



**Government of West Bengal
Irrigation & Waterways Directorate
Office of the Superintending Engineer
Damodar Irrigation Circle**

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NOTICE INVITING e-TENDER

e-N.I.T No. WBIW/SE/DIC/NIT-05(e)/2018-19 (2nd Call)

Encrypted electronic bids are hereby invited by the **Superintending Engineer Damodar Irrigation Circle, Irrigation & Waterways Directorate** on behalf of the Governor of the State of West Bengal through a single stage two part e-Procurement System; (Part I: Techno-commercial bid and Part II: Financial bid) for the 'LIST OF WORKS' given in the next page from eligible bonafide contractors/agencies/bidders having specified Pre-Qualification (eligibility) credential for execution of works of similar nature and desired financial capabilities. The technical bid in Part-I would require the bidder to qualify for the next phase of financial bid: Part-II, in which L1 bid price would determine the final selection and acceptance of a bidder for award of the Procurement of Goods & Works contract.

Intending contractors/bidders desirous of participating in this e-Tender are required to login to the Government of West Bengal e-Procurement website having URL <https://wbtenders.gov.in> and locate the instant tender by typing **WBIW/SE** in the search engine provided therein, or by logging-in using their assigned User ID and password. They may also visit the official website of the Irrigation & Waterways Department, Government of West Bengal www.wbiwd.gov.in to locate the same e-Tender by scrolling the "e-Procurement" link.

Contractors/bidders willing to take part in the e-Tender are required to obtain a valid Digital Signature-Certificate (DSC) from any of the authorized 'Certifying Authorities' (CA) under Controller of Certifying Authorities (CCA), Department of Electronics & Information Technology (DEIT), Govt. of India. (viz. NIC, n-Code Solution, Safescrypt, e-Mudhra Consumer Services Ltd, TCS, MTNL, IDRBT) or as notified by the CA /Finance Department, GoWB from time to time. DSC is given as a USB e-Token. After obtaining the Class 2 or Class 3 Digital Signature Certificate (DSC) from any of the above CA, they are required to register the fact of possessing the DSC through the registration system available in the above mentioned websites. A list of such licensed CAs' is also available in the CCA website cca.gov.in. The prospective contractors / bidders may contact the Departmental e-Tendering Help desk located at the 7th Floor of Jalasampad Bhavan at Bidhannagar, Sector-II, Kolkata, through e-mails irrigationhelpdesk@gmail.com and dvcsc6816@gmail.com or Telephone No. 033-23346098 and the State Level e-Procurement Help Desk located at the Ground Floor of Jalasampad Bhavan through e-mail wbehelpdesk@gmail.com or Ph:(033)-2334 5161 on any working day between 10.30AM-5.30PM for any query on e-Tendering procedure, obtaining DSC and free of cost training on e-Procurement procedure.

Intending contractors/bidders are required to download the e-Tender documents directly from either of the websites stated above. **This is the only mode for submission of a tender.** The interested bidders eligible for the tender are required to submit their bids through the e-Procurement System using their valid DSC e-Token with assigned PIN using login ID and password. Details of e-filing procedure for participating in e-tenders under State Government have also been explained in the 'Bidders' Manual', available in the Departmental website www.wbiwd.gov.in.

Last date & time of submission of bid electronically, is on 27.08.2018 till 17.00 Hours IST.

The applicant bidders/contractors are advised to carefully read all the 'Terms & Conditions' contained in this e-Notice Inviting Tender (e-NIT). He/she should particularly go through the minimum desired Pre-qualification (PQ) works credential & financial eligibility criteria and satisfy himself/herself of all the mandatory eligibility requirements. Bidders desirous of participating in the e-Tender should submit bids only if they fulfill the minimum PQ eligibility criteria and are in possession of all the required PQ Credential documents "in original" as these may be summoned by the Tendering authority for verification purposes.

All information published in the website consisting of e-NIT and other related documents uploaded by the selected bidder, WB Works Contract Form No. 2911(i)/2911(ii), Bill of Quantities (BOQ), EMD exemption order, if any, corrigenda and drawings etc. if any, shall form a part of the Agreement / contract document.

LIST OF WORKS

e-N.I.T No. WBIW/SE/DIC/NIT-05(e)/2018-19 (2nd Call)

SI no	Name of Work/Projector, Procurement except services	Designated Executive Engineer to function as DDO & EIC (In case of more than one is engaged, EIC to be decided by the Tender Accepting Authority)	Amount put to Tender (Tender Value) (Rs)	Earnest Money Deposit (Rs)	Time allowed for completion (In English Calendar days)	Source of Fund	Minimum eligibility criteria to match the Prequalification (PQ) works credential in terms of execution of similar previous works contract (*)	'Physical Milestones' for completion of each work within stipulated time (Refer to Clause 19 of the General Terms & Conditions)
1	2	3	4	5	6	7	8	9
1	Rehabilitation and strengthening of the damaged divide walls and downstream floor of Duragapur Barrage over River Damodar at Block & P.S.- Barjora, Dist- Bankura, West Bengal.	Executive Engineer, Damodar Head Works Division, Durgapur, Paschim Bardhaman	89,20,60,767.00	50,00,000.00	730 days	CORE	<p>Summary of minimum eligibility desired for technical qualification and for next stage of financial bid of this tender:</p> <p>A. Prequalification (PQ) Work Credential:</p> <p>i. The bidder must have satisfactorily completed at least 1 (one) work of similar nature in dams / barrages / similar hydraulic structures within last five Financial Years having gross final bill value of not less than 25% of the amount put to tender (50% for consortium / joint venture).</p> <p>ii. In order to establish similarity, the resultant monetary value of concrete items (PCC / RCC / PSC / cementitious grouting) in the BOQ presented with the Completion/ Credential Certificate by the bidder, i.e. the aggregate monetary value contained in the BOQ, multiplied by the inflationary factor, and further multiplied by 0.35 (0.70 for consortium / joint venture), should not be less than gross notional value of such concrete work arrived at on the basis of the BOQ of the instant work of rehabilitation.</p> <p>iii. The Bidder must have conducted under water investigation of similar structure and also must have conducted grouting (cementitious / other materials), preferably in under water conditions, in the same work where under water investigation was conducted. Credential / activities stated in this para should preferably be part of the work stated to be of similar nature, as detailed in (A) [i] & [ii] above.</p> <p>a. Major Item description in brief: Concrete (PCC / RCC / PSC / cementitious grouting)</p> <p>b. Rs. 11.83 Crore & for Consortium/Joint Venture Rs. 23.66 Crore.</p> <p>B. Financial capability in preceding three FY within zone of last five FY:</p> <p>a) Average Gross Annual Turnover of the bidder except for Consortiums and Joint Venture Companies for three FYs within immediate preceding five FY should be at least of 50% of Amount put to Tender amounting to Rupees 44,60,30,384.00</p> <p>b) The above value for Consortiums or Joint Ventures should be minimum 100% of the Amount put to Tender amounting to Rs. 89,20,60,767.00. Turnover of consortium / JV Partners should be 10%.</p> <p>(Both A. & B stated above should be simultaneously fulfilled as minimum eligibility for qualifying in the Technical Bid Evaluation stage, and all claims for eligibility are to be substantiated with valid legally authentic documents during submission of on-line bid itself)</p>	As per Work Programme prepared and uploaded by the Tender Inviting Authority in the form of Bar Chart or other forms.

(* For Consortium & Joint Venture, additional criteria mentioned under Cl. 1 (Note), 4.2B (II) & Cl. 7 V of the General Terms & Conditions in this e-NIT may be referred.

(General Terms & Conditions of contract)

1. Eligibility for participation in e-tender under National Competitive Bidding (NCB)

All Bonafide Indian contractors/Agencies/Organizations, Registered Companies/ Firms including Registered Partnership Firms, Proprietorship Firms, Registered Consortiums & valid 'Joint Ventures' and contractors/bidders of equivalent grade or class having Pre-Qualification (PQ) Credential in the Government of West Bengal, Union Government Departments/ Other State Government Departments/ Engineering Wings of Gol /IRCON/RVNL/NHPC, Autonomous Project Authority and other similar organizations of Gol and State Governments/PSU and Corporations of Government of India and other States having successfully completed at least one similar in nature project and not otherwise debarred are eligible to participate, subject to fulfilling other PQ eligibility criteria laid down in the subsequent paragraph.

Note: In case of a Consortium or Joint Venture, the maximum number of constituents shall be restricted up to 3 (Three), and each of the constituents must have at least 10% of tender value as their individual average of annual turnovers from business in any three financial years within the zone of last five financial years and also fulfilling other PQ criteria. Individual constituents of a Consortium or JV cannot form another Consortium or JV to bid in the same work of the e-NIT. Where ever a JV/Consortium has submitted a tender, any of its constituents shall not separately bid for the same serial of work in that e-NIT, or shall have no stake involving another bidder participating in the same serial of work.

