tendered value of the work.

In determining the amount, credit shall be given to the contractor with the value of work done in all respect in the same number and at the same rate as if it had been carried out by the original contractor under the terms of his contract, the value of contractor's materials taken over and incorporated in the work and use of plant and machinery belonging to the contractor. The certificate of the Engineer-in-Charge as to the value of work done shall be final and conclusive against the contractor provided always that action under this clause shall only be taken after giving notice in writing to the contractor. Provided also that if the expenses incurred by the IWAI are less than the amount payable to the contractor at his agreement rates, the difference shall not be payable to the contractor.

Any excess expenditure incurred or to be incurred by IWAI in completing the part work/ part incomplete work of any item (s) or the excess loss of damages suffered or may be suffered by IWAI as aforesaid after allowing such credit shall without prejudice to any other right or remedy available to IWAI in law or per as agreement be recovered from any money due to the contractor on any account, and if such money is insufficient, the contractor shall be called upon in writing and shall be liable to pay the same within 30days.

If the contractor fails to pay the required sum within the aforesaid period of 30 days, the Engineer-in-Charge shall have the right to sell any or all of the contractors' unused materials, constructional plant, implements, temporary building at site etc. and adjust the proceeds of sale thereof towards the dues recoverable from the contractor under the contract and if thereafter there remains any balance outstanding, it shall be recovered in accordance with the provisions of the contract.

In the event of the above course being adopted by the Engineer-in-Charge, the contractor shall have no claim to compensation for any loss sustained by him by reason of his having purchased or procured any materials or entered into any engagements or made any advance on any account or with a view to the execution of the work or the performance of the contract.

CLAUSE - 34: COMPLETION TIME AND EXTENSIONS

The Engineer-in-Charge will make available to the contractor the site to enable the contractor to commence & proceed with the execution of the work in accordance with agreed programme. If there is any delay in making available any area of the work or the delays mentioned in Para 34.4, the competent authority as specified in schedule 'B' on the recommendations of the Engineer-in-Charge shall grant reasonable extension of time for completion of work. But the contractor shall not claim any compensation whatsoever on this account.

If after the award of the work the contractor commits defaults in commencing the execution of work as aforesaid, Govt. shall without prejudice to any other right or remedy available in law, be at liberty to forfeit the earnest money & performance guarantee absolutely.

As soon as possible after the Contract is concluded, the Contractor shall submit a Time and Progress Chart get it approved by the Department. The Chart shall be prepared in direct relation to the time stated in the Contract documents for completion of items of the works. It shall indicate the forecast of

the dates of commencement and completion of various trades of sections of the work.

However, if the work (s) be delayed by:-

- (i) Force majeure as per clause 27, or
- (ii) Abnormally bad weather, or
- (iii) Serious loss or damage by fire, or
- (iv) Civil commotion, local commotion of workmen, strike or lockout, affecting any of the trades employed on the work, or
- (v) Delay on the part of other contractors or tradesman engaged by Engineer-in-Charge in executing work not forming part of the contract, or
- (vi) Non-availability of stores, which are the responsibility of Government to supply or
- (vii) Non-availability of breakdown of Tools and Plant to be supplied or supplied by Government or
- (viii) Any other cause which, in the absolute discretion of the Engineer-in-Charge is beyond the Contractor's control.

Then immediately upon the happening of any such events as aforesaid, the contractor shall inform the Engineer-in-Charge accordingly, but the contractor shall nevertheless use constantly his best endeavors to prevent and/or make good the delay and shall do all that may be required in this regard. The Contractor shall also request, in writing, for extension of time, to which he may consider himself eligible under the contract, within fourteen days of the date of happening of any such events as indicated above.

In case the cost of the work is more than 10 crores, then the total scope of work will be divided into mile stones. The contractor shall submit a Time & Progress chart for each milestone and get it approved by the competent authority.

Request for rescheduling of Milestones and extension of time, to be eligible for consideration, shall be made by the Contractor in writing within fourteen days of the happening of the event causing delay on the prescribed form to the competent authority as indicated in Schedule 'B'. The Contractor may also, if practicable, indicate in such a request the period for which extension is desired.

In any such case as may have arisen due to any of the events, as aforesaid, and which may have been brought out by the contractor in writing, the Competent Authority mentioned in Scheduled 'B' may give a fair and reasonable extension of time, after taking into consideration the nature of the work delayed and practicability of its execution during the period of extension.

Such extensions shall be communicated to the contractor by the Engineer-in-Charge in writing. The contractor shall not be entitled to claim any compensation or over run charges whatsoever for any extension granted.

CLAUSE – 35: LIQUIDATED DAMAGES FOR DELAY

If the contractor fails to maintain the required progress in terms of clause 34 or to complete the work and clear the site on or before the date of completion as per the contract or extended date of completion, he shall, without prejudice to any other right or remedy available under the law to the authority on account of such breach, pay as agreed liquidated damages the amount calculated at the rates stipulated below.

- | | | |
|-----|---|---|
| (i) | Liquidated Damages
for delay of work | @ 1.5 % per month of delay
to be computed on per day basis |
|-----|---|---|

Provided always that the total amount of compensation for delay to be paid under this condition shall not exceed 10% of the Tendered Value of work.

The competent authority mentioned in Schedule 'B' (whose decision in writing shall be final & binding) may decide on the amount of tendered value of the work for every completed day/month (as applicable) that the progress remains below that specified in Clause 34 or that the work remains

incomplete.

The amount of liquidated damages may be adjusted or set-off against any sum payable to the Contractor under this or any other contract with the authority.

In case of contracts having tendered amount more than 10 Crores, if the contractor does not achieve a particular milestone mentioned in Schedule 'B', or the re-scheduled milestone(s) in terms of Clause 34.6, the amount shown against that milestone shall be withheld, to be adjusted against the liquidated damages levied at the final decision on Extension of Time. With-holding of this amount on failure to achieve a milestone, shall be automatic without any notice to the contractor. However, if the contractor catches up with the progress of work on the subsequent milestone(s), the withheld amount shall be released. In case the contractor fails to make up for the delay in subsequent milestone(s), amount mentioned against each milestone missed subsequently also shall be withheld. However, no interest, whatsoever, shall be payable on such withheld amount.

In case of contracts having tendered amount less than 10 Crores, if the work remains incomplete after the stipulated date of completion, the Engineer-in-charge may withhold 10% of the tendered value of the work from the running payments of the contractor pending final decision of the competent authority mentioned in schedule 'B' on the extension of time case. If the competent authority decides to grant extension of time without levy of liquidated damages or levy part of the total liquidated damages specified above then the balance withheld amount after adjusting the amount of the liquidated damages levied by the competent authority will be refunded to the contractor.

CLAUSE – 36: WHEN THE CONTRACT CAN BE DETERMINED

- 36.1 Subject to other provisions contained in this clause, the Engineer-in-Charge may, without prejudice to his any other rights or remedy against the contractor in respect of any delay, inferior workmanship, any claims for damages and/or any other provisions of this contract otherwise, and whether the date of completion has or has not elapsed, by notice in writing absolutely determine the contract in any of the following cases:
- (i) If the contractor having been given by the Engineer-in-Charge a notice in writing to rectify, reconstruct or replace any defective work or that the work is being performed in an inefficient or otherwise improper or un-workman like manner shall omit to comply with the requirement of such notice for a period of seven days thereafter.
 - (ii) If the contractor 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 he will be unable to secure completion of the work by the date for completion and continues to do so after a notice in writing of seven days from the Engineer-in-Charge.
 - (iii) If the contractor fails to complete the work within the stipulated date or items of work with individual date of completion, if any stipulated, on or before such date(s) of completion and does not complete them within the period specified in a notice given in writing in that behalf by the Engineer-in-Charge.
 - (iv) If the contractor persistently neglects to carry out his obligations under the contract and/ or commits default in complying with any of the terms and conditions of the contract and does not remedy it or take effective steps to remedy it within 7 days after a notice in writing is given to him in that behalf by the Engineer-in-Charge.
 - (v) If the contractor shall offer or give or agree to give to any person in IWAI service or to any other person on his behalf any gift or consideration of any kind as an inducement or reward for doing or forbearing to do or for having done or forborne to do any act in relation to the obtaining or execution of contract.
 - (vi) If the contractor shall enter into a contract with IWAI in connection with which commission has been paid or agreed to be paid by him or to his knowledge, unless the particulars of any such

commission and the terms of payment thereof have been previously disclosed in writing to the Engineer-in-Charge.

- (vii) If the contractor shall obtain a contract with IWAI as a result of wrong tendering or other non-bona-fide methods of competitive tendering or commits breach of integrity pact.
- (viii) If the contractor being an individual, or if a firm, any partner thereof shall at any time be adjudged insolvent or have a receiving order or order for administration of his estate made against him or shall take any proceedings for liquidation or composition (other than a voluntary liquidation for the purpose of amalgamation or reconstruction) under any Insolvency Act for the time being in force or make any conveyance or assignment of his effects or composition or arrangement for the benefit of his creditors or purport so to do, or if any application be made under any Insolvency Act for the time being in force for the sequestration of his estate or if a trust deed be executed by him for benefit of his creditors.
- (ix) If the contractor being a company shall pass a resolution or the court shall make an order that the company shall be wound up or if a receiver or a manager on behalf of accredit or shall be appointed or if circumstances shall arise which entitle the court or the creditor to appoint a receiver or a manager or which entitle the court to make a winding up order.
- (x) If the contractor shall suffer an execution being levied on his goods and allow it to be continued for a period of 21 days.
- (xi) If the contractor assigns, transfers, sublets (engagement of labour on a piece-work basis or of labour with materials not to be incorporated in the work, shall not be deemed to be subletting) or otherwise parts with or attempts to assign, transfer, sublet or otherwise parts with the entire works or any portion thereof without the prior written approval of the Engineer-in-Charge. When the contractor has made himself liable for action under any of the cases aforesaid, the Engineer-in-Charge on behalf of the IWAI with the approval of the competent authority mentioned in schedule 'B' shall have powers:
 - (a) To determine the contract as aforesaid (of which termination notice in writing to the contractor under the hand of the Engineer-in-Charge shall be conclusive evidence). Upon such determination, the Earnest Money Deposit, Security Deposit already recovered and Performance Guarantee under the contract shall be liable to be forfeited and shall be absolutely at the disposal of the IWAI.
 - (b) After giving notice to the contractor to measure up the work of the contractor and to take such whole, or the balance or part thereof, as shall be un-executed out of his hands and to give it to another contractor to complete the work. The contractor, whose contract is determined as above, shall not be allowed to participate in the tendering process for the balance work.

In the event of above courses being adopted by the Engineer-in-Charge, the contractor shall have no claim to compensation for any loss sustained by him by reasons of his having purchased or procured any materials or entered into any engagements or made any advances on account or with a view to the execution of the work or the performance of the contract. And in case action is taken under any of the provision aforesaid, the contractor shall not be entitled to recover or be paid any sum for any work thereof or actually performed under this contract unless and until the Engineer-in-Charge has certified in writing the performance of such work and the value payable in respect thereof and he shall only be entitled to be paid the value so certified.

CLAUSE – 37: INSPECTION AND APPROVAL

All works involving more than one process shall be subject to examination and approval at each stage thereof and the contractor shall give due notice to the Engineer-in-Charge on his authorized representative, when each stage is ready. In default of such notice, the Engineer-in-Charge shall be entitled to appraise the quality and extent thereof and the decision of the Engineer-in-Charge in this regard shall be final and binding.

No work shall be put out of view without the approval of the Engineer-in-Charge or his authorized

representative and the Contractor shall afford full opportunity for examination. The contractor shall give due notice to the Engineer-in-Charge or his authorized representative whenever any such work is ready for examination and the Engineer-in-Charge or his representative shall, without unreasonable delay, unless he considers it necessary and advise the contractor accordingly, examine and measure such work. In the event of the failure or the contractor to give such notice, he shall if required by the Engineer-in-Charge, uncover such work at the contractor's expenses.

Periodic inspection will be carried out by the EIC or his representative by their vessels. The contractor can have the inspection schedules finalized with the Engineer-in-Charge. Generally all attempts should be made to have joint inspection and number of inspections be not less than three in a calendar month.

CLAUSE – 38: COMPLETION CERTIFICATE AND COMPLETION PLANS

38.1 The work shall be completed to the entire satisfaction of the Engineer-in-Charge and within the specified time limit and under the terms and conditions of the contract. As soon as the work under the contractor is completed as a whole the contractor shall give notice of such completion to the Engineer-in-Charge. The Engineer-in-Charge shall inspect the work and shall satisfy himself that the work(s) has been completed in accordance with the provisions of the contract and then issue to the Contractor a certificate of completion indicating the date of completion. Should the Engineer-in-Charge notice that there are defects in the works or the works are not considered to be complete, he shall issue a notice in writing to the Contractor to rectify / replace the defective work or any part thereof or complete the work, as the case may be within such time as may be notified and after the contractor has complied with as aforesaid and gives notice of completion the Engineer-in-Charge shall inspect the work and issue the completion certificate in the same manner as aforesaid.

No certificate of completion shall be issued as stipulated above and no work be considered to be completed unless the contractor shall have removed from the work site and/or premises all his belongings / temporary arrangements brought/made by him for the site and / or premises in all respects and made the whole of the site and / or premises fit for immediate occupation / use to the satisfaction of the Engineer-in-Charge. If the contractor fails to comply with the above mentioned requirements on or before the date of completion of the work, the Engineer-in-Charge, may as he thinks fit and at the risk at cost of the contractor, fulfill such requirements and remove / dispose of the contractor's belongings / temporary arrangements, as aforesaid, and the contractor shall have no claim in this respect except for any sum realized by the sale of Contractor's belongings / temporary arrangements less the cost of fulfilling the said requirements and any other amount that may be due from the contractor. Should the expenditure on the aforesaid account exceed the amount realized by sale of such contractor's belongings / temporary arrangements then the contractor shall on demand pay the amount of such excess expenditure.

The contractor shall submit the completion plans of the work wherever required within 30 days of the completion of work. In case the contractor fails to submit completion plans as aforesaid, he shall be liable to pay a sum equivalent to 2.5% of the value of the work subject to a ceiling of Rs. 15000/- (Rupees fifteen thousand only) as may be fixed by Engineer-in-Charge concerned and in this respect the decision of the Engineer-in-Charge shall be final and binding on the contractor.

CLAUSE - 39: MEASUREMENTS

The Engineer-in-charge shall, except as otherwise provided, ascertain and determine by measurement the value of work done in accordance with the contract.

Notwithstanding any provision in the relevant standard method of measurement or any general or local custom, measurement of work done under the contract shall be taken in accordance with the procedure set forth in the Technical Specifications or Schedule of Quantities under the contract. In case of items of work which are not covered by the Technical Specifications or Schedule of Quantities measurement shall be taken in accordance with the relevant standard methods of measurement laid down by the Bureau of Indian Standard.