2. Participation in more than one serial of work out of list of works published in the one e-NIT.

Any contractor/bidder may bid for any number of Serials of work in a particular e-NIT, if more than one work have been published in that e-NIT, subject to fulfillment of all of the following conditions:

- a. There should be full compatibility (matching between the technical PQ credential submitted by the bidder in the form of Credential Certificate (CC) along with other relevant documents as stated under Clause 4.2B III) relating to any work successfully completed by the bidder and technical PQ criteria specified in the e-NIT for any particular serial of works for which the bidder intends to bid. In other words, technical PQ credential certificate along with relevant documents submitted for any work should at the minimum; satisfy the technical PQ eligibility criteria specified for that work. Normally there should be separate CC along with relevant documents for each of the serial of works, the bidder intends to bid and the serial number relevant to the CC should be clearly written on the body of the CC and also on the other documents stated under Clause 4.2B III. However, the bidder will also reserve the right to submit one CC along with relevant documents for bidding in more than one serial of work, provided cumulative technical PQ credential of all such serials should be fulfilled by one single CC. In such case also, serial numbers of the relevant works for which the CC is submitted should be clearly written on the body of the CC by the bidder. Omission of serial numbers on the body of the CC and also on the other documents stated under Clause 4.2B III, in case of bidding for more than one serial will lead to rejection of all the bids.
- b. Average of gross annual turnover of the individual bidder/Organization/consortium or Joint Venture for any three financial years within preceding five financial years, as stated under Clause 7V, should not less than the summation of turnover requirements of the relevant individual serial of works for which the bidder intends to bid.

3. Pre-bid Meeting:

'Pre-Bid' meeting would be held in the office chamber of the Tender Inviting Authority (TIA) preferably on Day 4 or 5 from the date of publication of e-NIT, which shall be notified in the date schedule of e-NIT for all works having tender value above Rs. 4.00 crore in order to acclimatize the prospective contractors/bidders through an interactive open session, replying to their queries, and clear doubts in connection with the tendered work/s, if any. The minutes of this pre-bid meeting containing clarifications if any, would be uploaded by the TIA within 2 (two) working days in the designated tender folder in e-Procurement portal.

4. Submission of bid

4.1 General procedure for submission of e-bid

Bids are to be submitted electronically in the on-line mode through the e-Procurement portal www.wbtenders.gov.in. All documents uploaded by the Tender Inviting Authority forms an integral part of the works contract/Agreement. Contractors/bidders are required to upload the entire tender documents along with all other relevant PQ credential documents as asked for in the e-NIT, electronically, through the above portal within the stipulated date and time as notified in the e-NIT. Tenders are to be submitted in two parts/folders at the same time for each work, one being 'Technical Proposal' and the other 'Financial Proposal'. The contractor/bidder should carefully go through all the documents of the e-tender and upload the scanned copies of his/her/their original documents in 'Portable Document Format' (PDF) files in the designated links in the web portal as their 'Technical Bid'. He/she needs to fill up the financial offer/bid price/ rates in percentage above or below or 'At-Par' in the downloaded BOQ of the work in the designated cell in 'Excel sheet only', and upload the same in the designated link of the portal as their 'Financial Bid'. Documents

uploaded are virus scanned and required to be digitally signed using their 'Digital Signature Certificates' (DSC). Contractors/bidders should especially take note of all the *Addenda* or *Corrigenda* notices related to the e-Tender and upload all of these documents forming a part of their e-bid as tender document. Documents digitally signed and uploaded in the e-Tender portal by the contractors/bidders containing requisite information & financial bid/rate comprising '*Technical bid*' and '*Financial bid*' are submitted concurrently, which cannot be changed after end date and time fixed for submission of the e-Tender. Extension of last date for bid submission by insertion of any date Corrigendum is to be made after last date of bid submission has passed, when the no. of bids received is less than three. In that case an extension notice is to be issued before opening of the technical bid. However, such extension may generally be made for at least 5 clear days which would be counted from the date of publication of the corrigendum notice. Extension of bid submission period is to be published in at least one widely circulated daily Newspaper. Except for date corrigendum, all other corrigendum if issued, the tender would have to be extended by 7 (seven) calendar days. After opening of the technical bids the date cannot be extended, however re-tender may be invited. Extension of dates cannot be treated as 2nd or subsequent call. Extension of last date and time for bid submission by issuance of a Corrigendum shall not be treated as 2nd Call or Re-tender.

4.2 Technical Proposal

The Technical Proposal should contain scanned PDF files of all documents in the following standardised formats in two part covers or folders.

Cover No	Cover	Document Type	Descriptions
1	Pre-Qual/Technical	.pdf	NIT_Corrigendum
		.pdf	Agreement 2911
		.pdf	Forms
		.pdf/jpg/WinRAR	Drawings
		.pdf/jpg	BAR_CHART
2	Finance	.xls	BOQ

4.2 A Descriptions of Technical (Pre-Qual) Covers

- i. '**NIT_Corrigendum folder**': e-Notice Inviting Tender is *to be downloaded in entirety, digitally signed and uploaded during e-bid submission in "NIT_Corrigendum" folder.* '**Corrigenda/Addenda**' if published in connection with the NIT is to be digitally signed and uploaded in the '**NIT_Corrigendum**' folder merged with e-NIT documents during e-bid submission.
- ii. '**Agreement_2911**' folder: Contract /Agreement in WB Form No. 2911(ii) published in the e-Tender is *to be downloaded digitally signed and uploaded during e-bid submission in Agreement_2911 folder.*
- iii. '**Forms**' folder: Applications for e-Tender: vide self declaration format in specimen Form-1 , Self declaration of bidder not having common interest as a different bidder organisation in any other work tendered under different serials of this particular e-NIT *vide specimen Form-2*, Power of Attorney to sign contract/Agreement on behalf of a Registered Company, Government Undertakings, autonomous organisations, *vide specimen Form-3*, and self declaration on antecedents and performance of the bidder in specimen Form-4. In case of consortiums and Joint Ventures, Power of Attorney of lead member to be submitted in Non-Judicial Stamp Paper in accordance with the provision of Registration Act, 1908 in Form-5. *All above forms are to be filled up completely, digitally signed and uploaded during bid submission in "Forms" folder.*
- iv. '**Drawings folder**': The GAD/Plan/Map published in the e-Tender by the Tender Inviting Authority is to be downloaded by the bidder, digitally signed and again *uploaded during e-bid submission in "Drawings" folder*
- v. '**BAR_CHART folder**': **BAR CHART/Work Programmes in other Networking Methods** prepared by TIA in pdf file defining the Physical Milestones of the construction period for implementation of the project is to be downloaded by the bidder digitally signed and again *uploaded during e-bid submission in "BAR_CHART" folder*

4.2A.NOTE:

- i. *Contractors/bidders are required to keep track in the e-Procurement website www.wbtenders.gov.in for all the Addenda or Corrigenda notices and other documents published in connection with a particular e-Tender and upload the same, digitally signed along with their e-bids. Tenders submitted without Addendum/Corrigendum are treated as incomplete and thereby liable for disqualification or rejection.*
- ii. *Form 1, Form 2, Form 4 are mandatory for all bidders. Form-1, Form-2, Form-3 (not applicable for proprietorship and partnership Firms and applicable for Companies/Corporation/Undertakings/autonomous bodies/ consortiums and JVs), Form 4 and Form-5 (only applicable for JV/Consortium) are taken from bidders by TIA as bidders self declarations' or undertakings. These formats are specimens or samples only and deviation from specimen format is not a sufficient*

ground for rejection of the bid. Relevant blank Forms are to be firstly downloaded by the bidders from the NIT in e-Procurement portal, filled up completely and again uploaded with their electronic bid.

4.2 B. My Document [OID* Cover]:

It is desired that PDF files of all other original documents in support of their eligibility and PQ credential shall have to be submitted under the OID cover folders as detailed below:

My Document Format for uploading in OID folder:-

Sl. No.	Category	Sub-category	Sub-category description	Remarks if any
I	Certificates	1. certificates.pdf 2. GST_registration_certificates.pdf	1. Latest Professional Tax Payment Certificate (PTPC) or, PT deposit challan for current financial year or Government Order for exemption in other States where ever applicable. 2. Valid PAN Card in the name of bidder/organisation 3. Income Tax Return of current Assessment year or, IT Return of immediate preceding Assessment year whichever latest available. 4. Valid GSTIN under GST Act & Rules	Refer to Clause 4.2C(I) for details
II	Company Details	companydetails.pdf 1 companydetails.pdf 2	1. For Proprietorship Firms, Partnership Firms, Registered Companies, Registered Co-operative Societies, valid Joint Venture or Consortiums Valid Trade License/ acknowledgement or Receipt of application for Trade License/ Revalidation OTHER REQUIREMENTS:- 2. For Partnership Firms: Legally valid Partnership Deed, Form-VIII/ Memorandum of Registration of Registrar of Firms 3. For Companies: Incorporation Certificate, Memorandum of Articles of ROC, List of current owners/ Directors/Board Members 4. For State Registered Co-operative Societies: Society Registration certificate from ARCS of the State, Society by-Laws, latest available Auditor's Report of Directorate of Co-operative Audit within proceeding five years as per Societies Act & Rules 5. For legally constituted Consortiums/ Joint Venture of Firms/ Companies: Registered MoU or Agreement for Consortium /JV, Registration under ACRS/ROC in addition to satisfying requirements stated earlier for individual constituent Firms/Companies forming the Consortium/JV	Refer to Clause 4.2C(II) for details
III	Credential of work	Credential pdf 1 Credential pdf 2	1. BOQ/SoR and Work Order/ Award of Contract of LOA/LOI duly authenticated by issuing authority. 2. Pre-Qualification (PQ) Work credential of one 100% completed work as desired in the NIT as the Credential Certificate (CC) duly authenticated by competent authority.	Refer to Clause 4.2C(III) for details
IV	Financial Information	1. P/L and audited Balance sheet for year -1.pdf2 2. P/L and audited Balance sheet for year-2.pdf3 3. P/L and audited Balance sheet for year-3.pdf4.	1-3 Profit & Loss accounts and audited balance sheets along with relevant annexures containing the designated Forms 3CA/ 3CB/3CD, as applicable under IT Act, in the name of the bidder for any three financial years within the zone of preceding five financial years from date of publication of e-NIT	Refer to Clause 4.2C(IV) for details

* OID denotes Other Important Documents.

Note:

- i. It is desirable but not mandatory that all documents stated above in PDF files shall be uploaded by bidders only in specified designated folders. No off-line document will be accepted and considered during tender evaluation stage from bidders before publishing result of final selection of L1 by publication of FBE sheet. Verification of authenticity of bid documents during bid evaluation by DTTC may be undertaken from bidders or directly from PQ Credential issuing authority.
- ii. Validity of documents submitted by bidder shall stand determined on the date of publication of tender notice (e-Notice Inviting Tender)

4.2 C(I) Certificate/s: The documents mentioned below under Serial a, b & c are to be uploaded as 'PDF' files in Certificate.pdf1 (*name of the file should be "certificates.pdf"*)
The document mentioned under Sl. d below is to be uploaded in GST Registration Certificate.pdf file.

- a. Latest available Professional Tax Payment Certificate (PTPC) or the PT payment challan/ receipt for current financial year/Waiver Order of competent authority in other States if applicable.
- b. Valid PAN Card of the bidder/s are required;
- c. Income Tax Return of current Assessment Year or, IT Return of immediate preceding Assessment year under IT Act & Rules, whichever latest available with the bidder.
- d. Valid 15 digit Goods and Service Tax payer Identification Number (GSTIN) as per GST Act, 2017 & Rules of the bidder to be uploaded in 'GST registration certificate pdf'.

4.2C(II) All documents mentioned in tabular format under Clause 4.2B and also detailed below should be uploaded during electronic bid submission in PDF files with the *name of file should be "companydetails.pdf1/2"*

- i. For Partnership Firms: Documents of Registration of Partnership Firms in the certified copy of 'Form No. VIII,' issued under Indian Partnership Act, 1932 (Act-IX of 1932) by the Registrar of Firms. In case a Partnership Firm is yet to receive Form No. VIII, a "Memorandum" issued by the Registrar of Firms may also be accepted.
- ii. For Companies: Incorporation Certificate, valid Trade License or acknowledgement of issuing authority of receipt of application for Trade License / renewal, 'Memorandum of Articles' registered under the Registrar of Companies (ROC) under the Indian Companies Act, List of owners/ Directors/Board Members are to be uploaded with the e-bid.
- iii. For State Registered Co-operative Societies:
 - a. Society Registration certificate from ARCS (Assistant Registrar of Co-operative Societies, GoWB) and By-Laws for Cooperative Societies under West Bengal Co-operative Societies Act, 2006 and Rules, 2011 and all amendments.
 - b. Latest Auditor's Report of Directorate of Co-operative Audit under Department of Co-operative, Government of West Bengal within preceding five financial years as per Societies Act & Rules.
- iv. For Consortiums or Joint Ventures formed by Organisations/ Firms or Companies:

Registered Agreement/Memorandum of Understanding, and deed of Consortium formed out of Proprietorship and /Partnership Firms, and documents of Registration of Partnership Firms in the certified copy of 'Form No. VIII,' issued under Indian Partnership Act, 1932 (Act-IX of 1932) by the Registrar of Firms.

For Consortiums/Joint Ventures formed by individual Companies, Memorandum of Understanding/ Agreement of Consortium or JV. In a Joint Venture all documents are to be mandatorily signed by all constituents of that JV. The lead member of the Consortium/Joint Venture of Companies should be clearly declared in a registered Non Judicial Stamp paper of appropriate value during submission of e-bid in specimen Form-4 inside '**Forms**' folder.

Any change in the constitution of the Consortium or any of its constituent Firms should also be intimated to the office of the Registrar of Firms prior to submission of the bid and a certified copy of the revised Form No. VIII, showing changes in its constituents are required to be submitted with the e-bid. Also, the lead member of the Consortium/JV should be clearly declared in the '**Forms**' folder in specimen Form-5.

Self declarations in specimen Form-3 regarding authorized user of DSC and signing of bills and works contract if selected and in Form-5 regarding such authorization for Consortium/Joint Venture is required to be submitted with the e-bid. Power of Attorney of competent owners/first promoters is to be submitted, if the power is delegated for signing of Agreements/s to persons on behalf of the bidder/s.

4.2C(III) Eligibility criteria based on Credential of work/Prequalification Work Credential "credential.pdf**"**

- i. Bill of Quantities (BOQ) along with Work Order/Award of Contract; duly authenticated by the competent issuing authority is to be submitted under Technical cover (*name of file should be "credential.pdf 1)*).
- ii. Pre-Qualification (PQ) credential of one 100% completed work of Gross Notional Value as desired in the NIT as the Credential Certificate (CC) duly authenticated by competent authority. (*Name of file should be "credential.pdf 2)*).

4.2C(IV) Financial credential explanation:

- a. Profit & Loss Accounts and Audited Balance Sheets of any three financial years within zone of preceding five financial years, duly authenticated by licensed auditor regarding Annual Turnover from business containing relevant Annexure of IT Form 3CA/3CB/3CD as applicable for the bidder, having Annual Turnover above Rs 1.0 crore in each financial year. It is to be evaluated by the Tender Evaluation Committee as average or arithmetic mean over the said three financial years, to be uploaded in Profit & Loss & Balance Sheet.pdf. Auditor's certificate should preferably contain his/her Membership / Registration no. of Registered Audit/CA Firm and contact details for verification purposes.
As per IT Act for all type of Firms having Annual Turnover from business less than Rs. 1.00 crore, Profit & Loss accounts and audit balance sheets only is required, which is required to be certified by a Licensed CA Firm/Audit Firm.

Note: a. *If the bidder Company/Firm was set up less than three years ago, audited balance sheets and P/L Accounts for the number of years since inception are to be submitted under Technical cover and the average value would be evaluated only for the period since inception and not three years.*

- b. Any additional document considered necessary by the bidder related to 4.2B (IV).
- c. *No file in Technical / Pre-Qual cover or OID cover folder is allowed to be kept blank/empty. Where ever the Forms and documents are uploaded by the Tender Inviting Authority, the same is to be downloaded, duly filled up, converted to PDF file, and again uploaded after digital signing, forming a part of tender document. No offline document is acceptable during evaluation stage.*

4.3 Financial proposal / bid under Financial cover:-

The financial bid should contain the following documents in one cover or folder.

- i. **Bill of Quantities (BOQ):** The contractor/bidder is required to quote the financial offer/ bid price or rate as percentage above or below the estimated amount put to tender or 'at-par' with tender value, in the space marked for quoting rate in the BOQ of the tendered work.
- ii. Only the downloaded sheet of the above document in Excel format is required to be uploaded by the contractor/bidder.
- iii. BOQ without a valid numeric rate at the designated space provided in the BOQ will be disqualified and rejected outright. Contractors/bidders willing to quote "at-par" rate shall need to write "0" in the 'space' provided for rates in the BOQ of the tendered work.

5. Tender Fee and Earnest Money Deposit (EMD)

i. Tender Fees:

Entire set of e-Tender documents are made available free of cost through the State Government e-Procurement portal having URL <https://wbttenders.gov.in> and also available in the e-Procurement link of Departmental website www.wbiwd.gov.in. Cost for tender documents will not be charged even during execution of a formal tender contract/agreement. However, the contractors/bidders may wherever necessary shall be suitably charged for additional/multiple copies of drawings, specifications; Schedule of Rates booklet etc. and such fee may be suitably determined by the Tender Inviting Authority as per existing Rules. Finance Department has exempted from payment of EMD to State Registered Labour Cooperative Societies, Mackintosh Burn Limited, Westinghouse Saxby Farmer Limited & Britannia Engineering Limited only. State & Central Govt SSI Units are exempted from EMD for tenders for procurements and supply of **Goods only** and not works contracts. However, all other PQ credentials are to be fulfilled by each.

ii. Earnest Money Deposit (EMD):

Bidders are required make payment of Earnest Money (EMD) through the e-Payment banking system, on-line and should read in advance the instructions carefully, particularly those contained in the challan generated in the e-transaction of the portal, if opted for EMD payment through RTGS/NEFT. Only if the bidder is exempted from payment of EMD by the State Finance Department, the Govt order for such exemption is to be uploaded while opting for EMD exemption category. Any misjudgment and resultant non submission of EMD will lead to summarily rejection of the bid/tender.

Earnest Money Deposit has to be paid @ 20% of the amount put to Tender or Rs. 50.00 Lakh whichever is lower.

iii. Additional Performance Security:

"Additional Performance Security" has been made mandatory which shall be obtained only from the successful L1 bidder, if the accepted bid price is below 20% of the tender BOQ or below by more than 20% of the tender BOQ. This Additional Performance Security shall be equal to 10% of the tendered amount i.e. 10% of L1 bid price.

The Additional Performance Security shall have to be submitted by the selected L1 bidder after issuance of

Letter of Acceptance / Letter of Invitation (LoA/Lol) within next seven working days and before issuance of Award of Contract (AoC) in the form of "Bank Guarantee" of any Scheduled Bank approved by RBI, payable at Kolkata or / in West Bengal, as per specimen format Form-6. Else its / their earnest money deposit (EMD) will be forfeited without any prejudice by the tender inviting authority and the defaulting bidder also debarred from further participation in all future I & W D tenders for a period of one year for committing the offence on the first occasion and for a period of two years for recurrence of the same offence.