All items having a financial value shall be entered in daily log book/measurement book prescribed by the Authority so that the complete work performed under the contract is duly accounted.

Measurement shall be taken jointly by the Engineer-in-Charge or his authorized representative and by the contractor or his authorized representative.

Before taking measurements of any works, the Engineer-in-Charge or representative deputed by him for the purpose, shall give a reasonable notice to the Contractor. If the Contractor fails to attend or send an authorized representative for measurement after such notice or fails to countersign or to record the objection within a week from the date of taking the measurements, in such eventuality the measurements taken by the Engineer-in-Charge shall be taken to be correct and final measurements of such works.

The contractor shall, without extra charge, provide assistance with every appliance, labour and other things necessary for measurement.

Measurements shall be signed and dated by both parties each day on the Site on completion of measurement. If the contractor objects to any of the measurement recorded by the representative of the Engineer-in-Charge a note to the effect shall be made in the item objected to and such note shall be signed and dated by both parties engaged in taking the measurement. The decision of the Engineer-in-Charge on any such dispute or difference or interpretation shall be final and binding on the contractor in respect of all contract items, substituted items, extra items and deviations.

CLAUSE – 40: PAYMENT ON ACCOUNT

Interim bills shall be submitted by the contractor monthly on or before the date fixed by the Engineer-in-Charge for the items of work completed. The Engineer-in-Charge shall then arrange to have the bills verified with reference to the actual measurements recorded / pre or post dredging survey charts and quantity calculations in the measurement book(s).

Payment on account for amount admissible shall be made by the Engineer-in-Charge certifying the sum to which the contractor is considered entitled by way of interim payment for the work executed, after deducting there from the amount already paid, the security deposit and such other amounts as may be withheld, deductible or recoverable in terms of the contract.

Payment of the contractor's bills shall be made by the Authority only in Indian Rupees within 30 days from the date of submission of the bill subject to the acceptance of the Engineer-in-Charge.

Payments due to the contractor shall be made by crossed cheque by the Engineer-in-Charge or his authorized representative. Such cheques shall be issued direct to the contractor on furnishing a stamped receipt for the amount of the cheque or to his constituted attorney duly authorized to receive such payments from the EIC. Alternatively payment, due to the contractor shall be made by electronic bank transfer /RTGS

Any interim certificate given relating to work done or materials delivered may be modified or corrected by any subsequent interim certificate or by the final certificate. No certificate(s) of the Engineer-in-Charge supporting an interim payment shall itself be conclusive evidence that any work or materials to which it relates is / are in accordance with the same.

Should there be a request for extension of date of completion, pending its consideration interim payments shall continue to be made as provided herein.

Income Tax / TDS at the applicable rates shall be deducted at source from any payment made to the contractor against this contract.

CLAUSE – 41: TAXES, DUTIES AND LEVIES ETC.

The rates quoted by the bidder shall be deemed to be inclusive of all taxes, duties, cess, levies, etc. and also including 1% Labour Welfare Cess except for GST which shall be indicated and claimed separately. Labour Welfare Cess @ 1% of the value of the contract shall be deducted from the RA bills of the Contractor and deposited by IWAI as per norms of Govt. of India. The bidders to be given undertaking for Input Tax Credit in GST as per Annexure 13.

CLAUSE-42: TAX DEDUCTION AT SOURCE

42.1 TDS at the applicable rate as per Income Tax Act/Rules shall be deducted from all the payment/advances made against the contract.

CLAUSE – 43: PAYMENT OF FINAL BILL

The final bill shall be submitted by the contractor within one month from the date of completion of the work or of the date the certificate of completion furnished by the Engineer- in-Charge. No further claim in this regard unless as specified herein under shall be entertained. Payment of final bill shall be made within three months if the amount of the contract is up to Rs. 15 lakhs and six months if the value of the work exceeds Rs. 15 lakhs. If there shall be any dispute about any item or items of the work then the undisputed item or items only shall be paid within the said period of three months or six months, as the case may be. The contractor shall submit a list of the disputed items within thirty days from the disallowance thereof and if he fails to do so, his claim shall be deemed to have been fully waived and absolutely extinguished.

CLAUSE - 44: OVER PAYMENTS AND UNDER PAYMENTS

Whenever any claim whatsoever for the payments of a sum of money to the Authority arises out of or under this contract against the contractor, the same may be deducted by the Authority from any sum then due or which at any time thereafter may become due to the contractor under this contract and failing that under any other contract with the Authority or from any other sum whatsoever due to the contractor from the Authority or from his security deposit, or he shall pay the claim on demand.

The Authority reserves the right to carry out post- payment audit and technical examination of the final bill including all supporting vouchers, abstracts, etc. The authority further reserves the right to enforce recovery of any over payment when detected notwithstanding the fact that the amount of the final bill may be included by one of the parties as an item of dispute before an arbitrator appointed under clause 48 of this contract and notwithstanding the fact that the amount of the final bill figures in the arbitration award.

If as a result of such audit and technical examination any over payment is discovered in respect of any work done by the contractor or alleged to have been done by him under contract, it shall be recovered by the Authority from the contractor by any of all of the methods prescribed above, and if any under payment is discovered, the amount shall be duly paid to the contractor by the Authority.

Provided that the aforesaid right of the Authority to adjust over-payment against amount due to the contractor under any other contract with the Authority shall not extend beyond the period of two years from the date of payment of the final bill or in case the final bill is a MINUS bill, from the date the amount payable by the Contractor under the MINUS final bill is communicated to the contractor.

Any sum of money due and payable to the Contractor (including the security deposit returnable to him) under the contract may be withheld or retained by way of lien by the Engineer-in-Charge or Authority against any claim of the Authority or such other person or persons in respect of payment of a sum of money arising out of or under any other contract made by the contractor with the Engineer-in-Charge or Authority or with such other person or persons. The sum of money so withheld or retained under this clause by the Engineer-in- Charge or Authority will be kept withheld or retained as such by the Engineer-in- Charge or Authority or till his claim arising out of in the same contract or any other contract is either mutually settled or determined by the arbitrator, if the contract is governed by the arbitration clause

under the clause 48 or by the competent court hereinafter provided, as the case may be, and the contractor shall have no claim for interest or damages whatsoever on this account or any other ground in respect of any sum of money withheld or retained under this clause.

CLAUSE – 45: FINALITY CLAUSE

It shall be accepted as an inseparable part of the contract that in matters regarding design, materials, workmanship, removal of improper work, interpretation of the contract drawings and contract specifications, mode of procedure and the carryout of the work the decision of the Engineer-in-Charge which shall be given in writing shall be final and binding on the contractor.

CLAUSE–46: SUM PAYABLE BY WAY OF COMPENSATION TO BE CONSIDERED IS REASONABLE WITHOUT PREFERENCE TO ACTUALLOSS

All sum payable by way of compensation to the Authority under any of these conditions shall be considered as reasonable compensation without reference to the actual loss or damage sustained and whether or not damage shall have been sustained.

CLAUSE - 47: SETTLEMENT OF DISPUTES & ARBITRATION.

Except where otherwise provided in the contract, all questions and disputes relating to the meaning of the specifications, design, drawings and instructions here-in-before mentioned and as to the quality of workmanship or materials used on the work or as to any other question, claim, right, matter or thing whatsoever in any way arising out of or relating to the contract, design, drawings, specifications, estimates, instructions, orders or these conditions or otherwise concerning the works or the execution or failure to execute the same whether arising during the progress of the work or after the cancellation, termination, completion or abandonment thereof shall be dealt with as mentioned hereinafter:

- (i) If the contractor considers any work demanded of him to be outside the requirements of the contract, or disputes any drawings, record or decision given in writing by the Engineer-in-Charge on any matter in connection with or arising out of the contract or carrying out of the work, to be unacceptable, he shall promptly within 15 days of the receipt of decision from the Engineer-in-Charge request the Chief Engineer in writing through the Engineer-in-Charge for written instruction or decision. Thereupon, the Chief Engineer shall give his written instructions of the decision within a period of one month from the receipt of the contractor's letter. However, this will not be reason for the stoppage of work.
- (ii) If the Chief Engineer fails to give his instructions or decision in writing within the aforesaid period or if the contractor is dissatisfied with the instruction or decision of the Chief Engineer, the contractor may, within 15 days of the receipt of Chief Engineer's decision, appeal to the Chairman, IWAI who shall afford an opportunity to the contractor to be heard, if the latter so desires, and to offer evidence in support of his appeal. The Chairman, IWAI shall give his decision within 30 days of receipt of contractor's appeal. If the contractor is still dissatisfied with his decision, the contractor shall within a period of 30 days from receipt of the decision, give notice to the Chairman, IWAI for appointment of arbitrator on prescribed proforma as per **Annexure-12**, failing which the said decision shall be final binding and conclusive and not referable to adjudication by the arbitrator.

Except where the decision has become final, binding and conclusive in terms of Sub Para 47.1 above, disputes or differences shall be referred for adjudication through arbitration by a sole arbitrator appointed by Chairman, IWAI.

Further, within thirty (30) days of receipt of such notice from either party, the Engineer-in-Charge of work at the time of such dispute shall send to the Contractor a panel of three persons preferably but not necessarily from the approved panel of arbitrators being maintained by Indian Council of Arbitration (ICA) and thereafter the Contractor within fifteen (15) days of receipt of such panel communicate to the Engineer-in-charge the name of one of the persons from such panel and such a

person shall then be appointed as sole arbitrator by the Chairman, IWAI. However, the arbitrator so appointed shall not be an officer or the employee of Inland Waterways Authority of India.

Provided that if the Contractor fails to communicate the selection of a name out of the panel so forwarded to him by the Engineer-in-charge then after the expiry of the aforesaid stipulated period the Chairman, shall without delay select one person from the aforesaid panel and appoint him as the sole arbitrator.

The arbitrator to whom the matter is originally referred being transferred or vacating his office or being unable to act for any reason, then the Chairman IWAI shall appoint another person to act as sole arbitrator, such person shall be entitled to proceed with the reference from the stage at which it was left by the predecessor.

The award of the Arbitrator shall be final and binding. The Arbitrator shall decide in what proportion the Arbitrator's fees, as well as the cost of Arbitration proceeding shall be borne by either party.

The Arbitrator with the consent of the parties can enlarge the time, from, time-to-time to make and publish his award.

A notice of the existence in question, dispute or difference in connection with the contract unless served by either party within 30 days of the expiry of the defects liability period, failing which all rights and claim under this contract shall be deemed to have been waived and thus forfeited and absolutely barred.

The Arbitrator shall give reasons for the award if the amount of claim in dispute is Rs. 1,00,000/- and above.

The work under this Contract shall continue during Arbitration proceedings and no payments due from or payment by the Authority shall be withheld on account of such proceedings except to the extent which may be in dispute.

The Arbitration and Conciliation Act 1996 with any statutory modifications or re-enactment thereof and the rules made there under and being in force shall apply to the Arbitration proceedings under this clause.

The parties to the agreement hereby undertake to have recourse only to arbitration proceedings under for Arbitration Act 1996 and the venue of the arbitration proceeding shall be at Noida/ New Delhi and the parties will not have recourse to Civil Court to settle any of their disputes arising out of this agreement except through arbitration.

NOTE: In case of contract with another Public Sector Undertaking, following Arbitration Clause shall apply: "Except as otherwise provided, in case of a contract with a public Sector Undertaking if at any time any question dispute or difference whatsoever arises between the parties upon or in relation to, or in connection with this agreement, the same shall be settled in terms of the Ministry of Industry, Department of Public Enterprises O.M No. 3/5/93-PMA dt.30.06.93 or any modifications / amendments thereof. "The arbitrator shall have the power to enlarge the term to publish the award with the consent of the parties provided always that the commencement or continuation of the arbitration proceeding shall not result in cessation or suspension of any of other rights and obligations of the parties of any payments due to them hereunder.

CLAUSE - 48: CLAIMS

The contractor shall send to the Engineer-in-Charge once in every month on account giving particulars, as full and detailed as possible of all claims for any additional payment to which the contractor may consider himself entitled and of all extra work or additional work ordered in writing and which has

been executed during proceeding month.

No claim for payment of any extra work or expenses will be considered which has not been included in such particulars. The Engineer-in-Charge may consider payment for any such work or expense, where admissible under the terms of the Contract.

Any claim which is not notified in two consecutive monthly statements for the two consecutive months shall be deemed to have been waived & extinguished.

CLAUSE 49: INTEREST

No interest shall be payable on account due to the contractor against final bills or any other payment due under the contract.

PART – III

TECHNICAL SPECIFICATIONS AND SPECIAL CONDITIONS OF CONTRACT

PART A – SCOPE OF WORK / Description of Services

Introduction

Inland Waterways Authority of India (IWAI) is a statutory body set up in 1986 under the Ministry of Shipping, Road Transport & Highway, Govt. of India. The Authority is entrusted with development, maintenance and management of National Waterways for shipping and navigation. These developmental activities are being implemented in a phased manner. Index map of NW-40 and Index map of Nayaghat - Guptarghat stretch are enclosed at **Enclosures – 1 & 2** respectively.

River Ghagra is declared as NW-40 from Faizabad to Ghaghra-Ganga Confluence at Manjhi Ghat (353 Km) was declared as National Waterway 40 (NW-40) in the year 2016. There is considerable difference between flood and lean season discharges and water level.

The maintenance of Navigation channel is required to active the navigable depth for movement of vessels i.e. 2.5m in Nayaghat - Guptarghat stretch of NW-40.

The navigation channel in Nayaghat - Guptarghat Stretch on NW-40, in which depth between 0.7m to 0.8m is recorded during the lean season i.e October to May. The details of shoals as per the available data are as mentioned below:

Sl. No.	LOCATIONS	Chainage (in km)		Tentative Length of Shoal (In Mtrs.)	Tentative Quantity to be dredged (in Cum)
		From	To		
1	Nayaghat to Guptarghat	342.00	353.00	5130.00	121824.33

The material to be dredged / excavated is sand, silt, soft-clay, coarse and fine gravel & mixture of above and also sediment and compact soil/silt/sand with other kinds of soft materials has been observed.

Because of the compact soil/silt/sand with other kinds of soft materials in the canal bed in the stretches mentioned above, the dredging / excavation equipment to be deployed must be of suitable type and capacity for removing of above materials.

Climatic Condition of Project Area

The Project area is comes basically under 2 sessions – Lean (non monsoon) and flood (monsoon) which is lies between October to May and June to September. The working season for the dredging activities is only lean season.

The dredging / excavation work is to be executed in a continuous manner in working season till completion of the scope of work in that regard.

The work has to be executed as per the protocol if any, declared by the State /Central Government in time to time.

Technical specifications and special conditions

1. Objective

The Objective of the Works & Services is to Dredge out the sand, silt, soft-clay, coarse and fine gravel & mixture of above for fulfill the navigational requirement of vessels by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) and dispose off the dredged material with all leads & lifts on river Bank / or at designated site by EIC or his representative as per the contract.