The said Bank Guarantee (BG) shall have to be valid up till the end of the contract/Agreement period including extended time period till 100% completion of the work in all respects and shall be renewed within validity period accordingly if required. The said Bank Guarantee shall remain in custody of the DDO & Executive Engineer in-charge of the work, which shall be returned to the bidder/contractor after successful completion of the work as per contract. If the bidder fails to complete the work successfully, this Additional Performance Security shall be forfeited at any time during the pendency of the contract period after serving proper notice to the contractor/bidder agency. Necessary provisions regarding deduction of security deposit from progressive bills of the contractor in respect of the tendered work shall be governed as per relevant clauses of the tender contract/Agreement which will in no way be affected / altered due to this Additional Performance Security.

5A. Login by bidder:

- a. A bidder desirous of taking part in e-tender floated by the State Government shall login to the e-Procurement portal of the Government of West Bengal www.wbtenders.gov.in using his/her login ID and password by using their valid DSC.
- b. He/she will select the tender to bid and initiate payment of pre-defined EMD fixed for that tender by selecting from either of the following payments modes:
 - i. Net-Banking (any of the banks listed in the ICICI Bank Payment Gateway) in case of payment through ICICI Bank Payment Gateway;
 - ii. RTGS/NEFT in case of off-line payment through bidder's bank accounts in any Bank approved by RBI in India.

5B. EMD payment procedure:

- a. Payment by Net Banking out of any listed bank through ICICI Bank Payment Gateway:
 - i. On selection of Net Banking as the payment mode, the bidder will be directed to ICICI Bank Payment Gateway (along with a string containing a Unique ID) where he/she will select the Bank through which he/she wants to electronically transact the EMD.
 - ii. Bidder will make the payment after entering his Unique ID and password of the bank to process the e-transaction.
 - iii. Bidder will receive a confirmation message on registered mobile phone regarding success/failure of the transaction.
 - iv. If the transaction is successful, the amount paid by the bidder will get credited in the respective Pooling account of the State Government maintained with the Focal Point Branch of ICICI Bank at R.N Mukherjee Road, Kolkata for collection of EMD against unique codes for identification of the tendering authority.
 - v. If the transaction is failure, the bidder will again try for payment by going back to the first step.
- b. Payment through RTGS/NEFT:
 - i. On selection of RTGS/NEFT as the payment mode, the e-procurement portal will show a pre-filled challan having the details to process RTGS/NEFT transaction.
 - ii. The bidder will print the challan and use the pre-filled information to make RTGS/NEFT payment using his/her own designated Bank account.
 - iii. Once payment is made, the bank would provide an "UTR remittance number" for successful transaction with which the bidder will come back to the e-Procurement portal after expiry of 2 to 3 bank working days to enable the NEFT/RTGS process to complete, in order to verify the payment made and continue with his/her bidding process.
 - iv. If verification is successful, the fund get credited to the respective Pooling account of the State Government maintained with the Focal Point Branch of ICICI Bank at R.N Mukherjee Road, Kolkata for collection of EMD.
 - v. Hereafter, the bidder will go to e-Procurement portal for final submission of his/her e-bid within pre-assigned last date of submission of e-tender.
 - vi. If the payment verification is unsuccessful, the amount will be returned automatically by the system to the bidder's bank account.

Note: EMD made through RTGS/NEFT would require additional 2 to 3 bank working days after date of transaction in the bank before the procedure is completed for enabling the bidder to continue with the bidding process in the on-line final bid submission. Thus, the bidder is to take precaution in case of RTGS/NEFT transfers, so that the entire process of submission of e-tender is completed within last date of on-line submission of his/her tender. However, Net-banking transaction through ICICI bank payment Gateway would be on real time basis.

5C. Refund/Settlement Process for EMD:

- i. After decrypting/admitting of all e-bids, the preliminary technical bid evaluation (TBO) summary sheet would be published in the Portal after two working days, and thereafter at least after four working days, the Final technical evaluation (TBE) summary sheet would be published in the Portal with simultaneous electronic processing in the e-Procurement portal by the tender inviting authority done so that status of the all bids as qualified or disqualified; based on the Final Bid Evaluation Sheet (FBE) is made available to all bidders along with the details of the unsuccessful bidders to ICICI Bank by the e-Procurement portal through web services.
- ii. On receipt of the information from the e-Procurement portal, the Bank will refund through an automated process the EMD of the bidders disqualified at the technical evaluation to the respective bidders' bank accounts from which they made the EMD on-line transaction. Such refund will take place within T+2 Bank working days where T will mean the date on which information on rejection of bid is uploaded to the e-Procurement portal by the Tender Inviting Authority.
- iii. Once the financial bid evaluation is electronically processed in the e-Procurement portal, EMD of the technically qualified bidders other than that of the L1 will be refunded, through an automated e-process, to the respective bidders' bank accounts from which they made the payment transaction. Such refund will take place within T+2 Bank working days where T will mean the date on which information on rejection of financial bid is uploaded to the e-Procurement portal by the tender inviting authority.
- iv. As soon as the L1 bidder is awarded the contract (AOC), the same is processed electronically in the e-Procurement portal for transfer to Government Receipt under Public Accounts of the State through GRIPS where under the security deposit will also be collected in connection with the work.
- v. All refunds will be made mandatorily to the Bank account from which the payment of EMD was initiated.
- vi. If the e-tender is cancelled, then the EMD would be reverted to the original bidder's bank account automatically after such cancellation order is processed online by the Tender Inviting Authority.
- vii. TIA reserves the right to forfeit the EMD electronically in case of breach/violation of tender rules as defined under clause 9 & 10.

6. Credential Certificate (CC) as Prequalification Work Credential:

- i. Credential Certificates (CC) for one/single 100% completed work within last five financial years on the date of publication of NIT will only be accepted as valid PQ credential of work. Incomplete ongoing work shall not be considered for valid PQ Credential. Credential Certificate without containing mandatory details shall not be treated as valid CC.
- ii. It is desirable that CC should preferably contain the name with designation, postal address of office, contact Telephone No./FAX / e-mail ID of the authority issuing the CC for the work along with name of work, amount put to tender, date of completion of the work, gross final billed value of the 100% completed work, certificate of issuing authority indicating successful and satisfactory completion. Illegible certificates, incomplete contact details making it time consuming for verification purposes of CC issued by authorities outside the State are liable to be rejected by the Departmental Technical & Tender Committee (DTTC).
- iii. Credential Certificates (CC) of successfully completed works in any Department/autonomous authority of the Government of West Bengal will be considered. CC of 100% completed works executed under any other State / Central Government Ministry / Department / Nationalised Financial Institutions Organisation / Govt. Undertaking / Govt. Enterprises or Government Institutions or Local Government Bodies (Municipalities, Zilla Parishad & Panchayat Samities within West Bengal, will also be considered as valid PQ Credential. Such CC are to be issued by an officer/authority not below the rank of Executive Engineer / Divisional Engineer / District Engineer/Project Manager of the State/Union Government Departments/ Organisations; authorised signatories of CC for Panchayat Samities and Municipalities shall be the BDO & Executive Officers or equivalent administrative officers respectively. It is desirable to have telephone and FAX or e-mail addresses of the signatory of the CC for all offices outside West Bengal for verification purposes.

7. Pre Qualification (PQ) eligibility criteria

Prequalification (PQ) eligibility of a contractor/ bidder based on one single 100% completed works contract and financial capacity achieved within the zone of last five financial years will be determined as per Rules stated below:

- 7 I (a). Firstly, the gross value of the work submitted as PQ Credential as per CC of similar in nature completed during the current financial year before date of publishing of e-NIT or within the preceding five FY will be multiplied by the following factors to take care of the inflationary effects to arrive at the gross notional amount.

Year	Description	Multiplying factor to arrive at gross notional amount
Current	The financial year of floating of e-NIT	1.00
1 st	1 year preceding the current financial year	1.08
2 nd	2 years preceding the current financial year	1.16
3 rd	3 years preceding the current financial year	1.26

4 th	4 years preceding the current financial year	1.36
5 th	5 years preceding the current financial year	1.47

Note: For cases where two contractors/bidders are participating in a e-Tender for a particular work are such that one happens to have worked as a sub-contractor of the other, and both the contractors/bidders submit PQ work credential of having completed the same job either wholly or partly, then in such case the PQ credential of the principal contractor will be considered while that of the sub-contractor will not be taken into consideration for determining the eligibility criteria of the contractor/bidder during technical evaluation of the tender. If the PQ Credentials submitted by hitherto contractors/bidders are for different works, then both the PQ Credentials will be considered for determining the eligibility criteria of the individual contractors/bidders.

7 I (b). Gross notional amount calculated from the Credential Certificate (CC) uploaded as the PQ Credential of a single similar work stated in 7(I) (a) above and completed within immediate five preceding financial years on the date of e-NIT, **should be at least 25% of the amount put to tender i.e Tender Value.** However, for Consortium/JV where CC of individual entities of the Consortium/JV are to be considered, sum of gross notional value of work in respect of the CC of individual entities for works of similar in nature (one for each entity), aggregate should be at least **50%** of the amount put to tender for which the tender is invited.

7 II Guidelines for ascertaining works of similar in nature

7 II. Following major items/conglomeration of items having weight age of 25% or more in terms of monetary values in respect of amount put to tender for a work are to be identified and the monetary value of each of the major item is to be calculated by the Tender Inviting Authority for any particular serial of work listed in the e-NIT by summing up the associated items of the BOQ coming up under any of the major items as described below:

Concrete (PCC / RCC / PSC / cementitious Grouting) executed in any dam/ barrage/hydraulic structure as the specified major items.

7 III. Monetary values of each of the ‘major items’ or ‘conglomeration of items forming a major item’ contained in the ‘BOQ’ of this e-tender is to be multiplied by a factor 0.35 to arrive at the minimum required Technical PQ Credential in terms of execution of similar items and clearly stated in absolute terms as amount in rupees in column 8 of ‘List of Works’.