2. Scope of Work

IWAI plans to Provide navigable channel of Width of 30m and LAD of 2.5m for Fairway Maintenance between Nayaghat - Guptarghat stretch of NW-40.

Accordingly under this tender it is proposed to undertake the Dredging using Cutter Suction Dredgers or any other equipment of suitable size, type and capacity as per general & special conditions, technical specification

The rate shall include the surveys (at all stages: pre and post dredging survey), mobilization and demobilization charges, shifting charges from shoal to shoal, dumping of dredged spoil up to minimum 300 m & maximum 1000 m through pipelines or other suitable means of transportation including Labour Welfare Cess @ 1% (but except GST) as prevailing and all other taxes / charge, expenditure etc. complete in all respect.

For developing/ maintaining such design channels it has been estimated that quantity of **1.22 Lakh Cum** to be dredged out in a period of 24 months (Including Monsoon period and mobilization period of 45 days)

The bidder / service provider / bidder shall take into account tolerance of + 1 m from each edge of the channel and tolerance of +10 cm on the depth. There is however, no restriction on maximum width of the channel which may naturally be available. And no additional payments shall be admissible to this effect.

The dredging material consists of sand, silt, clay, soft deposited material (pebbles / boulders) and the material can vary. The estimated quantities may vary +/- 20 % for which no change in unit rate / amount for dredging will be admissible. For any variations beyond the above, additional financial implication, if any, on the unit rate / amount shall be mutually agreed between Contractor and the Employer based on Engineer's recommendation.

Accordingly under this tender, it is proposed to undertake the dredging during non-flood season using the Cutter Suction Dredger (CSD) or other suitable plant and equipment as specified, for a period of two (2) years (Inclusive of Monsoon period).

For fairway development, the successful Bidder shall deploy, operate, maintain and manage Equipment / Cutter Suction Dredgers (CSD) of desired capacity and number along with their allied vessels and undertake dredging for removal of silt for navigation of vessels in the channel.

The Contractor's scope will also include to providing of vessels, and equipment and surveying related manpower for joint surveys during the Quantity based dredging for pre & post dredging shall also be the Basis for regulating / processing the contractor's monthly payments.

Dredging operations will generally be carried out during the day light hours. However, the contractor will be at liberty to extend the dredging hours even during hours of darkness as per Govt. rules & regulations and Local Authorities.

No additional payment will be made for deployment of the dredger in excess of average 8 hours daily operation.

It is clarified that the CSDs or other equipment can either be non-propelled or self-propelled. In case of non-propelled dredgers, complementary Tug / Workboat will also have to be deployed. All the supporting

vessels for smooth and hassle free dredging operations as well as swift movement of dredges from one shoal to another will also be supplied.

Location of the shoals shall be provided by the representative of Engineer in Charge (EIC) from time to time on regular basis.

The detail for dredging *from Nayaghat - Guptarghat stretch with approximate dredging quantity of 1.22 Lakh Cum. The contract period is for duration of 24 months including the monsoon period.*

The detailed scope of work for carrying out the Dredging works also includes:

3. Dredging Equipment requirements

The dredging may be carried out by deployment of suitable Cutter Suction Dredger (CSD), Amphibian dredger, or any other equipment in any combination along with Tug and Survey vessel with suitable equipment for achieving the deliverable of the contract.

The CSDs having pumping capacity of 250 – 500 m³ per hour, can either be non-propelled or self-propelled. In case of non-propelled dredgers, complementary Tug / Workboat will also have to be deployed. All the supporting vessels for smooth and hassle-free dredging operations as well as swift movement of dredges shall be ensured.

The Equipment / Dredgers must have valid statutory certificate, under either Inland Vessels Act or under Merchant Shipping Act.

The Contractor shall furnish the valid fitness / survey certificates and all other necessary vessel approvals for all the dredgers and vessels to be deployed by the competent Statutory Authority under the Inland Vessels Act, 1917 (1 of 1917), at the time of the bid submission.

The Contractor shall also submit the valid necessary documents required under the Inland Vessels Act, 1917 (1 of 1917) before actual deployment of the Equipment at site which would be jointly surveyed and approved by the Engineer-in-charge *and these shall remain valid during the course of the Contract.* Moreover, IWAI may ask the Contractor to replace the dredger or any other vessel / equipment during operation, if desired output is not achieved.

The Contractor shall submit the deployment plan for mobilization of dredgers, supporting vessels and equipment and for approval by the Engineer-in Charge during the execution of the work in the field.

The Contractor is free to deploy dredgers for the entire contract period with equal / higher design capacity as per direction from Engineer-in- Charge, if so required for achieving the progress of dredging as envisaged in the contract.

Sr. No.	Equipment type and characteristics		Minimum number required
	Equipment	Minimum Capacity	
1	Cutter Suction Dredger or other suitable equipment	Each having capacity of 250 - 500 cum / hr	As required
2	Work Boats / Tugs	For towing dredging unit / anchor shifting etc.	As required
3	Vessel and equipment for survey works	As required	As required
4	Accommodation Boats (if required)	To accommodate crew and supervisory staff separately (if required)	As required
5	Any other vessel	As required	As required
6	Suitable discharge pipe line up to 1km length	Min. 300 m to max. 1000 m	-

All dredging units as envisaged in bid with all accessories, supporting vessels & equipment as stipulated here under, shall be deployed at the site and it shall be approved by the Engineer-In-Charge in accordance with the proposed methodology.

Note:

a. One dredger unit for efficient dredging operations as one complete unit to be deployed may include the following as per the requirement:-

- i. *One work boat /tug,*
- ii. *Accommodation boat,*
- iii. *Anchoring boat with anchor pontoon,*
- iv. *Survey vessel/boat and any other support vessel (if required)*

b. In case of self-propelled cutter suction dredger, work boat may be required for crew movement and tug may not be necessary but the dredger and the allied vessels/equipment (as deemed fit by the contractor) should be able to efficiently perform dredging operation as well as shoal to shoal movement of the vessels / equipment. This has to be explained adequately in work plan and methodology statement.

c. In case the deployed hardware is observed to be not performing to the required capacity, the bidder has to substitute the same with hardware of minimum capacity indicated in the bid at his own cost and risk. No extra time will be allowed for the same

4. Preliminary Works

- a) The Contractor shall review the available data & reports pertaining to works and shall carry out all the Surveys as specified.
- b) The Contractor shall also make a detailed analysis of the shoal length, available depth for fairway development and update the plan for dredging works for Channel width of 30m as stipulated in BOQ.
- c) The Contractor based upon the surveys and detailed analysis shall submit periodically Work plan / methodology for carrying out the execution of Work to the Engineer in Charge (EIC) or his representative for this approval. The contractor shall bear all the cost arising out of surveys and detailed analysis.

5. Procurement & Delivery

- (a) The Contractor shall procure and supply all the necessary material, machinery and related necessary items well in advance adhering to the timelines of the contract.
- (b) The Contractor shall make its own arrangement for storage and handling of material & machinery procured at site. The Contractor shall make stock of the material, machinery and supply the same at site without delaying the Work.
- (c) The Contractor shall be liable to maintain the standards in terms of quality for all the materials, machinery and related items procured as per the industry norms and terms and conditions set forth in Part III - Technical Specifications.
- (d) The dredging units are to be kept ready for operation during lean season (working season). All major repairs to be completed in the flood season. The dates mentioned for Monsoon & Non-Working Monsoon Period are notional & actual will depend upon site conditions.

The works of dredging shall commence as per the directions of the EIC.

- (e) All defects as and when arise are to be quickly attended to by the Contractor, to ensure that any of the dredger(s) do not remain idle for more than 72 hours during the lean season (i.e. working season).

7. Mobilization & De- Mobilization

- a. Mobilization Period: On placement of letter of Intent, the dredgers & equipment are to be mobilized at Nayaghat-Guptaghat Stretch and commence dredging within 45 days from date of signing of contract.
- b. Mobilization & De-mobilization Charges: No Mobilization & De- mobilization charges will be payable to the contractor separately. Such costs should be included in the dredging Charges
- c. **Penalty for delay in mobilization: Delay in complete mobilization of the equipment as per accepted dredging plan will attract a penalty of @ 0.5% of contract value per week (to be computed on per day basis), subject to maximum of 5% of the contract value.**

8. Timelines

- a) The Contractor shall mobilize all the dredgers, allied vessels, equipment and manpower at site, within 45 days from the date of Letter of Award. The Contractor is required to mobilize the desired equipment and manpower within this time frame to start the dredging operations in full capacity
- b) The Contractor, within 15 days from the date of issue of Letter of Award, should submit detailed Schedule of activities including mobilization, method statements, QC manual including all data and reporting formats, for comment from EIC and should include all comments and observations to get the same approved by EIC.
- c) The Contract duration for the entire scope of work shall be 24 months from the date of issue of

Letter of Award (Including non-working monsoon period & mobilization period of 45days).

- d) The Contractor shall submit a detailed work plan indicating the timelines for Dredging Activities and other miscellaneous activities to the Engineer-in Charge for approval including dredger mobilization plan.
- e) The Contractor shall abide with the timelines as scheduled in the Work Plan for Dredging activities.
- f) The Contractor, in the course of the work, after deliberations with the EIC, shall agree and incorporate the necessary changes in dredging and navigational activities within timelines. The Contractor shall get the macro and micro level activity plan and methodology statement(s) approved by EIC.
- g) No idle time charges on any account shall be paid to the contractor during the contract period.
- h) If the dredged channel for the **LAD of 2.5m** gets silted in due course of time within the working season requiring re-dredging for navigational requirement, the same shall be carried out by the Contractor by mobilizing the dredger within stipulated period as instructed by EIC.
- i) ***Re-dredging quantity would be eligible for payment as terms of contract.***

9. Dredge Tolerances

The dredge level in the navigation channel shall not exceed an upper tolerance of (+) 0 mm and a lower tolerance of - 10cm, where (+) indicates a height above the design dredge level and (-) indicates a depth below the design dredge level. No ridges or pinnacles above the design dredge level shall be accepted. Horizontal tolerances for dredging in the navigation channel shall be (-) 0 mm and (+) 1000 mm on both sides, where - indicates a deviation of the toe of the dredged slope (towards the channel) from the location specified in the contract drawings and (+) indicates a deviation of the toe of the dredged slope (away from the channel) from the location specified in the contract.

The Contractor will not be paid for the extra quantities, beyond tolerances as specified. However, payment of tolerances will be made within the limits of tolerances as stipulated in RFP.

10. Equipment to be deployed

The successful bidder shall deploy suitable equipment like CSDs or other types of dredgers/equipment in any combination with barges for disposal of dredged material for meeting the work requirement. However the additional deployment shall be as per site requirement. Desirable equipment are as following

The Equipment / Dredgers must have Valid Statutory Certificates under either Inland Vessels Act or under Merchant Shipping Act.

CSDs or other suitable equipment having pumping or dredging capacity of 250 – 500cum solids per Hr. along with associated disposal pipe lines or other suitable means with Tug Setup for disposal of dredged material at designated places

11. Volume of Work

To Provide fairway of Width of 30m and LAD of 2.5m for navigation of vessel at shoal location between Nayaghat - Guptarghat stretch of NW-40, through *Dredging using Dredgers or other equipment of suitable size, type and capacity as per general & special conditions, technical specification.*

1	Channel Depth	Least Available Depth of 2.5m (clear)
2	Channel Width	30 m
3	Dredging Quantity	1.22 Lakh Cum
4	Period of contract	Two (2)years

- a) The Contractor shall carry out the dredging works, as identified and described (but not limited to), in Part III – Technical Specifications which shall also include loading / unloading of dredged material for disposal as per direction of EIC.
- b) The Contractor shall be liable for correctness / quality of dredging works.
- c) Work can be executed with CSDs, Backhoe dredgers or any other methods including dry excavations suitable to meet the requirement of above work.
- d) The channel dimensions are indicative and the same may vary as per actual site conditions and as per the directions of EIC.

12. Quality

Quality Control System

Control

The Contractor shall prepare and submit the proposal for a quality control system for the Dredging Works to the Engineer's approval, not later than 15 days prior to the commencement of dredging and reclamation. The Engineer's written approval of the system shall be obtained prior to commencement of work and the system shall not be altered by the Contractor without the written permission of the Engineer.

The quality control system shall clearly indicate, inter alia:

- *Contractor's personnel responsible for quality control and site organization chart;*
- *Work log, Data collection and report submission formats*
- *Method of monitoring and determining the type of material being dredged;*
- *Method of determining whether dredged material is suitable for sand fills;*
- *System for obtaining approval from the Engineer's Representative for pumping sand into the sand reclamation areas and clay into the disposal area;*
- *Method for monitoring the amount of fines being discharged from on-land reclamation sites;*
- *System for controlling the amount of fines being discharged from the on-land reclamation sites.*

13. Dredging Quantity & Joint Survey - Dredging Quantity

The Dredging quantity will be measured based on *joint pre-dredge and post dredge surveys for various shoals* which will be given by EIC / his representative regularly during working season. EIC will try to give one shoal for dredging in advance while dredging of the previous shoal is under progress in order to avoid idling of dredger, provided pre-dredge survey is not delayed on account of contractor.

However, the actual location of the Shoals to be taken up for Dredging shall be identified through a joint Pre-dredged Survey by the Contractor & Representative of the EIC. The shoal details gathered from the joint survey shall be submitted to EIC.

EIC shall inform the priority / order for taking up the clearance / dredging of shoals

Further, if the Contractor has been offered the quantity and contractor is unable to dredge the stipulated quantity, liquidated damages shall be applicable, as defined the provision of the contract.

13.1 Shoal Details. The Tentative Shoal details for the stretches are as under: --- As per Enclosure 3

- a) *The shoals are indicative, actual quantity may vary as per the actual site condition.*

- b) *The above mentioned numbers for equipment to be supplied by the contractor are tentative, IWAI may ask for additional dredgers as per the requirement of the site condition.*

14. Site Organization The selected Contractor shall depute well-qualified officers / team having sufficient experience in execution of works as indicated in this Tender Document. If the progress of work is found unsatisfactory during the currency of the contract. The Contractor shall promptly mobilize additional personnel / resources for ensuring satisfactory progress and timely completion of the proposed work, as per direction and to the satisfaction of Engineer-in-Charge and necessary clearances under the contract without any extra cost to IWAI.

15. Manpower The Contractor shall deploy experienced and competent manpower on board the dredger and comply with the requisite competency certificates (preferably by National Inland Navigation Institute (NINI)) in accordance with Inland Vessels Act 1917. Or Equivalent. Requirements of crew for all the supporting / allied vessels will also be met at all the time. The list of all the personnel engaged in the Contract will be given to EIC before commencement of work. Personnel will be changed only after approval of EIC.

Sufficient number of manpower should be deployed by the contractor on the dredgers and on other works throughout the contract period at his cost.