7 IV. If value of summation of those items contained in the BOQ of the AOC submitted by the bidder as its PQ Work Credential matches with at least one of the major items or conglomeration of items stated in the minimum PQ Credential at column 8 of the ‘List of Works’ in the e-tender and is equal to or exceeds the amount of any one of the PQ financial eligibility criteria specified at column 8, bidders PQ Credential may be considered as similar in work subject to fulfilment of the following conditions:

- a. After summation, the value may further be multiplied by the factors stated in the table under clause 7 (I) to take care of the inflationary factors.
- b. Whenever PQ Credential of individual entities of a Consortium/Joint Venture is considered, multiplying factor of 0.35 stated in Clause 7 III should be considered as **0.70** of combined values of the BOQ.

Note:-

- i. If the items of work contained in the tender are such that even after combination and addition of those into categories of major items defined as illustrated in clause 7 II, the aggregate amount being less than 25% of the amount put to tender, the Tender Accepting Authority shall decide on appropriate major items, one or two among the list of predominant items in the tender BOQ and direct the Tender Inviting Authority to fix the financial PQ eligibility requirement (monetary value of such items) accordingly in column No. 8 of the list of works of the tender for determination similar nature.
- ii. Eligibility for similar nature of work will be judged on the basis of items of works in the BOQ/SoR of the that particular serial of work in the e-tender, mentioned in absolute terms in rupees, and the corresponding Major items with that of the AOC with BOQ uploaded by the bidder as PQ work Credential in support of the CC.

7 V. Eligibility criteria based on average annual financial turnover of the bidder:

- a. Apart from satisfying eligibility criteria based on PQ Credential stated in Clause 7 I to IV, the Annual financial Turnover requirements stated below must also be satisfied to declare a bidder qualified for a particular work in financial bid stage.
- b. **Average of Annual turnover from business of any three FY with the zone of immediate preceding five FY as stated in clause 4.2 B(IV) should be at least 50% of the amount put to tender of work in which the bidder intends to participate.** However, for Consortium/JV, such Average Annual Turnover should be at least 100% of the amount of tender in which the Consortium /JV intends to participate and each entity should have 10% of required Average Annual Turn Over for three preceding financial years. Documents sought under Technical & OID cover folders

- are mandatory for all the entities of the Consortium/JV.
- c. **'Net financial worth' of the bidder should be positive in the three financial years for which the Annual turn over documents referred under 7Vb. have been uploaded, for qualifying in technical bid. It would inter alia mean that the total assets of a financial year minus Gross total liabilities as per Audited Balance Sheet should be of positive value.**
8. **Additional eligibility criteria for participating in more than one serial of work in a e-NIT**
Since there is only one work in the instant e-NIT, this clause would have no relevance here.
9. **Penalty for suppression / distortion of facts and withdrawal of L1 bidder before acceptance of LOI**
If a contractor/bidder fails to physically produce the originals of documents (especially the Credential Certificates and P/L accounts with audited balance sheets), or any other bid document on demand by the Departmental Technical & Tender Committee (DTTC) which were submitted as soft copies in PDF files with their e-bids within a specified time frame, need arising due to any material deviations detected in the uploaded soft copies, leading to specific doubts which could not be cleared by enquiry from issuing authority of these documents or if there is any suppression/distortion/falsification noticed/detected/ pointed out at any stage of the e-tender process at any stage prior to signing of Contract-Agreement or the issue of LOA or AOC, the Tender Inviting Authority will immediately bring the matter to the notice of the concerned Chief Engineer and appropriate penal measures as stated in Clause 10 below will be taken. The concerned Chief Engineer then will issue the necessary order in writing with intimation to the defaulting contractor/bidder, other Chief Engineers, Centralized e-Tender Cell and also the Government in the Irrigation & Waterways Department. Copy of the order/starting penal measures should invariably be communicated to the Nodal Officer, e-Governance Cell of the Department with a request for uploading the order in the Departmental website in the link "List of suspended/debarred contractors".
10. **PROCEDURE FOR SUSPENSION AND DEBARMENT OF SUPPLIERS/ CONTRACTORS**
- A. **SCOPE:**
The procedures laid down in subsequent paragraphs shall govern the suspension and debarment of suppliers, contractors and bidders ("Contractors" for brevity) involved in Government procurement for offenses or violations committed during competitive bidding and contract implementation, or even later for the works under Irrigation & Waterways Department, Government of West Bengal. The concerned Chief Engineer shall publish the suspension and debarment order in the Departmental website in the designated link with the prior approval of the Department within 1 (one) working day of issuance of such order. The TIA shall recommend the case to DTTC who with opinion of Chief Engineer will place it before DTC/QBEC/DTTC for approval.
- B. **PROHIBITION ON SUSPENDED / DEBARRED PERSONS / ENTITIES TO PARTICIPATE IN THE BIDDING OF GOVERNMENT PROJECTS / CONTRACTS OF THE DEPARTMENT**
A person / entity that is suspended / debarred by a procuring entity shall not be allowed to participate in any procurement process under Irrigation & Waterways Department during the period of suspension / debarment unless the same has been revoked by the competent authority.
A Joint Venture or Consortium which is suspended / debarred or which has suspended / debarred member/s and/or partner/s as well as a person/entity who is a member of suspended / debarred Joint Venture or Consortium shall, likewise, not be allowed to participate in any procurement process under Irrigation & Waterways Department during the period of suspension / debarment unless the same has been revoked.
- C. **DEFINITION OF TERMS:-**
- i. **Bidder:** A person/Contractor/Agency/Joint Venture/Consortium/Corporation participating in the procurement process and/or a Person/Contractor/Agency/Joint Venture/Consortium/ Corporation having an Agreement/ Contract for any procurement with the Department shall be referred as bidder.
- ii. **Departmental Technical & Tender Committee (DTTC in short):**
A separate Departmental Technical & Tender Committee (DTTC)" has been constituted by the I & W. Department for the purpose of evaluation of proposals, composition of which has been detailed in Clause 14.2.
- iii. **Consolidated Debarment List:** A list prepared by the Departmental Debarment Committee/Chief Engineer containing the list of bidders debarred by the Irrigation & Waterways Department, Government of West Bengal. The list would be displayed prominently in the designated link in website of the Department clearly stating the period of suspension/debarment.
- iv. **Contract implementation:** A process of undertaking a project in accordance with the contract /Agreement documents.
- v. **Debarment:** An administrative penalty, in addition to the contract/Agreement provisions, disqualifying a bidder from participating in any procurement process under Irrigation & Waterways Department, Government of West Bengal for a given period.

- vi. **Debarred Bidder:** A Bidder who was disqualified by the competent authority of the Irrigation & Waterways Department, Government of West Bengal.
- vii. **Department:** Irrigation & Waterways Department, Government of West Bengal
- viii. **Entity:** A person/Contractor/Agency/Joint Venture/Consortium/Corporation participating in the procurement process and/or a Person/Contractor/Agency/Joint Venture/Consortium/Corporation having an agreement/ contract for any procurement with the Department shall be referred as entity.
- ix. **Offence:** A violation or breach of the Constitution of India, laws, regulations, laid down procedure, etc under Prevention of Corruption Act, 1988, Code of Criminal Procedure, 1973 u/s 195(1) and Section 197(1), Competition Act, 2007 and IT Act, 2000 as amended.
- x. **Procurement:** It is the act of buying goods, services or works from an external source. It is favourable the goods, services or works are appropriate and that they are procured at the best possible cost to meet the needs of the acquirer in terms of quality and quantity, time and location.
- xi. **Procuring Entity/Authority:** The officer authorised by the Irrigation & Waterways Department, Government of West Bengal for procurement.
- xii. **Suspension:** Temporary disqualification of a bidder from participating in the procurement process of Irrigation & Waterways Department for a period of 6 (six) months when an offence is made against a bidder.

D GROUNDS FOR SUSPENSION AND DEBARMENT

- i. Submission of eligibility requirements containing false information or falsified documents.
- ii. Submission of Bids that contain false information or falsified documents, or the concealment of such information in the Bids in order to influence the outcome of eligibility screening or any other stage of the bidding process.
- iii. Unauthorised use of one's name/digital signature certified for purpose of bidding process.
- iv. Any documented unsolicited attempt by a bidder to unduly influence the outcome of the bidding in his favour.
- v. All other acts that tend to defeat the purpose of the competitive bidding such as lodging false complaints about any bidder, posting baseless allegation about any officer duly authorised by the Department, restraining any interested bidder to participate in the bidding process etc.
- vi. Refusal to accept an award after issuance of 'Letter of Acceptance' or enter into contract with the Government without justifiable cause.
- vii. Refusal or failure to post the required performance security/earnest money within the prescribed time without justifiable cause.
- viii. Subcontracting of the contract or any part thereof without prior written approval of the procuring entity.
- ix. Failure solely due to fault or negligence of the Contractor, to mobilize and start work within the specified period as mentioned in the 'Letter of Acceptance' / 'Letter of Acceptance cum work Order' / 'Work Order' / 'Notice of Process' / 'Award of Contract' etc. ultimately resulting in rescindment of contract.
- x. Failure to fully and faithfully comply with the contractual obligations without valid cause, or failure to comply with any written lawful instruction of the procuring entity or his representative(s) pursuant to the implementation of the contract, ultimately resulting in rescindment of contract.
- xi. For the procurement of goods, unsatisfactory progress in the delivery of the goods by the manufacturer, supplier or distributor arising from his fault or negligence and / or unsatisfactory or inferior quality of goods, vis a vis as laid down in the contract.
- xii. Refusal or failure to upload a self-declaration in specimen format of Form-4 to the effect of any previous debarment imposed by I&WD, any other Department of State Government and or Central Government.
- xiii. Wilful or deliberate abandonment or non-performance in a project or contract by the contractor / suppliers resulting to substantial breach thereof without lawful and / or just cause(s).
- xiv. Non-submission of authentic Bank Guarantee of required amount by the selected bidder in a tender for Procurement of Goods & Works, if the bid price is below 20% of the tender value within the period as prescribed in the e-NIT, 7 working days from date of issue of LOA which may be extended upto maximum 14 working days.

E. CATEGORY OF OFFENSE:

- a. First degree of offense: Clause 10 D (i) up to (vii), (xii) & (xiv) is to be considered as first degree of offense.
- b. Any of the offence under Clause (viii) to (xi) & (xiii) shall lead to termination of contract and its determinations in accordance with Clause (ii) & Clause (iii) of Agreement Form No. WB-2911 and simultaneous debarment for a period of 2 years
- c. Second degree of offense: Any one of the offenses as mentioned under Clause 10D (i) to (xiv), committed by a

particular bidder/contractor/supplier on more than one occasion would be considered as second degree of offense. Period of debarment will be 2 times the corresponding period penalty applicable for 1st degree offence in addition to other penal provisions contained in 1st degree offence.

F. Debarment procedure and rules with guiding principles are published as Departmental Notification to be read in conjunction with corrigenda issued thereto from time to time available in the Notification link of Departmental website wbiwd.gov.in.

G. PENALTY FOR OFFENSE:

- a. For committing 1st degree offense any of the cases referred under Clause 10 D (i) to (v), forfeiture of earnest money and debarment for a period of six months, if the offense is detected during technical evaluation. If the offence is detected after award of the contract and if the offender happens to be the agency selected for work, and such selection is made due to oversight, forthwith termination of the contract and determination of contract value in accordance with clause 3(ix) (c) of West Bengal Form No. 2911(i)/(ii), and simultaneous debarment for a period of six months. Further, in case the offense is detected after completion of work and payment of final bill the Work credential earned would be declared as 'null and void', so that the same cannot be used in future as PQ credential for securing other works contracts in the Irrigation & Waterways Department, together with debarment for a period of six months.
- b. For committing 1st degree offense in any of the cases referred under Clause 10D (vi), (vii),(xiii) to (xv), forfeiture of earnest money and debarment for a period of one year. For committing offenses under Clause 10D (xv), debarment period shall be for one calendar year preferably from the date on which the due date for submission of BG had expired (i.e 8th/15th working day from date of receipt of LOA /LOI) by the Departmental Debarment Committee to be notified in the Departmental website.
- c. For committing 1st degree offense in any of the other cases under Clause 10 D (viii) to (xii), termination of contract and its determination in accordance with Clauses 2 & 3 of West Bengal Form No. 2911(i)/(ii), including debarment for a period of two years.
- d. For committing 2nd degree offenses under above all categories, period of debarment will be twice the corresponding period for 1st degree offenses, in addition to other penal provisions for 1st degree offense.

11. Taxes & duties to be borne by the Contractor/bidder

All taxes, duties & cess which may not be limited to income tax, GST, royalty, construction welfare cess & labour insurances, EPF etc are to be borne by the contractor. Rates of items contained in the tender BoQ are inclusive of all the taxes, duties & cess stated above which are enforced on the date of publication of this e-NIT. It is reiterated that there shall not be any change of bid price in the contract. In case of variation of rates of taxes, duties, cess etc during construction period, no extra claim on these accounts shall be allowed. The bidders are required to bid (i.e below/Above/At-par BoQ as the bidder decides.

12. Site inspection prior to submission of tender

Before submitting a bid, the intending contractor/bidder should make themselves acquainted thoroughly with the local conditions prevailing at site of implementation of the work by undertaking field inspections and taking into consideration all probable likely factors and difficulties to be involved during execution of the work as per specification in all respects including transportation of materials, communication facilities, climate conditions, nature of soil, availability of local labourers and market rates prevailing in the locality etc. and no claim whatsoever will be entertained on those accounts afterwards. In this connection intending contractors/bidders are advised to attend the 'Pre-Bid' meeting with the Tender Inviting Authority on the prefixed date to get his/her doubts cleared if he/she desires. He/She may also contact the office of the designated Executive Engineer, concern Division in between 11.30 hours to 16.30 hours on any working day, prior to the date of actual submission of e-bid in the e-tender.

13. Conditional and incomplete tender

Conditional and incomplete tenders are liable to be summary rejected. No off-line document will be entertained until completion of e-Tender process by way of acceptance of L1 bid by the competent Tender Accepting Authority/Government.

14. Opening and evaluation of tender

14.1 Opening of a Technical Proposal

- i. Technical proposal will be opened by the Tender Inviting Authority or his/her authorised representative/s electronically in the official website stated earlier, using their authorised valid Digital Signature Certificate/s (DSC).
- ii. Intending contractors/bidders may remain present if they so desire.
- iii. Technical cover documents (vide Clause 4.2.A) will be opened /decrypted first and if found in order, Cover (Folder) for OID (vide Clause 4.2.B) will be opened/decrypted. If there is any deficiency in either of the Technical

cover documents, the bidder may be summarily disqualified and rejected.

- iv. Decrypted (transformed into readable format) documents of the Pre-Qual Technical cover and the OID (Other Important Document) Cover will be decrypted/downloaded and handed over the decrypted bid documents in soft and hard copies to the designated Tender Evaluation Committee.
- v. Procedure to be followed for opening of a '*Financial bid*' is explained later under clause 14.5 of e-NIT

14.2 Departmental Technical & Tender Committee

A Departmental Technical & Tender Committee (DTTC) constituted by the I & W. Department for the works relating to Durgapur Barrage and comprising of (a) Chief Engineer(West) as Chairman, (b) Chief Engineer (South) as Member, (c) Superintending Engineer, Damodar Irrigation Circle as Member, (d) Superintending Engineer, Mechanical & Electrical Circle as Member, (e) Director of Designs, Central Design Office as Member and (f) Executive Engineer, Damodar Headworks Division as Member Convenor, will inter alia, evaluate the technical and financial proposals of the instant work.

14.3 Uploading of list of technically qualified contractors / bidders in the web portal/s

- i. After electronically decrypting on the designated date and time the e-bids received, all the bids will be admitted for downloading of documents without verification by the TIA and placed before the DTTC for evaluation. The bidders shall receive an automated message through e-mail/text message that their bids have been decrypted. The DTTC shall within a minimum of 2(Two) working day scrutinise the bids and Technical Bid opening Summary sheet (TBO) shall be uploaded by TIA pursuant to preliminary scrutiny and decision of the Departmental Technical & Tender Committee (DTTC) with reasons for preliminary rejection, and preliminary list of eligible bidders/ contractors for a particular serial of work whose Technical proposal have been considered for uploading in the web portal/s by the DTTC.
- ii. While evaluating, the DTTC may, if they so desire, summon the contractors/bidders and seek further clarification/information or seek verifications of original hard copy of any of/all the documents already submitted on-line, and if these cannot be produced within stipulated timeframe, their bids will be liable for rejection.

14.4 Process of Technical Evaluation during tender

Within 24 hours of uploading the TBO summary sheet containing Preliminary Technical Qualification result, any of the aggrieved bidder, may seek clarification / redressal / review from the DTTC on the list of bidders, in writing/through e-mail with supporting facts / figures / documents. If such clarification /review relates to eligibility of other bidders, on the grounds of submission of false/ forged / manipulated / inappropriate credentials, modalities prescribed in the Departmental Notification shall be followed. In case, the review only seeks the eligibility of the applicant himself, views of the Departmental Technical & Tender Committee (DTTC) would be communicated in writing to that bidder within next two (2) working days. If the bidder is not satisfied with the clarification of the TEC, he/she may appeal to the concerned Chief Engineer within 24 hours of receipt of communication from the TEC. The concerned Chief Engineer will dispose such complaints jointly, in associated with at least another available Chief Engineer within next 2 working days. Thereafter final Technical Evaluation Sheet (TBE) of the technically qualified bidders would be uploaded, after incorporating modifications if required. The TIA shall while uploading the final TBE summary sheet accept or reject electronically the admitted bids based on the advice of DTTC as per TBE summary sheet. Thus at this stage the rejected bidders will get back their EMD. e-mail communication in official e-mail address of TIA or TAA shall be treated as a valid mode of communication. The minimum time period from date of TBO summary sheet uploading and TBE summary sheet uploading shall be 4 working days or more. However, this time period may be curtailed if no clarification/review by any of the bidders within 24 hours of uploading the TBO sheet.

14.5 Opening and Evaluation of Financial Proposal/bid

- i. Financial proposals of the bidders/contractors declared technically qualified by the Departmental Technical & Tender Committee (DTTC) will be opened electronically by the Tender Inviting Authority in the web portal stated above on the pre-notified date and time.
- ii. The encrypted copies will be decrypted and the rates will be read out to the contractors/ bidders remaining present at that time, else they may login their respective e-tender accounts to see the (CS) comparative statement in the web portal.
- iii. After opening the financial proposal, the preliminary summary result containing inter-alia the names of contractors/bidders and the rates quoted by them will be uploaded and the result will be made available in the e-tender web platform.
- iv. If the Tender Accepting Authority (TAA) is satisfied that the rate obtained is fair and reasonable and there is no scope of further lowering down of rate, he/she may after having the comparative statement test checked by the Divisional Accountant / Divisional Accounts Officer attached to the office of the concerned Executive Engineer and after their acceptance by the Tender Acceptance Authority (TAA) instruct the Tender Inviting Authority to upload the financial bid evaluation summary as result containing the name of contractors/bidders and the rates quoted by them against each work.