The Contractor shall deploy the (minimum) manpower namely

- a. *Dredge Master,*
- b. *Dredger Control Operator(DCO),*
- c. *Licensed Engine Driver,*
- d. *Driver 1st class, Greaser,*
- e. *Lascar,*
- f. *Pipeline in-charge,*
- g. *Pipeline Assistant & Labourer etc.*

Note-

(a) The above list need not be exhaustive. The Contractor shall however undertake that during the execution of the contract, all the required number of personnel necessary for efficient execution of the contract and as required by applicable law would be deployed at site.

(b) Statutory requirements of crew for all the supporting / allied vessels will also be met at all the time.

The list of all the personnel engaged in the Contract will be given to EIC before commencement of work. Personnel will be changed only after Approval of EIC.

16. Manning For operating the dredging unit, the contractor has to ensure that qualified / trained, competency certificate holders, personnel with adequate experience in the relevant field are deployed for the nature of work and the crew along with other members are as per the statutory requirement of Inland Vessels Act, 1917 (1 of 1917), Viz,

- a. *Dredge Master (DM) / Dredge Supervisor,*
- b. *Dredge Control Officer (DCO),*
- c. *Dredging Engineer,*
- d. *Masters,*

e. *Drivers,*

f. *Greasers, and crew as per statutory requirements of the Act & nature of work.*

The contractor shall carry out the dredging operation as per the directives of the Engineer-in-charge (EIC) or his representative.

The contractors should maintain adequate number of crew as reserve in their pay roll so that weekly, Gazetted leave and other leaves and exigencies can be accommodated by the Contractor. All the Crew particularly Master, Driver shall have valid certificates of competency issued by the Statutory Body / MMD as the case may be. The NINI trained Greasers, Lascars, Seacunny or with adequate experience of minimum five years from reputed operators can also be deployed. The contractor shall comply with the provision of Statutory Authority applicable in relation to execution of works by the Crew.

The Contractor shall assign a person who is the overall in-charge of the dredging unit and will also be responsible to act as a Liaison Officer for interacting / communicating between IWAI (Engineer In-charge / Engineers representative and any other Supervisor or Officer connected with the Dredging activity). The Liaison Officer shall have independent means of communication (mobile / fax / telephone / email facility) to enable to be contacted even during emergency situations.

Effective supervision and monitoring mechanism should be in place for recording the details of the dredging i.e. commencement and completion of dredging, no. of anchor shifting, assembling and shifting of pipelines, no. of spud hoisting and lowering, advancement of the dredger every hour to be recorded and maintained by the supervisors posted by IWAI on the dredger.

The manning pattern usually deployed for a dredging unit is indicated below. However, the additional man power for effective repair, maintenance, spare part management, dredging operation etc. the bidder is free to deploy additional manpower. Compliance of IV Act and Rules applicable to be strictly followed.

- 1) **Dredger :** a) Dredger Master ; b) DCO; c) Licensed Engine Driver;
d) Driver 1st Class; e) Greaser; f) Lascar- 2nos ; g) Pipeline in-charge; h) Pipeline Assistant,
- 2) **Workboat:** a) Master 2nd Class; b) Driver 1st Class ; c) Greaser ; d) Lascar; e) Cook,
- 3) **Accommodation boat & Anchor Pontoon:** a) Greaser; b) Lascar; c) Lascar; d) Cook

17. Material to be dredged The material to be dredged is sand, silt, soft clay or a mixture of these materials, compact and sediment clay. If the dredger meets any strata such as boulders, ropes, sand stone, stone debris, wooden logs etc., such patches will also continue to be tackled with a modified cutter or cutter teeth like serrated etc. capable for dredging such materials for a length of up to 30 m. Further steps to be taken, should be decided mutually between the Contractor and the Engineer- in-charge, if shoal exists beyond 30m.

All the materials to be dredged in the channel comprise of sand, silt, clay, soft deposited material and mixer of above materials.

18. Material Obtained from Excavation and Treasure, Trove, Fossils Etc Material Obtained from Excavation and Treasure, Trove, Fossils Etc

Material of any Kind obtained from excavation on the site shall remain the property of the Authority and shall be disposed off as directed by the Engineer-in-Charge.

However If any of the materials thus obtained from excavation on the site is such as can be used in the execution of work under the contract, the contractor will be allowed to use the same free of cost (except that

any amount of royalty paid for in this regard by the Authority shall be recoverable from the contractor) for the aforesaid purpose provide the same is found suitable and is approved by the Engineer-in-Charge.

Fossils, coins, articles of value, structures and other remains of things of geological or archeological interest discovered on the site shall be the absolute property of the Authority. The contractor shall take reasonable precautions to prevent is labour or any other person from removing or damaging any such article or things and shall acquaint the Engineer-in-Charge with such discovery and carryout the Engineer-in-Charge's directions as to the disposal of the same at the expense of the Authority.

19. Sedimentation in Dredged Area The Contractor shall take all necessary precautions to avoid any flow of the dredged material back in to the river channel and to minimize any sedimentation in the channel consequent to disposal of dredged material in an improper way, not approved by the Engineer.

20. Over dredging The Contractor shall not be permitted for over dredging in ordinary circumstances. Should the Contractor wish to perform over dredging in a dredge area to allow for extra sedimentation arising from his own operations, he shall request the approval of the Engineer's representative for such over dredging. Approval will not be given unless the Contractor can prove, to the full satisfaction of the Engineer, that the over dredging in question will not endanger the channel slope stability.

The Contractor will not be entitled to payment for the extra material dredged. For the purpose of payment, channel bottom width of 30m and LAD of 2.5 m where ever dredging is carried out for a period of 2 years, along with + 1 mt horizontal tolerance on either side and 10 cm beyond the specified depth is considered.

21. Survey Data Available Survey data cum Survey Charts carried out by IWAI are may be provided if required.

22. Additional Dredgers In case of slow progress of work, the Engineer-in-charge may direct Contractor to deploy additional dredgers for completion of the work in time.

If the dredger goes out of order, the Contractor shall arrange for its replacement with a suitable dredger.

23. Monitoring Monitoring shall be undertaken by the Employer. This may also include monitoring by placing survey sounders on select merchant ships passing through the part of the route. Any supervision and monitoring shall not relieve the Contractor of his obligations under the Contract, including his duty to make his own surveys.

IWAI may also intends to do the monitoring of dredging activities through *Contractor shall install the online dredging monitoring software (like developed by NTCPWC or any other organization) at his cost.*

24.Method of Measurement The final quantities to be used for establishing the value of the work for dredging material from the Navigation Channel and disposing of it at the river banks shall be the in-situ volume calculated from a pre-dredge and post-dredge survey of the Navigation channel and executed in accordance with the Contract.

The area shall be calculated based on Simpson's Rule and the volume shall be calculated based on Trapezoidal Rule. Wherever Simpson's Rule is not applicable, average area method shall be adopted.

The Contractor shall also maintain a daily dredging log and get it verified from EIC or his representative periodically.

25. Disposal of Dredged Materials A total of approximately total quantity of **1.22 Lakh Cum** of material shall be excavated / dredged / removed from the navigation channel. Disposal of dredged materials would be effected into the free-stream of the river, at a distance of 300-1000 m from the channel. The disposal locations should be positioned to avoid material working its way back into the dredged channel by taking

such precautions as, disposing into faster flowing water, downstream and to the side of the working dredger.

Disposal of material into secondary and redundant channels could also be considered as this provides a location where material is less likely to be remobilized

Materials dredged may also be disposed on to the banks of the waterway or onto the low-lying area ashore in case of narrow stretch of the river / channel. In wider stretches, it shall be disposed off at least 300 to 1000 meters away from the navigational channel and in case the dredged material has a tendency to come back to channel, then its disposal distance shall be increased suitably to avoid repeated work.

In case the Contractor intends to dispose of the dredged materials on private lands, it shall identify the disposal sites, obtain necessary permission from Engineer-in-charge and also permissions from the land owner(s) for dumping the material on their lands.

Expenditure involved in such disposal including payment to the land owner(s) for dumping the material on their lands shall be borne by the Contractor.

The entire responsibility of disposal of dredged material, including identification and procurement of disposal land lies with the Contractor. However, IWAI would facilitate for getting land and related approvals, if required.

26. Payment

- a. The total Contract Price payable under the Contract shall be stipulated in the Letter of Award and there upon shall become part of this Contract and be paid in accordance with the terms hereon. The price quoted will squarely and totally include all the charges to be paid to the contractor by the Employer.
- b. Payment for Dredging Works along the waterway for fairway development.
- c. Total Contract Price shall be firm and fixed and shall not be subject to any escalation during the period of the Contract except for any adjustment in accordance with the terms of the Contract.
- d. However, escalation for diesel, based on the price indices, component weightage and as stipulated in the Contract Agreement is permissible.
- e. The Contractor shall submit monthly Running Account Bills (RA Bills) on or before the dates fixed by Engineer-In-Charge (EIC) for the quantity and / or work executed for the month. The Contractor shall be paid monthly as per the RA Bills submitted for the quantity dredged within one month from submission of correct claim of bill.
- f. The contractor will submit the RA Bill in triplicate for shoal dredged corresponding to a length and quantity to the Engineer- in-Charge, which could be decided after the pre and post dredging survey depending on length of each shoal to be dredged.

The running bills to be submitted to EIC/employer for dredging, shall be accompanied with 3 sets each of pre and post dredging survey charts and also detailed calculations of dredging quantity (both area of shoal and volume dredged also including the width of the channel and the depth).

- g. The Contractor shall submit the compiled daily dredging log certified by EIC, along with the monthly RA bill for payment. The daily log shall contain the following information:
 - *Date of Dredging.*
 - *Dredge Area along with channel width.*

- *Start and stop timings of dredging operation.*
- *Dredging done (in terms of approximate quantity).*

27. Duties & Responsibilities of the Contractor

- a. The primary responsibility of the Contractor is to undertake dredging in the specified length as per terms and conditions of this tender and directions of EIC during the entire period of the contract.
- b. The Contractor is to provide adequate manning in compliance of the statutory requirement of Inland Vessels Act, 1917 (1 of 1917), in the entire dredging unit, provide POL and consumables as required for operation of the dredging unit, carry out all repairs including minor repairs, breakdown repairs and statutory annual repairs, dry docking repairs for validation of the survey certificate as required under I.V. Act, 1917.
- c. The cost related to the dredging and other cost incidental thereto including the operation of the vessels during shoal to shoal movement shall be borne by the contractor.
- d. The Contractor in addition to details required in daily log, shall maintain the following records: (For record only, not for claim purpose)
- e. Daily deck log of each vessel of the dredging unit.
- f. Daily engine log of each vessel of the dredging unit.
- g. Consumables supplied on board each vessel of the dredging unit and consumed during the month.
- h. Detail of the repairs undertaken during the month on each vessel of the dredging unit.
- i. Attendance register of the manpower deployed on each vessel of the dredging unit.
- j. Hindrance Register
- k. The above records maintained by the contractor are to be made available during the inspection of Engineer in-charge or his representative for verification.
- f. The contractor may also be required to submit a copy of the same to the Engineer in-charge every month, (Along with the RA – Bill of the Month)
- g. Normal barge and vessels / crafts movement in the channel shall not be interrupted by the dredging operation. The hindrance to movement of barges to be minimized as much as feasible during dredging operation in consultation with EIC
- h. The contractor shall arrange the transits, buoys, lights, mooring etc. at their own cost as required for dredging and for cautioning other vessels in the waterway.

28. Other Conditions Mobilization / Demobilization charges for the dredgers and its accessories and other logistics for survey/inspection/works etc. should be inbuilt in the bid by the Contractor. No additional payment/ claim in this regard will be considered.

- a. Normal barge and vessels/crafts movement in the channel shall not be interrupted by the dredging operation.
- b. No idle time charges shall be payable to the Contractor on any account during the contract period.
- c. The Contractor shall arrange at its own cost the transits, buoys, lights, mooring etc. as required for dredging and also for cautioning other vessels in the waterway.

- d. The Engineer-in-charge or his representative will inspect, co-ordinate and measure the work as per the contract condition. He has the right to inspect at any time during the contract period besides the specified schedule of inspections.
- e. The Contractor shall provide the Engineer-in-Charge or his representative boat/ survey launch from shore to dredger and back to shore and movement in the stretch for inspection & supervision.
- f. The Contractor may execute the work round the clock and on all days including Sundays and Public Holidays with the permission of the Engineer-in-charge in writing excepting National Holidays and subject to such restrictions as may be imposed by State Govt./local body.
- g. If the Contractor's personnel or any outside labour employed to work during execution of contract, breaks or damages/destroys any vessel, craft, net, fishing stakes etc. building, road, kerb, water pipe, fence, bund, wires, trees, crop, fruit or cultivated ground etc. during the period of agreement, the same shall be made good by the Contractor at his own expenses or in default the Employer may cause the same to be made good by other sources and deduct the expenses from any sums that may be then or at any time thereafter may become due to the Contractor.
- h. Any dispute with the local fishermen, for removal of fishing nets, stakes, from the channel to be dredged shall be solved by the Contractor
- i. However, on request the Employer may extend the assistance for solving the issues only through the concerned official/ dept. of the state or local bodies.
- j. Contractor shall pay special attention for identification of disposal sites with a view to ensure uninterrupted dredging operation and plan in advance disposal details ahead of location of dredger. In the event of non-availability of dumping site, Employer shall not be responsible for delays caused in the dredging operation/ maintenance of navigational channel.
- k. In case obstructions like concrete piles, structures of fishing nets, plastic debris, fallen trees, etc. are to be removed by the Contractor, no extra payment on this account shall be admissible to the Contractor.
- l. In case of any local objections against dredging or disposal of dredged spoils, it has to be settled by the Contractor. However, on request, Employer will extend liaison/ help to the Contractor to approach concerned officials of State Administration.
- m. If the maintenance of navigational channel is stopped continuously for more than 3 days due to law and order, Contractor has to report to the same to the Engineer-in-charge and take actions mutually in accordance with prevailing local laws for removal of such problem and proceeding further with the work. In case of delay in work, the Engineer-in-charge may take suitable decision without affecting the main objective of the project.
- n. The Contractor shall adopt adequate precaution and measures such as construction of temporary protection etc. during the dredging operation, to avoid any collapse/ damages to the existing bank. Protection work of the dredged area shall be at its own cost.
- o. The Contractor shall forthwith dispatch, raise and remove any plant (floating or otherwise) belonging to him or to any person employed by him which may be sunk in the course of execution and completion of the works or otherwise deal with the same as the Engineer-in-charge or his representative may direct. Until the same shall be raised and removed, the Contractor shall display at night search lights and do all such things for the safe navigation as may be directed by the Engineer-in-charge. In the event of the Contractor not carrying out the obligations imposed upon him by this

clause, the Engineer-in-charge shall raise and remove the same (without prejudice to the right of the Employer to hold the Contractor liable) and the Contractor shall pay to the Employer all costs incurred in connection therewith. The fact that sunken vessel, craft or plant is insured or has been declared a total loss, shall not absolve the Contractor from his obligation under this clause to raise and remove the same.

- p. During execution of the work if any environmental degradation occurs, consequent on dumping of dredged material or any other reason the same shall be undone or necessary mitigation measures to the satisfaction of Engineer-in-charge by the Contractor at his cost, without claiming any additional payment from Employer.
- q. Any changes incurred on testing of the dredged material, testing/ analyzing the quality of water for adopting environmental safeguards, minimizing detrimental impacts, enhancing the beneficial aspects of the project and for effective management of the environmental resources affected by the project shall be met by the Contractor. No additional charges on any such account shall be payable by the Employer.

29. Repair & Maintenance: The defects arising in the machinery, equipment, outfit etc. or in the vessel are to be attended immediately by the contractor. All minor repairs to be attended immediately as and when noticed. The contractor has to undertake all repairs at his own cost. The routine maintenance of the machineries shall be carried out as per the marine standard practice in consultation with mechanical supervisor of IWAI, if required.

Technical Specification

30. Brief description of Works : Dredging by Cutter Suction Dredgers or other suitable equipments of suitable size, type and capacity as per general & special conditions, technical specification to provide **navigational channel by Dredging in Nayaghat - Guptarghat stretch of National Waterway – 40** for a period Up to Two (2) Years

The channel shall be dredged for a bottom width of 30 m (excluding tolerances) with a depth of with a LAD of 2.5 m at the time of post-dredging survey, at shoals identified by the Engineer-in charge (EIC) through entire length along the specified river length. The side slopes of dredged channel shall be naturally formed. The Contractor shall submit a detailed method statement of his proposed dredging activities and obtain approval of Engineer prior to commencement of works.

Payment shall only be released for dredged quantity as per specified channel dimension as per direction of EIC with the specified tolerances and no further additional payment / claim shall be considered.

The Bidder shall inspect and ascertain himself details of horizontal & vertical clearances available at bridges / locks etc. within the National Waterway from the view point of safe mobilization / demobilization of their various equipment to the specified dredging locations. Available information in this regard will be provided to the Bidder by the Authority on request. The contractor shall be liable to bear the expenditure of all manpower, material and equipment required for the work at his cost.

Contractor must, therefore, have thorough knowledge about the work prior to submission of his rates. No extra claim in this regard shall be entertained once the contract has been awarded.

On completion of Pre-dredging survey of the shoal area, the Contractor has to calculate the dredging quantity w.r.t design channel and also with respect to (w.r.t) tolerances by using Simpson's Rule for area calculation and the volume shall be calculated based on Trapezoidal Rule and same is to be submitted to Engineer in 3 sets, for the area & Volume of dredged work following shall be followed,

- Simpson's Rule for area calculation and
- Trapezoidal Rule for volume calculation

The Pre-Dredging survey chart (3 copies) along with estimated quantity of dredging shall be submitted to Engineer within 7 days of completion of field survey work and obtain approval of Engineer for the dredging alignment and levels before commencement of dredging at each shoal.

31. Disposal/Reclamation of Dredged Material on land disposal

Brief Description of Work

An on land confined disposal area shall be created at different dredge locations for the disposal of dredged material from the navigational channel, which shall be identified, based on the initial pre-surveys. The lead distances for disposal is minimum of 300 m away from the navigation channel, which can be extendable up to 1000 m as per the directives of EIC. Regarding disposal locations decision of Engineer in Charge shall be final and binding on the contractor.

31.1 Working Method

Dredged material placed by hydraulic means shall be placed in layer thickness appropriate to achieving the maximum amount of de-watering of the fill before subsequent layers are placed on top. Fill heights should not exceed 1.0 m in any one lift. Excess water above the clay layer should be removed in order to promote natural de-watering.

31.2 Drainage

All the equipment, structures and devices the Contractor intended to use for water management in and around the on-land disposal sites require the approval of the Engineer in Charge. Drainage of excess dredge water from the disposal sites shall be facilitated by the placement of suitable adjustable weir over flows.

Suitable measures should be taken, to the satisfaction of the Engineer in Charge, to ensure the discharge of dredge water to artificial or natural waterways. This does not however, relieve the Contractor of his obligation to ensure that drainage of dredge water does not cause problems with flooding or sedimentation in areas adjacent or further downstream of the reclamation sites.

The Contractor will be responsible for any costs related to damage, loss of property, or inconvenience to third parties caused by the drainage of dredge water. In addition, the Contractor shall take suitable corrective action to remedy the aforementioned problems at his own cost.

Any water discharged from confined reclamation areas, into natural or artificial water courses in connection with the reclamation works, shall not contain excessive soil material to cause siltation along the drain path.

31.3 Drainage of surface water

On land reclamation / disposal sites shall not affect the natural drainage of surface water of the surrounding land. All costs relating to the control and regulation of surface water drainage, or the adoption of measures or methods to ensure continued surface water drainage, are deemed to be included in the Contractor's rates and prices.

31.4 Method Statement / Work Plan

Notwithstanding the requirement to submit method statement as part of the Tender, the Contractor shall submit details of working methods, including details of equipment and survey and positioning equipment involved, to the Engineer within 15 days after receipt of the Order to Commence. Approval of the

Contractor's work plan will only be given after the Contractor has demonstrated to the satisfaction of the Engineer that minimum requirements of the Specifications can be met. Dredging operations shall not commence until this approval has been obtained in writing from the Engineer.

32. Measurement of Water levels

Measurement of Water level Gauges

The Contractor shall install and maintain suitable automatic water level gauge at an approved location close to the Works. This gauge shall be placed and calibrated at least 30 days before commencement of the construction of the Works. The water level gauge should be connected to an established bench mark (30 cm x 30 cm RCC pillar with 30 cm height above ground level) to be erected in the vicinity (within 5 km of the dredging site) by the Contractor, which should be having Reduced Level (RL) with respect to Mean Sea Level (MSL) and Geo Co-ordinates.

The RL should be established by transfer of level from a known GTS bench mark by proper levelling. The zero of the established gauge is to be connected w.r.to MSL by proper levelling. Cost of construction of Bench mark, Levelling, Erection of Automatic Water Level gauge and collection of Gauge Readings are to be borne by the Contractor.

During Echo sounding, water levels shall be recorded continuously.

Reduction of sounded depth

The Contractor shall place special stress on the accurate reduction of sounded depth in relation to the prevailing water levels, by adopting standard procedure.

33. Surveying

Surveying General

The Contractor shall perform all necessary survey work jointly with EIC's representatives, required to be executed by him as laid down in the terms of the contract and as directed by the Engineer in charge. For this purpose, he shall furnish and employ all the personnel, services, equipment and supplies needed to perform the surveys and all the incidental work required for:

- *Setting out;*
- *Registration of water levels;*
- *Pre dredging surveys and charts;*
- *Progress surveys and charts;*
- *Post dredging surveys and charts.*

Field measurements and processing of data shall be executed to a degree of accuracy in both the horizontal and vertical plane and drawn to scales to the full satisfaction of the Engineer.

The Contractor shall allow the Engineer's Representative to be present during any surveys, calibrations or any connected activities. He shall give ample prior information's of plans of work in this respect and provide the Engineer's Representative with every assistance to fulfill his duties.

The Joint surveys shall be carried out in accordance with schedules to be approved by the Engineer – in-Charge

Topographic Survey

Topographic survey to transfer the Bench Mark (B.M.) value from nearest known location within the few important stations along the river (based on his judgment) and also to the locations within 5 Km range of dredging site will have to be undertaken as a primary activity before any dredging work can be started because the B.M will act as control points for dredging depths.

This survey is to be undertaken by the Contractor, the cost of such survey and erection of bench marks shall be included in the cost of dredging activity and is not to be considered as an additional activity having separate cost.

Preparatory Works

Setting Out

The Contractor shall do setting out of the Works on such dates as to permit timely commencement of the work. The Contractor shall furnish, install and maintain all markers, buoys, shore beacons and other items necessary to define the Works and facilitate the inspection and measurement thereof.

It shall be the responsibility of the Contractor to obtain all licenses, permits and permissions for the use of marine radios, walkie-talkies, radio positioning systems, satellite phones for the placing of onshore, offshore and underwater beacons and marker buoys, and for giving the proper statutory notices for all maritime operators. The costs of such licenses, permits and notices are to be borne by the Contractor, and shall be deemed to be covered by the rates and prices quoted in the Tender.

Engineer in Charge will extend every feasible assistance to Contractor to obtain and renew such permissions required from statutory authorities.

The Contractor, with the Engineer's Representative in attendance, shall execute the setting out of the Works under the Contract.

Checking of setting out

The Contractor shall provide the EIC - Engineer's Representative with sufficient equipment, duly calibrated in the field, labour and materials to enable the Engineer's Representative to check the Contractor's setting out, at any time the Engineer's Representative may reasonably direct.

Survey Charts and Scale of Survey Charts

The survey charts to be produced by the Contractor shall be reduced to a chart datum / water level as directed by the Engineer in Charge (EIC). Decision of EIC in this regard shall be final.

The charts are to be prepared in 1:1200 scale for Pre / Post dredging surveys and 1:5000 scale for River disposal surveys and presented to the Engineer in 120gsm good quality paper (5 copies) and also in soft copy form in CD / DVD (2 sets).

Furthermore, the charts shall incorporate all reference points, buoys, beacons, markers, gauges and benchmarks, together with the location and nature of obstructions, structures and facilities. Particular items of interest shall also be indicated on the Charts.

The survey is required to be referred to WGS-84 datum and the fair sheet is to be plotted on Universal transverse Mercator projection (UTM). Contours are to be indicated on the chart. To be submitted along with the RA bills

The sounding charts are to be submitted on completion of Pre & Post Surveys of the shoal and also to be submitted along with the RA bills as a supporting document.

All prominent shore features and other conspicuous objects are to be fixed and indicated on the chart.

33.4 Hydrographic Surveys

33. 4.1 Working Methods

Soundings are to be done using Automated Hydrographic Survey logging System of any accredited / IHO approved hydrographic survey software. Digital echo sounder (having accuracy of not less than 0.1 m) shall be used for sounding purpose and Differential Global Positioning System (DGPS) / Real time Kinematic System RTKS DGPS (having not less than sub-meter accuracy) shall be used for position fixing.

These surveys shall only be carried out if weather and river conditions, condition of equipment and methods of execution and interpretation are, in the opinion of the Engineer, satisfactory for this purpose.

The EIC - Engineer's Representative may resolve to check echo soundings by means of other methods to measure water depths, such as sounding poles, bar check or lead lines. The Engineers Representative may also order calibration checks of the equipment as and when considered necessary. The Contractor shall cooperate in this respect and supply any manpower, boats and equipment that may be reasonably required for this verification.

The Current velocity at every shoal (i.e. at least 3 locations, Starting / Middle / End of the survey area) at 1 m depth from the surface and 1 m above bed level shall be carried out once during the survey period.

The Float Observation at every shoal (i.e. 3 tracks are to be observed, one on both the side and one at middle of the channel of the survey area) shall be carried out once during the survey period.

Water and Bottom samples are to be collected at two locations (one at the Downstream and other at Upstream of the shoal area) and get it tested for finding the characteristics of the soil and the water.

Calibration of Sounding Equipment

Echo sounding equipment shall be checked and calibrated daily before and after use, by means of a bar or plate suspended at known distances below the water surface. Checking shall be performed at the actual location of the survey and the EIC - Engineer's Representative may require additional checks during surveying. Adjustments to the recordings/ readings taken shall be made accordingly.

Records of bar checks shall be performed at starting and ending of the day's survey work. The echo sounder should maintain a repeatable accuracy of better than 10 cm.

Field books

All field books, calculations, maps, original records, survey tracks, as-run plots, soft copies of soundings with positions (raw data as well as edited / sorted data), soft copy of water level / tidal data etc. of all survey activities shall be kept on site available for the EIC - Engineer's Representative's study or checking for the duration of the Contract.

Soft copies of Sounding with Positions (Raw, Edit, Sort) Water level / Tidal data, Levelling, Calculations, Charts etc. pertaining to that particular activity / survey work are to be copied in CD / DVD form (2 sets) and submitted to Engineer on completion of field work.

Accuracy of surveys

The accuracy of surveys in the horizontal plane, related to the relevant benchmarks for the project should be within 1.0 m. The accuracy of surveys in the vertical plane includes:

- The echo sounder which should maintain a repeatable accuracy of better than 10 cm for measurements

of distances between riverbed and survey vessel water line.

- The registration of water levels by means of automatic water level gauges which should be within 5 cm. wherever erection of automatic water level gauge is not found feasible, manual water level gauge shall be erected with prior approval of EIC - Engineer's representative.

- The water level plane between the tide gauges and the survey location can be assumed horizontal. Survey lines on consecutive surveys should be sailed in the same direction.

34. Pre-Dredging Survey

Pre-Dredging Survey

The Contractor, with the EIC - Engineer's Representative in attendance, shall survey the following areas and commence dredging work as per Engineer-in-charge directives.

- *Survey of Dredging Area*
- *Navigation channel between Nayaghat-Guptarghat.*
- *Survey of Disposal area*
- *Disposal area identified along / or around in River.*

The shoal(s) to be dredged shall be informed to the Contractor by Engineer- in-Charge (EIC) or his representative in writing based on the identification of such locations through fortnightly Thalweg surveys, report from waterway users or any other inputs received by the EIC.

Method of Survey

Navigation channel along the River

Survey lines shall run perpendicular to the baseline to be established on the shore. Cross-section sounding lines to be run @ 25 m interval. Continuous soundings are to be taken on the cross-section and plotted @ 4 m apart on the cross-section lines. Cross-section lines shall run for a width of minimum 200 m (approximately 100 m on either side of the centre line of the navigation channel). If the width of the river is less than 200 m, then the lines shall run from bank to bank (between Low water lines). The Scale of survey chart is 1:1200

Pre-Dredging Survey Charts

On completion of the Survey of Dredging / Disposal, the Contractor shall prepare survey charts on the specified scale mentioned above showing cross-sections of the full results of the survey within two weeks. On completion and agreement of the contents of the drawings, the Contractor and the Engineer's Representative shall both sign the drawings, which shall then acquire the status of "Pre-Dredging survey / Pre-Disposal survey" chart and form the basis for all further measurement work undertaken in the course of the Contract.

PROGRESS SURVEYS

The Contractor, with the Engineer's Representative in attendance shall carry out interim surveys, if required, in order to monitor the progress of the Works. The method of survey shall be at par with that of pre-dredging surveys conducted in the respective location. However, decision of the Engineer shall be final on conducting the progress surveys and the contractor has to make all necessary arrangements for conducting such surveys

35. POST- DREDGING SURVEY

POST-DREDGING SURVEY

Execution of surveys

Requirements with regard to the system, spacing's, etc. for the Post- Dredging / Post- disposal survey shall be identical to those indicated for the pre-dredging surveys.

The IWAI / EIC may commission an independent organization to carry out an independent post dredge survey of any particular shoal(s), if required. The cost of such an independent survey will not be met by the Contractor.