- v. If there is any scope for lowering down of rate in the opinion of the Tender Accepting Authority being abnormally high, i. e above 10% of the amount put to tender (Tender value), the e-NIT shall be cancelled and invited afresh 2nd or 3rd re-tender. **No post tender negotiations are permitted.**
- vi. If there is no contractor/bidder or the number of contractors / bidders in the 1st tender is less than three, the e-tender has to be cancelled. In case of participation of more than three bidders, if the number of technically qualified bidder falls below three, the tender/e-NIT is to be cancelled as well and fresh e-tender vis-a-vis 2nd call e-Tender or even 3rd call e-Tender may be invited by suitably lowering of minimum eligibility PQ criteria (work & financial) for bidders with wide publicity of Re-tender notices through electronic and print media.
- vii. Final result after acceptance of the rate by the Tender Accepting Authority, if within the delegated power of acceptance would have to be uploaded in the e-Procurement platform. Otherwise, the matter may be referred to the Government Appointed DTTC and the appropriate Government for decision.
- viii. The Tender Accepting Authority may ask the L1 bidder/contractor to submit analysis of rates to justify the rate quoted by that bidder after declaration of financial bid evaluation result.
- ix. If the lowest (L1) bidder/contractor backs out there should be Re-tendering in a transparent and fair manner. In such a situation the TIA may call for re-tender with bid submission time period should normally be 21 days for value above Rs. 100.00 lakh, and 14 days for value exceeding Rs. 10.00 lakh but upto Rs. 100.00 lakh.

14.6 Procedure to be followed for final acceptance of tender & Award of Contract

- i. The lowest (L1) financial bid for all works tenders is accepted as a rule. If for any reason the lowest (L1) bid is not accepted, reference is to be made to the appropriate Government for orders as to which of the contractor /bidder the work should be awarded.
- ii. Maximum 5 % excess beyond the 'Tender Value' (Amount put to Tender) may be accepted as per delegated power to the Superintending Engineer up to Rs 2.00 crore, and at least three valid bids have been received in the financial bid stage, provided tender value after abatement is within the administratively approved cost. Maximum 5 % excess beyond the 'Tender Value' (Amount put to Tender) may be accepted above tenders of value beyond Rs2.00 crore with the recommendation of DTTC by the Chief Engineer if at least three valid bids have been received in the financial bid stage. In case of 5% excess over administratively approved amount, proposal for revised administrative approval would have to be submitted to the Government, but acceptance of tender and issue of work order may not be kept pending for want of revised administrative approval.
- iii. Above 5% and up to 10% of the Tender Value can be recommended to the Government for acceptance by the Departmental Technical & Tender Committee (DTTC) subject to the conditions that valid technically qualified bids should not be less than three and L1 bid is accepted and tendered amount is within the administratively approved cost. In case of excess over administratively approved amount, revised administrative approval would have to submitted to the Government but acceptance of tender, and issue of work order may not be kept pending for want of Revised Administrative Approval/ Revised Financial sanction.
- iv. If the response to an e-Tender is less than three, then Tender should be invited afresh. Such Re-Tender notice shall be published in widely circulated dailies as per guidelines and also through e-Tender web portals. Prior to invitation of Re-Tender / fresh e-Tender, the eligibility criteria and other terms & conditions as contained in the first 'Notice Inviting e-Tender' (e-NIT) shall have to be reviewed/relaxed by the Tender Inviting Authority, to ascertain whether (i) it was too much restrictive, say, specifications and qualifications were fixed at higher standards than required, (ii) advertisements in the widely circulated Newspapers were properly published and (iii) other related procedural matters were observed in its entirety.
- v. If the number of valid bids received even in re-tender is less than three, it should be referred by the TIA to the DTTC and the appropriate Government along with the recommendation of the DTTC for decision, in accordance with Finance Department Memorandum and other relevant orders in vogue at the time of publication of the tender.
- vi. For acceptance of L1 bid after 2nd / 3rd re-tenders is still above 10% of the Tender Value (Amount put to tender), upon specific recommendation of the DTTC as mentioned at clause 14.5 (v), with that of the Department shall have to be sent to the Finance Department for decision.

15. General guidelines for acceptance of e-Tender

Lowest valid rate should normally be accepted in accordance with the procedure laid down in clause 14.6. The Tender Accepting Authority reserves the right to distribute the work amongst more than one contractor/bidder with same L1 rate or even cancel the tender and invite fresh re-tender.

16. Tender Accepting Authority*

As per delegation of power for tender acceptance, competent accepting authorities for different values of tenders is stated below, provided at least three valid bids are received in the financial bidding stage of the tender/Re-tender:

- i. For tenders up to Rs 200.00 lakh plus 5%*: *Superintending Engineer of the Circle, Irrigation & Waterways Directorate*

- ii. For tenders above Rs 200.00 lakh*: *Concerned Chief Engineer, I&W Directorate. Lowest bid for tenders of value above Rs. 200.00 lakh obtained is above the estimated cost put to tender, approval of DTTC before acceptance of tender by Chief Engineer is required even if three valid bids have been received.*

* Procedure to be followed in terms of Finance Department Notifications on delegation of powers for acceptance applicable at the time of bid acceptance.

17. Signing of formal tender contract/agreement after acceptance of e-tender

The contractor/bidder, whose bid is approved for acceptance, shall within 15 days of the receipt of Letter of Invitation (LOI) or Letter of Acceptance (LOA) in his / her favour, will have to execute a 'Formal Agreement' with the Engineer-in-Charge in quadruplicate in W.B.F. 2911(i)/2911(ii) and all other contract documents, entire set of which may be obtained free of cost from the office of the designated Executive Engineer, concern Division in-charge of the work tendered.

If the selected L1 bidder fails to turn up even after 30 days after the initial 15 days from the date of uploading of the AOC in the e-Procurement portal or the despatch date of official communication for signing of the Contract/Agreement, the selected bidder is liable for penal actions which shall comprise blacklisting, debarring from future participation in Government tenders, immediate forfeiture of the Earnest Money deposited in the tender, other penal actions as stipulated under clause 9 & 10 of the e-NIT, the Departmental Notification and also contained in contract W.B Form No. 2911(i)/ 2911(ii)/ Agreement.

18. Payment against bills raised by the contractor

Periodic Tax invoice/bills containing bidders GSTIN & other details needs to be submitted by the supplier/contractor to the DDO for raising claims for receiving payments of work executed under this contract /upon achieving physical Milestones clearly showing separately the Tax charged in accordance with the provisions of the GST Act, 2017.

The payment of Running Account as well as final bill for any work based on progress and performance will be made according to availability of fund and no claim due to delay in payment will be entertained.

19. No cost escalation in any form is included in the Tender Contract Agreement.

20. Bid validity

The Bid will be normally valid for **120 days** from the date of opening of the financial proposal. However, extension of bid validity may be suitably considered by the Tender Inviting Authority, if required, subject to written confirmation of the contractor/bidder (s) to that effect.

21. Definition of Physical Milestones:

The time allowed for carrying out the work as entered in the tender shall be strictly observed by the contractor, and which shall be reckoned from the date on which the order to commence work is given to the contractor. The work shall throughout the stipulated period of the contract be proceeded with all due diligence. Time being deemed to be the essence of contract on the part of the contractor; the contractor shall be bound in all cases, to achieve the 'Milestones' as specified in this NIT into various 'Identifiable and quantifiable construction related stages' pertaining to the work. For all works the contractor within 15 days of receipt of Letter of Acceptance shall submit a work programme commensurate with period of construction in the form of a Bar Chart of uploaded work programme, stating the timeline of such different Milestones. In the event of the contractor failing to comply with any of the conditions related to achieving the 'Milestones' within the specified time period prescribed for such 'Milestone' plus one month, he/she shall be liable to pay compensation.

If the contractor fails to commence and/or maintain required progress over the total time allotted for its full completion and fails to complete the work and clear the site on or before the end of contract period or extended date of completion, he/she shall, without prejudice to any other rights or remedy available under the law on account of such breach, pay as agreed compensation to the implementing Department. This will also apply to items or group of items for which a separate period of completion has been specified. The bidder is required to digitally sign and upload the work programme in the form of Bar Chart or otherwise in the '**Declaration**' folder during bid submission for all works tenders.

22. Withdrawal of bid in a Tender

Withdrawal of e-Tender once the bid has been submitted online and after passing of end date for submission and has been accepted for further processing, is not allowed. EMD will be forfeited by the Government and the L1 bidder/contractor penalised in terms of clause 9 referred earlier would be applicable.

23. Mobilization Advance

Mobilization Advance would be allowed in deserving cases maximum up to 10% of the tendered amount subject to recovery of the same along with 10% simple interest in maximum 5 instalments commencing from the RA bill.