However, the Contractor will make available free of charges survey launch and all survey equipment to facilitate such survey without adversely affecting his survey schedules.

Surveys of dredge areas

Upon the completion of each dredging shoal or at a time to be mutually agreed upon between the Contractor and the Engineer's Representative, the Contractor, with the Engineer's Representative in attendance, shall survey the appropriate area with a view to checking whether the dredged areas comply with the requirement as stipulated in Scope of Work, Technical Specifications or in any other part of the contract and for determining payments for dredging works carried out. This area includes: Navigation channel along the River.

Survey of disposal areas

Upon the completion of each Dredging and / or Reclamation Works, or at a time to be mutually agreed upon between the Contractor and the EIC - Engineer's Representative, the Contractor, with the EIC - Engineer's Representative in attendance, shall survey the appropriate areas with a view to checking whether the works comply with the technical specifications.

These areas are: Nominated Disposal area in River.

Post – Dredging Survey Charts

On completion of the survey the Contractor shall prepare survey charts on the specified scale mentioned above showing cross-sections of the full results of the survey. On completion and agreement on the contents of the drawings and if the EIC - Engineer's Representative has satisfied himself that the Works have been executed according to the Contract, the Contractor and the Engineer's Representative shall sign the drawings, which shall then acquire the status of "Post-dredging survey /Post-Disposal survey" chart.

On completion of Post – Dredging survey, the quantity actually dredged with reference to the specifications and tolerance applicable to the channel shall be calculated by the Contractor by using Simpson's Rule for area calculation and the volume shall be calculated based on Trapezoidal Rule and such calculations together with the copy of Pre and Post Dredging Survey charts shall be furnished in 5 sets together with monthly bills.

The Post- Dredging Survey shall be conducted upon completion of dredging for a length of 500 m of shoal or the entire shoal length, whichever is less, or as per the instruction of the EIC.

Rectification of Works

In case the survey specified in the above proves that the Works have not been completed according to the Contract, the EIC - Engineer's Representative shall instruct the Contractor to rectify the Works. Upon the completion of these rectifying Works, the survey and charting as specified in shall again be carried out at no extra cost to the Employer.

36. SURVEY EQUIPMENTS

SURVEY EQUIPMENTS

Hydrographic Survey Vessel/Boat

Provision and Operation of Mechanical Country Boat for Survey Works

The Contractor shall provide and operate to the satisfaction of the EIC - Engineer's representative a fully equipped mechanized boat for carrying out hydrographic survey / accurate echo sounding at the work sites, and all such other equipment as required for undertaking the hydrographic surveys, including pre-dredge and post-dredge survey. Printing / plotting of charts, can be done on shore separately.

37. Survey Vessel/Boat

Specification of Survey Vessel

The survey vessel shall have:

- Sufficient size and stability to safely and properly carry out the survey work under the prevailing site conditions;
- Good maneuverability, even at low speeds of 1 to 2 knots
- Ample space for instruments, recorders, etc;
- Day accommodation for two men of the EIC - Engineer's staff, besides the normal crew and Contractor's own surveyors;
- A helmsman experienced in survey work;
- Adequate radio communication between all persons concerned in the surveys;
- A suitable shallow draught vessel to assist in the surveys of slopes close to the surface;
- Facility for operation of Automated Hydrographic Survey System (AHSS)

38. Echo Sounder

Echo Sounder

The digital echo sounder for hydrographic surveys shall in principle be operated in the 210 kilo Hertz range (narrow beam transducer). It shall not be permitted for any reason to use a lower operational frequency of the echo sounder for the Post-dredging survey than that has been used for the Pre-dredging survey. The digital echo sounder shall have an accuracy of not less than 0.1m.

At the start of each hydrographic survey, the AHSS is to be calibrated to the specified accuracy. To this effect, the Contractor shall establish a fixed point (or fixed points) with known coordinates such that the survey boat can easily be positioned with the transducer of the echo-sounder always in the same position relative to the calibration point.

39. Position Fixing System (PFS)

Position Fixing System (PFS)

It shall be in the form of Differential Global Positioning system (DGPS) or Real time Kinematic System (RTKS) based DGPS system of accredited / IHO approved make providing sub-metre accuracy in position fixing.

The system shall be established in such a manner that it shall fully cover the site of the Works and be constantly in operation during the course of the dredging works. The system shall consist of ship borne masters or receivers (one for each dredger and one for each survey launch), distance measuring units, the

requisite number of shore stations, interfaces, track plotters, data storage facilities and sufficient spares to enable uninterrupted operation of the system, to the accuracy specified and on board computer and printer and suitable navigational software.

Installation and Testing

The system shall be installed, tested and set to work for continuous operation during all dredging and survey operations. The system shall be fully operational, a minimum of 7 days before surveying operations commence including Field Calibration and base line check.

Once operational the system shall remain in continuous operation until the last Post-Dredging survey is completed and the last Post-dredging survey drawings have been signed and have been accepted by the EIC - Engineer's Representative.

The PFS should have hundred percent in-built standby equipment to cater for the failure of any individual components. The PFS shall at all times maintain a repeatable accuracy, for any point within the Work site of plus or minus 1.0 m in the horizontal plane.

Giving Notice of any Irregularities

The Contractor shall inform the **EIC - Engineer's Representative** forthwith of any break down irregularities or otherwise, affecting the positioning of his vessels or other equipment. Delays incurred in the dredging operation due to malfunctioning of the PFS/ AHSS shall not be reimbursed under the Contract and will not entitle the Contractor to an extension of time for completion.

Hydrographic survey software

The Contractor shall use Automated Hydrographic Survey logging System (AHSS) of any accredited / IHO approved Hydrographic survey software which is compatible in logging depth (using digital echo sounder) and position (using position fixing system) simultaneously. The make and type of the hydrographic survey software and method to be adopted for survey work shall get approved in writing from the Engineer's representative prior to commencement of the survey work.

40. OTHER SURVEY METHOD

OTHER SURVEY METHOD

If the Contractor wishes to use equipment and methods different from those specified, he shall submit his proposals in detail to the EIC - Engineer, who shall satisfy himself of their adequacy before giving approval or comment. Should methods proposed by the Contractor and approved by the EIC - Engineer fail to produce the results specified, the EIC - Engineer may withdraw his approval and instruct the Contractor to carry out surveys in accordance with the Technical Specification.

The Contractor shall comply with such instruction at no extra cost to the Employer.

41. Plant and Equipment

Plant and Equipment

a. The contractor shall arrange surveying equipment including boats, sounding devices etc. required for undertaking pre and post-dredging surveys.

No additional cost will be paid to the contractor for the same.

b. No separate mobilization and demobilization charges will be paid to the Contractor for the extra equipment and dredgers to be deployed by the Contractor for the work.

- c. The rate of dredging quoted per cum will include all the charges to be paid to the Contractor by the Employer.
- d. The Contractor shall not change the type, number, size and make of dredgers indicated in the contract without written approval of IWAI / EIC. If the dredger breaks down, the Contractor should arrange for replacement of the same with an equivalent capacity suitable dredger with prior approval of IWAI / EIC.

This shall not relieve Contractor from obligations under the Contract Agreement and no additional cost and time will be allowed.

- e. The Contractor shall be responsible for obtaining specific approvals, License's and for the payment of any fees relating to the execution of the works and to the process adopted by the Contractor, e.g., Right of way for discharge pipes, temporary works for pump out points, local authority approvals, License's and approvals from concerned authority.

42 Schedule

Schedule of Payments and Reporting Requirements

Schedule of Payments for the specified services are provided in PC 49.1 Services provided by the Contractor shall be checked through a Joint Survey by Engineer-in- Charge / Employer's Representative, TSSC-III and Contractor in the manner stated below:

Surveying - General

The Contractor shall perform all necessary survey work jointly with EIC's representatives, required to be executed by him as laid down in the terms of the contract and as directed by the Engineer in charge. For this purpose, he shall furnish and employ all the personnel, services, equipment and supplies needed to perform the surveys and all the incidental work required for:

- Setting out;
- Registration of water levels;
- Pre dredging surveys and charts;
- Progress surveys and charts;
- Post dredging surveys and charts.

Field measurements and processing of data shall be executed to a degree of accuracy in both the horizontal and vertical plane and drawn to scales to the full satisfaction of the Engineer.

The Contractor shall allow the Engineer's Representative to be present during any surveys, calibrations or any connected activities. He shall give ample prior information of plans of work in this respect and provide the Engineer's Representative with every assistance to fulfill his duties.

The Joint surveys shall be carried out in accordance with schedules to be approved by the Engineer – in- Charge

Joint Survey, Dredging Quantity & Milestones

The Dredging quantity will be measured based on joint pre-dredge and post dredge surveys. Joint pre & Post dredging surveys will be attended by Employer's representative, TSSC-III and Contractor's Representative.

Payment for Dredging Works:

The Contractor shall submit monthly Running Account Bills (RA Bills) on or before the dates fixed by Engineer-In-Charge (EIC) for the quantity and / or work executed for the month. The Contractor shall be paid monthly as per the RA Bills submitted for the quantity dredged within one month from submission of

correct claim of bill. The contractor will submit the RA Bill in triplicate for shoal dredged corresponding to a length and quantity to the Engineer-in-Charge, which could be decided after the pre and post dredging survey depending on length of each shoal to be dredged.

The running bills for dredging shall be accompanied with 3 sets each of pre and post dredging survey charts and also detailed calculations of dredging quantity (both area of shoal and volume dredged)

Other conditions for Dredging / excavation Work

Dredging Work:-

The material to be dredged / excavated is sand, silt, coarse sand medium / fine sand and admixture of above as well as compact and sedimented soil. However, if the dredger encounters any other obstruction like submerged tree, accumulated plastic waste etc., same shall also be removed and the channel developed to the required dimensions at no extra cost.

The disposal of this spoil is the responsibility of the contractor. The dredged material shall be dumped in to the suitable places identified by the contractor and as per the disposal plan. The identified area should have the permission of the land owner (if required) to dispose the material and land owner should be aware of the consequences of the dumping of the material into the land. The necessary permission from the Revenue Department and members of the local bodies (as a case may be) for the spoil into the land/ water shall be ensured for which IWAI will help, but shall be the responsibility of the contractor. After obtaining the permission as above, contractor has to submit a disposal plan to IWAI and get the approval of Engineer – in – Charge. All requisite arrangements like temporary bund around disposal area, hiring of back hoe if necessary, etc. have to be made by the contractor at no extra cost.

The waterway shall be dredged to obtain a channel of 30m bottom and minimum of 2.5 m approx depth or as decided by the E-I-C keeping in view the navigational requirement for that particular sub-stretch. The decision of E-I-C in this regard shall be final and binding on the contractor. The said slopes shall be as naturally formed, but for payment the slope up to a maximum of 1 in 5 for wider reaches will be allowed.

The area to be dredged shall be indicated by the Authority based on hydrographic survey charts. Pre and post dredging surveys shall be carried out by the contractor under the supervision of E-I-C or his representative. The cross-sections shall be 10m apart and soundings shall be taken continuously and plotted at 4 m interval on the cross-section lines. The cross-section shall be extended up to 10m beyond the limits of the channel on either side.

Sounding boat, equipment, personnel etc. required for conducting pre and post dredging surveys shall be supplied by the contractor at his cost. Generally, recording type echo-sounder shall be used in all survey work.

The quantity to be dredged/ excavated in the stretch Nayaghat - Guptarghat has been estimated at 1.22lakh Cum. [mix of soft & fine sand] The material of different nature are largely intermixed and may be difficult to remove separately. Hence, the equipment to be deployed must be capable of handling all types of materials as mentioned. The estimated quantity may vary $\pm 20\%$.

Actual quantity dredged including allowable tolerance in the waterway shall be assessed based on the joint pre and post dredging surveys. The quantity in slopes up to a maximum of 1 in 5 shall be worked out with allowable tolerance limits. Area of cross-section shall be computed by using Simpson's Rule and these cross-sectional areas shall be used in trapezoidal rule to arrive at volume dredged. The areas shall be computed by a combination of Simpson's rule and average method in case the width of channel is not suitable for direct application of Simpson's rule for full width. This aspect is to be decided by the E-I-C.

The contractor shall prepare and submit the survey charts (original + 3 copies) along with the R.A. Bills.

The post dredging survey shall be undertaken and charts prepared ordinarily (a) for a minimum shoal length of 300 m. or (b) for a complete shallow section if it happens to be less than 300 m or for a waterway section to be decided by the Engineer in charge with due reasons and justification recorded.

After the pre-dredging survey and as soon as the alignment of channel to be dredged is released by IWAI, the proposed dredge channel shall be marked by bamboo at an interval of 30 m on both sides by the contractor at no extra cost. The bamboos shall be driven to a suitable depth in the bed and shall project a minimum length of 1.5m above the water level.

No mobilization or demobilization charges will be paid to the contractor. However, work advance to a maximum of 5% of contract sum may be paid if requested for by the Contractor, after signing of the contract agreement, within 15 days of commencement of work, against production of an irrevocable Bank guarantee for a sum equivalent to 120% of the advance sum, in the approved format (as **Annexure-9**) from a Nationalized Bank. The advance shall be recovered equally from the first two running bills along with interest at the rate of 12% to be compounded quarterly.

No shifting charges will be paid to the contractor for shifting the dredger and its accessories from one shoal to another shoal or from one area / canal to another area / canal specified above.

No idle time charges will be paid to the contractor on any account.

The contractor shall arrange the transits, buoys, lights, mooring etc. at their own cost as required for dredging and also for cautioning other vessels in the waterway. During dredging / excavation, adequate precautions shall be taken to avoid any damage to existing bridges or such structures across and along the waterway.

The sequence / locations to be dredged within the Nayaghat-Guptarghat stretch will be decided by the EIC and accordingly the Contractor is required to arrange for pre-dredging surveys and deploy suitable equipments. The decision of the EIC in the matter shall be final and binding on the Contractor.

The Engineer-in-charge or his representative will inspect, co-ordinate, measure and certify the dredging work. He has the right to inspect at any time during the contract period for which contractor's authorized agent shall be available at site during such inspection.

The Contractor shall provide required support like boat from shore to dredger / excavator and back to shore during inspection & supervision by the Engineer-in-Charge or his representative.

If the contractor's personnel or any outside labour employed to work during execution of contract, breaks or damages/destroys any vessel, craft, net, fishing stakes etc. building, road, kerb, water pipe, fence, bund, wires, trees, crop, fruit or cultivated ground during the period of agreement, the same shall be made good by the contractor at his own expenses or in default the IWAI may cause the same to be made good by other sources and deduct the expenses from any sums that may be then or at any time thereafter may become due to the contractor.

The rate of dredging / excavation quoted /Cum. Will squarely and to tally include all the charges to be paid to the contractor by the Authority. No extra charges for the idling the dredger due to whatever reasons will be paid to the contractor.

The contractor will submit to the authority a bill in triplicate for channel dredged corresponding to a length / quantity acceptable to the Engineer-in-Charge which could be decided after the pre-dredging survey depending on length of each shoal to be dredged. The bills shall be accompanied with 3 sets each of pre and post dredging survey charts and also detailed calculations on dredging quantity. The R.A. bill shall be for a minimum of 300 m of shoal length.

Contractor is fully responsible for solving disputes, if any affecting the progress of works, with the local people / Panchayath. However, on request, IWAI may extend the assistance for solving the issues only through the concerned official / dept. of the state or local bodies or through local sub-committee. In case if there a loss of

time in work due to local issues/ protest / delay in obtaining permission for NOC for disposal, same period shall be considered for extension of time.

The contractor shall not change the type, numbers, size and make of dredgers/excavator indicated in the proposal without the prior written approval of the Engineer-in-charge. Equipments once mobilized to the site, shall not be substituted or withdrawn from the site without written approval of the EIC.

If the dredger / excavator goes out of order the contractor should arrange for replacement of the same with a similar or higher capacity equipment with the approval of E-I-C to ensure continuity of work.

During execution of the work, if any environmental degradation occurs, consequent on dumping of dredged / excavated material, re-conveyance of the material shall be done by the contractor at his cost, without claiming additional payment from IWAI.

Any charges incurred on testing of the dredged material, testing/analyzing the quality of water or adopting environmental safe guards, minimizing detrimental impacts, enhancing the beneficial aspects of the project and for effective management of the environmental resources affected by the project shall be met by the contract. No additional charges on any account shall be payable by IWAI.

Adjustment of Contract sum on account of variation in price of diesel.

The contract sum will be subjected to adjustment on account of variation of price of diesel according to the formula given below:

$$V = \frac{(P - P_o) \times R \times Q}{P_o}$$

Where

V - Variation in Price on account of diesel during the month under consideration.

Po - Price of diesel in the concerned area i.e. Ayodhya in Uttar Pradesh, at the time of opening of the tender, if the work is awarded within the validity period of 120 days to bidders. Date of award will be considered in case award of work is delayed beyond the validity period.

P - Price of diesel for the month under consideration.

Q - Diesel element factor in the unit rate which should be 0.12

R - Value of the dredging / excavation work during the month under consideration as per relevant item of Bill of Quantities.

No escalation on any other account will be payable by the IWAI and the rate should be quoted accordingly.

Standard of Workmanship

A high standard of workmanship in all trades will be required. The Contractor shall ensure that only skilled and experienced tradesmen are employed.

Contractor's Supervision

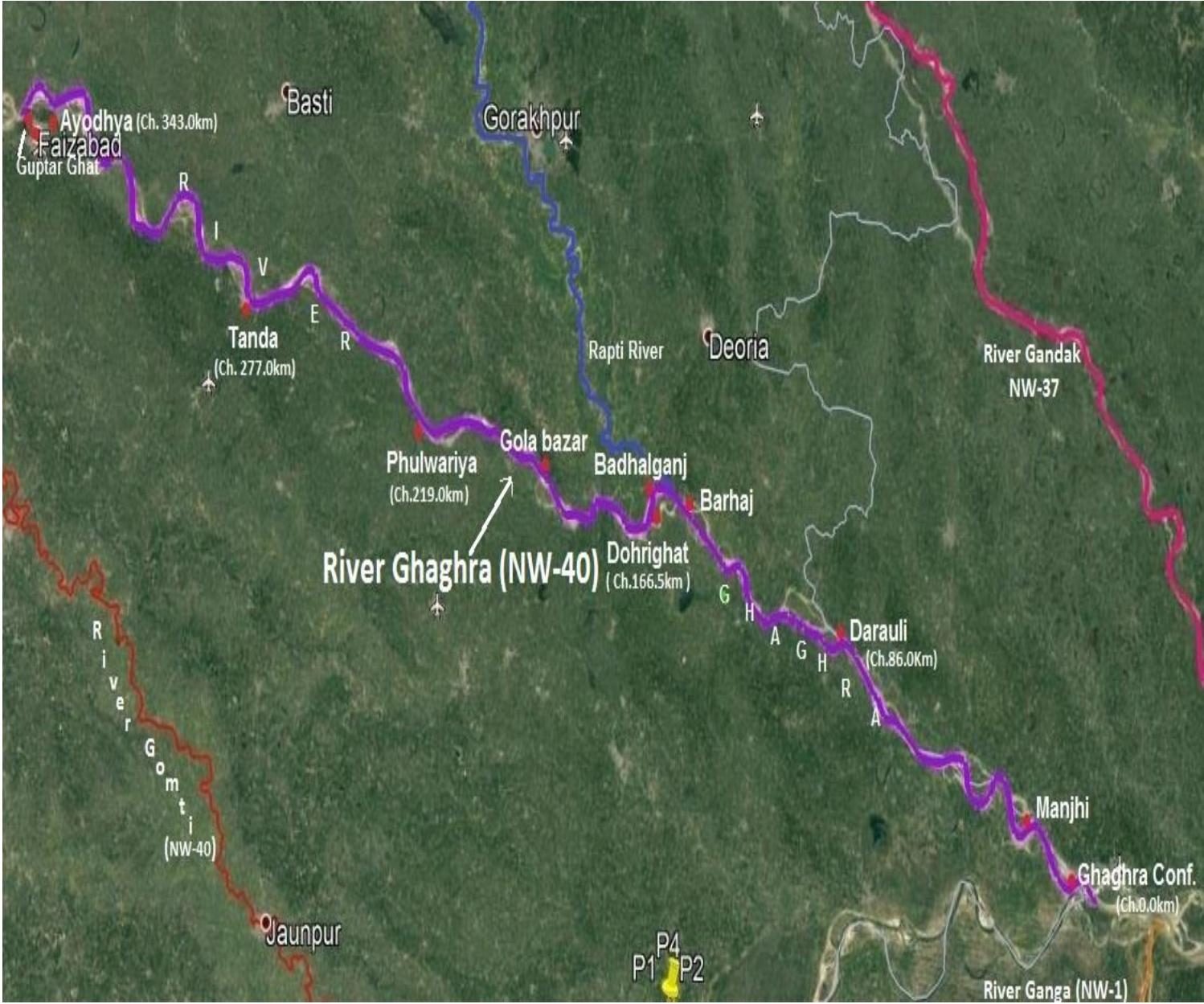
The Contractor's supervisory staff shall be men fully experienced in the types of work being carried out under their supervision and capable of ensuring that it is done well and efficiently.

PART - IV

DRAWINGS AND ANNEXURES.

1.	Index Map of NW-40	Enclosure. 1
2.	Index Map of Nayaghat - Guptarghat Stretch	Enclosure. 2
3.	Locations of Site – Chainage wise details of proposed work	Enclosure. 3
4.	Format of Bank Guarantee for furnishing EMD	Annexure. 1
5.	Format for Declaration by the Bidders	Annexure. 2
6.	Details of Past Experience of Contractor	Annexure. 3
7.	Concurrent Commitments of the Bidder	Annexure. 4
8.	List of Cutter Suction Dredgers, Plant Including Floating Crafts, and Other Equipments Proposed For The Work	Annexure.5 Machinery, Tools
9.	List of Key Personnel proposed to be deployed by the Contractor	Annexure. 6
10.	Agreement Format	Annexure. 7
11.	Bank Guarantee Proforma for furnishing Performance Guarantee	Annexure. 8
12.	Bank Guarantee Proforma for drawing Work Advance	Annexure. 9
13.	Sample Form for Site Orders Book	Annexure. 10
14.	Proforma for Hindrance Register	Annexure. 11
15.	Notice for Appointment of Arbitrator	Annexure. 12

Map of NW-40 (River Ghaghra)



Map of Nayaghat - Guptarghat Stretch



Tentative Locations of Site – Chainage wise details of proposed work

Sl. No.	LOCATIONS	Chainage (in km)		Length of Shoal (In Mtrs.)	Tentative Quantity to be dredged (in Cum)
		From	To		
1	Ayodhya	342.00	343.6	420	5362.87
2	Ayodhya	343.6	345.3	550	5221.14
3	Durga-ganj village	345.3	347.7	340	4300.11
4	U/s Durga-ganj village	347.7	348.6	390	2480.38
5	D/s Guptarghat	348.6	350.5	800	16316.30
6	D/s Guptarghat	350.5	350.9	325	79530.39
7	D/s Guptarghat	350.9	353	2000	4534.19
8	D/s Guptarghat	353	353.5	255	4078.97
Total					121824.33
Say Total Qty.					1.22 Lakh

Bank Guarantee Proforma for furnishing EMD

To,

The Chief Engineer,
Inland Waterways Authority of India,
Gaighat, P.O.- Gulzarbagh
Patna - 800007 (Bihar)

In consideration for the Chief Engineer (Tech.), Inland Waterways Authority of India hereinafter called "the Authority" having invited tenders for the work of Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26. vide Tender Notice No:

..... and hereinafter called "the Tenderer" for the earnest participation in the tender is required to furnish a Bank Guarantee for Rs..... (Rupees.....) towards Earnest Money Deposit, at the request of..... (Tenderer), We (Bank) do hereby undertake to pay to the Authority an amount not exceeding Rs..... against any loss or damage caused to or suffered, or would be caused to or suffered by the Authority by reason of any breach of the said Tender's terms or conditions by the..... (tenderer).

2. We..... do hereby undertake to pay the amount due and payable under this Guarantee without any demur, merely on a demand from the Authority stating that the amount claimed is due by way of loss or damage caused to or would be caused to or suffered by the authority by reason of breach by the said (tenderer) of any of the terms or conditions contained in the said Tender. Any such demand made on the Bank shall be conclusive as regards the amount due and payable by the Bank under this guarantee. However, our liability under this guarantee shall be restricted to an amount not exceeding Rs.....
3. We undertake to pay the authority any money so demanded notwithstanding any dispute or disputes raised by the..... (Tenderer) in any suit or proceeding pending before any court or Tribunal relating thereto liability under this present being absolute and unequivocal. The payment so made by us under this Bond shall be valid discharge of our liability for payment there under and the (Tenderer) shall have no claim against us for making such payment.
4. We, further agree that the guarantee herein contained shall remain in full force and effect during the period that would be taken for the finalisation of the tender process and that it shall continue to be enforceable till all the dues of the Authority under or by virtue of the invited tender have been fully and its claim satisfied or discharge or till
Certify that the terms and conditions of the said Tender have been fully and properly carried out by the saidTenderer and accordingly discharges this Guarantee after.....
months from the date of unless a demand or claim under this Guarantee is served in writing on the bank but before the expiry of the said period of months in which case it shall be enforceable against the bank notwithstanding the fact that the same is enforced after the expiry of the said period of months.
5. We,.....further agree with the Authority that the Authority shall have the fullest liberty without our consent and without affecting in any manner our obligations hereunder to

vary any of the terms and conditions of the said Tender or to postpone for any time or from time to time any of the powers exercisable by the Authority against the said Tenderer and to forbear or enforce any of the terms and conditions relating to the said Tender and we shall not be relieved from our liability by reason of any such variation, or extension being granted to the said Tender or for any forbearance, act or omission on the part of the Authority or any indulgence by the Authority to the said Tenderer or by any such matter or thing whatsoever which under the law relating to sureties would, but for the provision, have effect of so relieving us.

6. It shall not be necessary for the Authority to proceed against the Tenderer before proceeding against the Bank and the Guarantee herein contained shall be enforceable against the Bank notwithstanding any security which the Authority may have obtained or obtain from the Tenderer at the time when proceedings are taken against the Bank hereunder be outstanding or unrealized.
7. Notwithstanding anything contained herein above, our liability under the guarantee is restricted to Rs..... and shall remain in force until..... Unless a claim or suit under this guarantee is filed with us on or before..... **ALL OUR RIGHTS UNDER THE GUARANTEE SHALL BE FORFEITED** and the bank shall be relieved and discharged from all liabilities therein.
8. This Guarantee will not be discharged due to the change in the constitution of the Bank or the Tenderer.
9. We, lastly undertake not to revoke this Guarantee during its currency except with the previous consent of the Authority in writing.

Dated the.....date of 2023
for.....
(Indicate the name of Bank)

Signature.....

Name of the Officer.....
(in Block Capitals)

Designation :

Code No.....

Name of the Bank and Branch.

DECLARATION BY THE BIDDERS
(To be submitted on the letter head of the Bidder)

To,

Date:.....

The Chief Engineer,
Inland Waterways Authority of India
Gaighat, Patna, Bihar. Pin: 800007.

Sub: Declaration from the Bidder

Tender Reference No: IWAI/PTN/Dredging/Nayaghat-Guptarghat/River Ghaghra/2024-25

Dear Sir,

This is with reference to the above mentioned Tender document.

We hereby make the following declarations:

1.	<input type="checkbox"/>	No alteration has been made in any form in the Tender document downloaded from the website of IWAI and e-procurement portal.
2.	<input type="checkbox"/>	I / We have not been debarred / blacklisted during the last three years
3.	<input type="checkbox"/>	I / We accept the payment terms of Terms of Reference.
4.	<input type="checkbox"/>	I / We provide our acceptance to all the Terms and Conditions of this tender document.
5.	<input type="checkbox"/>	I / We agree to disqualify us for any wrong declaration with respect to the submissions made by us for this tender and reject my/our tender summarily
6.	<input type="checkbox"/>	I / We agree to disqualify us from this tender and black list us for tendering in IWAI projects in future, if it comes to the notice of IWAI that the documents/submissions made by me/us are not genuine
7.	<input type="checkbox"/>	I / We confirm that I/we have noted / updated ourselves of all amendments / corrigendum / response to pre-submission queries etc. and bid is submitted incorporating the same.
8.	<input type="checkbox"/>	I / We have visited the site and familiar with the site conditions as well as proposed works.

Note: Please Tick the appropriate box in the above table.

Yours Faithfully

(Signature of the Bidder, with Official Seal)

DETAILS OF PAST EXPERIENCE OF CONTRACTOR FOR SIMILAR WORKS

(Bidder has to submit duly filled form in accordance with clause 4.1. (h) of instructions for submission of bid (page no.14)

Sl. No.	Name & Location of Project	Value of Work (in lakhs)	Particulars of Client	Duration of Contract			Details of Work
				Date of Commencement	Scheduled Completion Date	Actual Completion Date	

Note:

- (i) Bidders to enclose copies of work orders with respective completion certificates issued by the owner in chronological order within a period of last 7years.
- (ii) If the table is not found spacious, bidder may kindly re-type form and submitted online.
- (iii) Incomplete work / Ongoing project will not be considered hence the same may not be included.

Annexure-4

CONCURRENT COMMITMENTS OF THE BIDDER

Sl. No.	Full Postal Address of Client & Name of officer-in-charge	Description of the work	Value of contract	Date of commencement of work	Scheduled completion period	Average completion as on date	Expected date of completion	Remarks if any

Annexure-5

LIST OF CUTTER SUCTION DREDGERS & FLOATING CRAFTS / EQUIPMENTS FOR DREDGING / EXCAVATION AND REMOVAL OF SILT PROPOSED FOR THE WORK

Sl. No.	Name of dredger/ Equipment/ machinery	Quantity	Description size, capacity	Present location
a) Available				
b) To be procured/ hired by the contractor				

Note: The bidder is requested to give all relevant and complete information as required.

Annexure-6

List of key personnel proposed to be deployed by Contractor

Sl. No.	Name	Designation	Qualification / Experience

AGREEMENT FORMAT

This agreement made on day year between the Inland Waterways Authority of India (hereinafter called the 'IWAI' which expression shall unless excluded by or repugnant, to the context, be deemed to include heir, successors in office) on one part and M/s. (hereinafter called the 'CONTRACTOR' which expression, shall unless excluded by repugnant to the context be deemed to include his heirs, executors, Administrators, representatives and assigns of successors in office) on the other part.

WHEREAS THE IWAI IS desirous of undertaking the works of "Development of navigational channel by quantity based dredging between Nayaghat - Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y- 2025-26"

WHEREAS the contractor has offered to execute and complete such works and WHEREAS IWAI has accepted the tender of the contractor and WHEREAS the contractor has furnished as Performance Security for the due fulfilment for all the conditions of this contract.

NOW IN THIS AGREEMENT WITNESSTH AS FOLLOWS

In this agreement words and expression shall have the same meaning as are respectively as assigned to them in the conditions of contract hereinafter referred to:

The following documents shall be deemed to form and be read and construed as part of this agreement Viz.,

- i) E-tender submitted by the Contractor including,
 - (a) Notice Inviting Tenders
 - (b) Tender form
 - (c) Information & instruction for Tenders
 - (d) Schedule : Bill of Quantity
 - (e) Drawings & Annexures
 - (f) General Conditions of Contract and Technical specifications & Special Conditions of Contract
- ii) Correspondences between IWAI and the Contractor dated,.....
- iii) Work order No.....dated.....
- iv) Any other / all other documents relevant for the Contract Agreement

The contract agreement has been compiled by the IWAI from the original tender documents and all the correspondences from the tendering stage till acceptance. In the event of any difference arising from the completion of the contract, the original tender documents, contractor's offer, minutes of meetings and correspondence between the parties ended vide letter No.

..... may be referred to by either party. These documents shall take precedence over the compiled documents.

The contractor hereby covenants with the IWAI to complete and maintain the “Works” in conformity in all respect, with the provisions of the agreement.

The IWAI hereby covenants to pay the contractor in consideration of such completion of works, the contract price at the time and in the manner prescribed by the contract.

IN WITNESS WHEREOF the parties hereunto have set their hands and seals on the day year first written.

For and on behalf of

For and on behalf of

(Inland Waterways Authority of India)

Contractor

Signature _____

Signature _____

Name & Designation _____

Name & Designation _____

Stamp

Stamp

Witness:

Witness:

1) Signature _____

1) Signature _____

2) Name & Designation _____

2) Name & Designation _____

BANK GUARANTEE PROFORMA FOR FURNISHING
PERFORMANCE GUARANTEE

To
The Chairman,
Inland Waterways Authority of India
A-13, Sector-1, Noida.

In consideration for the Chairman, Inland Waterways Authority of India hereinafter called ‘the Authority’ having agreed, under the terms and conditions of the Agreement dated..... made between..... and.....for the due fulfillment of the said Agreement by the Contractor of the terms and conditions contained in the said Agreement, on production of Bank Guarantee for Rs..... (Rupees.....) at the request of..... Contractor(s), We (Bank) do hereby undertake to pay to the Authority an amount not exceeding Rs..... against any loss or damage caused to or suffered, or would be caused to or suffered by the Authority by reason of any breach of the said Contractor(s) of any of the terms or conditions contained in the said Agreement.

2. We..... do hereby undertake to pay the amount due and payable under this Guarantee without any demur, merely on a demand from the Authority stating that the amount claimed is due by way of loss or damage caused to or would be caused to or suffered by the authority by reason of breach by the said contractor(s) of any of the terms or conditions contained in the said Agreement or by reason of the contractor(s)'s failure to perform the said Agreement. Any such demand made on the Bank shall be conclusive as regards the amount due and payable by the Bank under this guarantee. However, our liability under this guarantee shall be restricted to an amount not exceeding Rs.....
3. We undertake to pay the authority any money so demanded notwithstanding any dispute or disputes raised by the contractor(s) / suppliers(s) in any suit or proceeding pending before any court or Tribunal relating thereto liability under this present being absolute and unequivocal. The payment so made by us under this Bond shall be valid discharge of our liability for payment there under and the contractor(s) / supplier(s) shall have no claim against us for making such payment.
4. We, further agree that the guarantee herein contained shall remain in full force and effect during the period that would be taken for the performance of the said Agreement and that it shall continue to be enforceable till all the dues of the Authority under or by virtue of the said Agreement have been fully and its claim satisfied or discharge or till
Certify that the terms and conditions of the said Agreement have been fully and properly carried out by the said Contractor(s) and accordingly discharges this Guarantee after.....years from the date of completion of the said contract unless a demand or claim under this Guarantee is served in writing on the bank but before the expiry of the said period of years in which case it shall be enforceable against the bank notwithstanding the fact that the same is enforced after the expiry of the said period of years.
5. We,.....further agree with the Authority that the Authority shall have the full liberty without our consent and without affecting in any manner our obligations hereunder to vary any of the terms and conditions of the said Agreement or to extend time of performance by

the said Contractor(s) from time to time or to postpone for any time or from time to time any of the powers exercisable by the Authority against the said Contractor(s) and to forbear or enforce any of the terms and conditions relating to the said Agreement and we shall not be relieved from our liability by reason of any such variation, or extension being granted to the said Contractor(s) or for any forbearance, act or omission on the part of the Authority or any indulgence by the Authority to the said Contractor(s) or by any such matter or thing whatsoever which under the law relating to sureties would, but for the provision, have effect of so relieving us.

6. It shall not be necessary for the Authority to proceed against the Contractor before proceeding against the Bank and the Guarantee herein contained shall be enforceable against the Bank notwithstanding any security which the Authority may have obtained or obtain from the Contractor shall at the time when proceedings are taken against the Bank hereunder be outstanding or unrealized.
7. Notwithstanding anything contained herein above our liability under the guarantee is restricted to Rs..... and shall remain in force until..... Unless a claim or suit under this guarantee is filed with us on or before..... **ALL OUR RIGHTS UNDER THE GUARANTEE SHALL BE FORFEITED** and the bank shall be relieved and discharged from all liabilities therein.
8. This Guarantee will not be discharged due to the change in the constitution of the Bank or the Contractor(s) /supplier(s).
9. We, lastly undertake not to revoke this Guarantee during its currency except with the previous consent of the Authority in writing.

Dated the.....date of..... 201...
for.....
(indicate the name of Bank)

Signature.....

Name of the Officer.....

(in Block Capitals)

Designation of

Code No.....

Name of the Bank and Branch.

PROFORMA OF BANK GUARANTEE FOR
WORK ADVANCE

To,
The Chief Engineer,
Inland Waterways Authority of India
Gaighat, Patna, Bihar. Pin: 800007.

In consideration of the Authority (Inland Waterways Authority of India) acting through its Chairman which expression shall unless repugnant to the subject or context include his successor and assigns) having agreed under the terms and conditions of Contract No.....,dated.....made between.....and the Authority in connection with(hereinafter called "the said Contract") to make at the request of the Contractor a lump sum advance of Rs.....(Rupees)for utilizing it for the purpose of the Contract on his furnishing a guarantee acceptable to the Authority, we the Bank Ltd. (hereinafter referred to as "the said Bank") having our registered office at do hereby guarantee the due recovery by the Authority of the said advance with interest thereon as provided according to the terms and conditions of the Contract. Wedo hereby undertake to pay the amount due and payable under this Guarantee without any demur, merely on a demand from the Authority stating that the amount claimed is due to the Authority under the said Agreement. Any such demand made on theshall be conclusive as regards the amount due and payable by theunder this guarantee and theagree that the liability of theto pay the Authority the amount so demanded shall be absolute and unconditional notwithstanding any dispute or disputes raised by the Contractor and notwithstanding any legal proceeding pending in any Court or Tribunal relating thereto. However, our liability under this Guarantee shall be restricted to an amount not exceeding Rs.....(Rupees).

2. WeBank Ltd. further agree that the Authority shall be the sole judge of and as to whether the said Contractor has not utilized the said advance or any part thereof for the purpose of the contract and the extent of loss or damage caused to or suffered by the Authority on account of the said advance together with interest now being recovered in full and the decision of the Authority that the said Contractor has not utilized the said advance or any part thereof for the purpose of the Contract and as to the amount or amounts of loss or damages caused to or suffered by the Authority shall be final and binding onus.

We, the said Bank further agree that the Guarantee herein contained shall remain in full force and effect during the period that would-be taken for the performance of the said Contract and till the said advance with interest has been fully recovered and its claims satisfied or discharged and tillcertify that the said advance with interest has been fully recovered from the said Contractor, and accordingly discharges this Guarantee subject, however, that the Authority shall have no claims under this Guarantee afteryears from the date of completion of the said Contract, as the case may be, unless a notice of the claim under this Guarantee has been served on the bank, before the expiry of the said period ofyears in which case the same shall be enforceable against the bank notwithstanding the fact that the same is enforced after the expiry of the said period ofyears.

The Authority shall have the fullest liberty without affecting in any way the liability of the Bank under this Guarantee or indemnity, from time to time to vary any of the terms and conditions of the said contract or the advance or to extend time of performance by the said Contractor or to postpone for any time and from time to time any of the powers exercisable by it against the said Contractor and either to enforce or for bear from enforcing any of terms and conditions governing the said Contract or the advance or securities available to the Authority and the said bank shall not be released from its liability under these presents by any exercise by the Authority of the liberty with reference to the matters aforesaid or by reasons of time being given to the said Contractor or any other forbearance, act or omission on the part of the Authority or any indulgence by the Authority to the said Contractor or of any other matter or thing whatsoever which under the law relating to sureties would but for this provision have the effect of sore leasing the Bank from its such liability.

It shall not be necessary for the Authority to proceed against the Contractor before proceeding against the Bank and the Guarantee herein contained shall be enforceable against the bank notwithstanding any security which the Authority may have obtained or obtain from the Contractor shall at the time when proceedings are taken against the Bank hereunder be outstanding or unrealized.

We, the said Bank lastly undertake not to revoke this Guarantee during its currency except with the previous consent of the Authority in writing and agree that any change in the constitution of the said Contractor or the said bank shall not discharge our liability hereunder.

Dated this.....day of.....20.....

For and on behalf of the Bank.....(Name and Designation)

The above Guarantee is accepted by the Inland Waterways Authority of India

For and on behalf of Inland Waterways Authority of India

Dated.....(name and Designation)

SAMPLE FORM FOR SITE ORDERS BOOK
(Reference Clause No. 18.4)

Name of work Date of commencement/ period for completion.....

Sl. No.	Date	Remarks of the Inspecting Officer or Contractor	Action taken and by whom	Remarks
1	2	3	4	5

PROFORMA FOR HINDRANCE REGISTER
(Reference Clause No. 18.5)

Sl. No	Nature of hindrance	Items of work that could not be due executed to this hindrance	Date of start of hindrance	Signature of Representative of EIC	Date of removal of hindrance	Overlapping period, if any	Net hindrance in days	Weightage of this hindrance	Net effective days of hindrance	Remarks of Engineer-in-Charge
1	2	3	4	5	6	7	8	9	10	11

Notice for appointment of Arbitrator
(Refer Clause 47)

To,
The Chairman,
IWAI, A – 13,
Sector – 1, Noida-201301
(U.P.)

Dear Sir,

In terms of Clause 47 of the Agreement, particulars of which are given below, I/we hereby give notice to you to appoint an arbitrator for settlement of disputed mentioned below:

1. Name of applicant
2. Whether applicant is Individual/Prop. Firm/Partnership Firm/Ltd. Co.
3. Full address of the applicant
4. Name of the work and contract number in which arbitration sought
5. Name of the Division which entered into contract
6. Contract amount in the work
7. Date of contract
8. Date of imitation of work
9. Stipulated date of completion of work
10. Actual date of completion of work (if completed)
11. Total number of claims made
12. Total amount claimed
13. Date of intimation of final bill (if work is completed)
14. Date of payment of final bill (if work is completed)
15. Amount of final bill (if work is completed)
16. Date of request made to Chief Engineer for decision
17. Date of receipt of Chief Engineer's decision
18. Date of appeal made to Chairman, IWAI
19. Date of receipt of the decision of Chairman, IWAI

Specimen signatures of the applicant
(only the person/authority who
signed the contract should sign)

I/We certify that the information given above is true to the best of my/our knowledge. I/We enclose following documents.

1. Statement of claims with amount of claims
- 2.
- 3.

Yours faithfully
(Signatures)

Copy in duplicate to:
1. The Regional Chief
Engineer, IWAI

PART – V

SCHEDULE OF QUANTITIES / FINANCIAL BID

Item WiseBoQ

Tender Inviting Authority: Inland Waterways Authority of India

**Name of Work: Development of navigational channel by quantity based dredging between Nayaghat -
Guptarghat stretch of National Waterway no -40 (River Ghaghra) for F.Y- 2024-25 & F.Y-
2025-26**

Contract No:

Name of the Bidder/ Bidding Firm / Company :						
PRICE SCHEDULE (DO MESTIC TENDERS - RATES ARE TO GIVEN IN RUPEES (INR) ONLY) (ThisBOQtemplatemustnotbemodified/replacedbythebidderandthesameshouldbeuploadedafterfillingtherelevantcolumns,elsethe bidder is liable to be rejected for this tender. Bidders are allowed to enter the Bidder Name and Values only)						
NO #	TEXT #	NUMBER #	TEXT #	NUMBER #	NUMBER #	TEXT #
Sl. No.	Item Description	Quantity	Unit	RATE (incl. 1% Labour Welfare Cess but excl. GST) Rs. P	AMO UNT in Rs. P	AMOUNT (inWords)
1	2	3	4	5	6	7
1	Dredging / widening and removal of silt					
1.01	Dredging by cutter Suction Dredgers of suitable size, type and capacity as per general & special conditions. Technical specification to provide Fairway Maintenance on quantity based dredging of Guptarghat to Nayaghat stretch (11 km approx.) of NW-40 for a period of two years. The rate shall include the survey (at all stages pre and post dredging survey) Mobilization and demobilization charges. Shifting charges from shoal to shoal, dumping of dredged spoil upto minimum 300m & maximum 1000m through pipeline or other suitable means including leads-lift (except GST) as prevailing and all other taxes/charges expenditure etc complete in all respect and as per direction of EIC.	1.22 lakh	Cum.			INR ... Only
Total in Figures						INR ... Only
Quoted Rate in Words						INR Zero Only
GST (as applicable)						

Signature:.....

Name & Address of the Bidder:.....

.....

.....