24. Critical dates of this e-Tender

Sl. No	Activity	Date & Time	Remarks
1.	e-tender Publishing Date in Newspaper	04.08.2018 at 10.30 Hrs.	To be made available with the e-NIT in the website
2.	Document Download start date	04.08.2018 at 10.30 Hrs.	
3.	Pre-bid Meeting to be held at the office of Tender Inviting Authority	09.08.2018 at 14.30 Hrs.	
4.	Bid submission start date	10.08.2018 at 10.30 Hrs.	
5.	Document Download end date & bid submission end date	27.08.2018 at 17.00 Hrs.	
6.	Bid submission end date	27.08.2018 at 17.00 Hrs.	
7.	Technical Bid opening date	28.08.2018 at 17.30 Hrs.	
8.	Technical Bid opening Summary sheet (TBO) containing Preliminary Technical Bid Evaluation Summary uploading date	On or before 05.09.2018 at 17.30 Hrs.	
9.	Uploading of final summery sheet of Technically qualified bidders or Technical Bid Evaluation Sheet (TBE)	To be decided by the TIA with clear 4 working days for disposal of complaints and obtaining decision of appellate authority.	
10.	Financial Bid opening date	To be suitably decided by TIA	To be notified to concerned bidder/s through e-mail & SMS through auto-generation in the system.
11.	Uploading of Financial Bid evaluation sheet (FBE)	-do-	
12.	Uploading of the Letter of Invitation / Acceptance (LOI/LAO)	-do-	
13.	Uploading of Award of Contract (AOC) (Work Order)	-do-	

*TIA: e-Tender Inviting Authority

*TAA: e-Tender Accepting Authority

Additional Terms & Conditions

1. The Executive Engineer of the concerned Division shall be the Engineer-in-Charge in respect of the works contract and all correspondence concerning rates, claims, change in specifications and/or design and similar important matters will be valid only if accepted/recommended by the Engineer-in-Charge. If any correspondence of above tender is made with Officers other than the Engineer-in-charge for speedy execution of works, the same will not be valid unless copies are sent to the Engineer-in-Charge and also approved by him/her. Instructions given by the Sub-Divisional Officer/Assistant Engineer and the Junior Engineer/Section Officer (SO) on behalf of the Engineer-in-Charge shall also be valid (who have been authorized to carry out the work on behalf of the Engineer-in-Charge) regarding specification, supervision, approval of materials and workmanship. In case of dispute relating to specifications and work, the decision of Engineer-in-Charge shall be final and binding. The Engineer-in-Charge will however take all decisions relating to works contract only after recommendation/ advice of the Tender Accepting Authority. If there is more than the Executive Engineer assigned for the tender, the Chief Engineer would designate the Engineer-in-Charge for the work. It is stated in this connection that in addition to adherence of specification of various item for works conforming to BIS / IS Code as also mentioned in the schedule of rates of I & W D / PWD, technical specification and methodology as detailed in para 28 and onwards here in below, shall be followed meticulously during execution of the work.
2. Acceptance of the tender including the right to distribute the work between two or amongst more than two bidders with same L1 rates will rest with the Tender Accepting Authority without assigning reason thereof to any of the bidders. The tender accepting authority reserves the right to reject any or all tenders without assigning sufficient justification thereof to the bidder/contractor. No additional or excess work or additional items of work beyond the tendered amount would be generally allowed. All excess, supplementary or substitute supplementary items of work, if unavoidable are to be accepted by the Tender Accepting Authority only if the total value of work on completion is within the tendered amount. The exiting contract would be terminated after achieving work up to tendered cost (gross value) and balance work would be taken up afresh after fresh sanction and new tender, except in the interest of public services, in rare & special cases under specific approval of the Government.
3. The Contractor/bidder shall have to comply with the provisions of (a) Contract Labour (Regulation & Abolition) Rules, 1970 including its revisions (b) Minimum Wages Act 1948 and the modification thereof or any other laws relating thereto as will be in force from time to time.
4. Engineer-in-Charge shall not entertain any claim whatsoever from the contractor for payment of compensation on account of idle labour on such grounds including non-possession of encumbrance free land. Escalation of cost due to inflationary effects or any other reason is not permitted during construction period or extended time period of contract.
5. Engineer-in-Charge shall not be held liable for any compensation due to machines & equipments becoming idle or any circumstances including untimely rains, other natural calamities, strikes etc.
6. All statutory taxes, viz. GST / labour welfare cess, labour insurance etc or revision of taxation rates even after AOC or commencement and before final completion of the work are to be borne by the contractor/bidder. Original tax invoice/challan or bill of those materials, which are procured by the bidder, may be asked to be submitted for verification if required.
7. Labour Welfare Cess @ 1% of the cost of construction works shall be deducted from the Gross value of all works bills. Also it is instructed to compulsorily register his/her establishment under the Act, under the competent registering authority, i.e. Assistant Labour Commissioner / Dy. Labour Commissioner of the region for disbursing PF and ESI benefits of workers. The bidder should be mandatorily be registered online with Employees Provident Fund Organisation (EPFO) in the on-line system and posses EPF code and all current documents. Penalties and complaints due to non compliance of on-line EPF registration and default is the full responsibility of the bidder even if the TIA is by default the Principal employer
8. No mobilization / secured advance will be allowed unless specified otherwise in the contract or the e-Notice Inviting Tender.
9. GST, Cess, License fees, Royalty for construction materials, forest product etc, Toll Tax, Income Tax, Ferry Charges and other Statutory Government Taxes as applicable during project implementation are to be paid by

- the contractor/bidder. The rates of supply and finished work items are inclusive of these taxes and levy. Tax invoice/bills needs to be submitted by the supplier/bidder for raising claims under the contract after attaining of physical milestones showing separately the tax charged in accordance with the provisions of GST Act, 2017.
10. All working tools & plants, scaffolding, construction of vats & platforms and arrangement of Labour Camps will have to be arranged by the contractor at his/her own cost. The contractor shall clear the site of work and restore all damages made due to the Labour camp, erection of yards and godowns, stores etc within 30 days of completion of work.
 11. The contractor shall supply mazdoors, bamboos, ropes, pegs, flags T&P, Machineries and equipments etc. for laying out the work and for taking and checking measurements for which no extra payment will be made.
 12. The contractor/bidder should see the site of works and tender documents, drawings etc. before submitting tender and satisfy himself/herself regarding the condition and nature of works and ascertain difficulties that might be encountered in executing the work, carrying materials to the site of work, availability of drinking water and other human requirements & security etc. Work on river banks may be interrupted due to a number of unforeseen reasons e.g. sudden rise in water levels, inundation during flood, inaccessibility of working site for carriage of materials. Engineer-in Charge may order the contractor to suspend work that may be subjected to damage by climate conditions. No claim will be entertained on this account. There may be variation in alignment, height of embankment or depth of cutting, location of revetment, structures etc. due to change of topography, river condition and local requirements etc. between the preparation and execution of the scheme for which the tendered rate and contract will not stand invalid. The contractor will not be entitled to any claim or extra rate on any of these accounts.
 13. A machine page numbered Site Order book (with triplicate copy) will have to be maintained at site by the contractor and the same has got to be issued from the Engineer-in-Charge before commencement of work. Instructions given by inspecting officers not below the rank of Assistant Engineer will be recorded in this book and the contractor must note down the action to be taken by him in this connection as quickly as possible.
 14. The contractor shall be bound to comply with all the Central & State Pollution Control Acts & Rules during entire construction period.
 15. All possible precautions should be taken for the safety of the people and work force deployed at worksite as per safety rule in force. Contractor will remain responsible for his labour in respect of his liabilities under the Workmen's Compensation Act etc. He must deal with such cases as promptly as possible. Proper road signs as per P.W.D. practice will have to be erected by the contractor at his own cost while operating public thoroughfares. Also, display boards containing brief description and name of project with completion target dates shall be erected at a prominent location at the work site by the contractor for public awareness.
 16. The contractor will have to maintain qualified technical employees and/or Apprentices at site as per prevailing Apprentice Act or as stipulated in the contract. No compensation for establishment charge will be entertained.
 17. The contractor will have to accept the work programme as per modifications and priority of work fixed by the Engineer-in-Charge so that most vulnerable reach and/or vulnerable stretch is completed before impending monsoon or rise in river flood water level or commencement of canal irrigation water release or for other suitable reasons.
 18. Quantities of different items of work mentioned in the departmental tender schedule/BOQ or in work order are only tentative. In actual work, these may vary considerably. Payment will be made on the basis of works actually completed in different items as per specifications and codes, and no additional claim will be entertained for reduction of quantities in some items or for omission of some items. For execution of any additional item or supplementary works within the tendered value with the total completion value remaining within the accepted tendered cost, approval of the Tender Accepting Authority/Government in the Irrigation & Waterways Department would be required.
 19. In order to cope with the present system of e-pradan billing, departmental supply of construction materials is discouraged. However, Departmental materials may be issued to the contractor/ bidder to the extent of requirements as assessed and following accounts procedure in the Treasury system of bill payment and in instalments as decided by the Engineer-in-Charge. Issue of materials may be of three categories.
 - a) Materials issued directly to the work and subject to recovery.
 - b) Materials issued from departmental go down and subject to recovery.
 - c) Materials issued free of cost.

Decision of the Engineer-in-Charge should be final and binding in this regard. He also stands solely responsible for reconciliation of accounts, if materials are issued to the contractor.

20. Any materials brought to site by the contractor subject to approval of the Engineer-in-Charge. The rejected

materials must be removed by the contractor from the site at his own cost within 48 hours of issue of the order to that effect. The rates in the schedule are inclusive of cost and carriage of all materials to worksite. The materials will have to be supplied in phase with due intimation to the Sub-Divisional Officer/Assistant Engineer concerned in conformity with the progress of the work. For special type of materials, i.e. Geo Synthetic Bags, HDPE Bags, Geo Textile Filter, Geo jute Filter etc. if any, relevant Data Sheet containing the name of the Manufacturers, Test Report etc. will also be submitted in each occasion. Engineer-in-Charge may conduct independent test on the samples drawn randomly before according approval for using the materials at site. In this regard decision of Engineer-in-Charge shall be final and binding.

21. For materials under category 19(a),(b)&(c), the contractor will act as the custodian thereof. The materials will have to be carried from the nearest Departmental go-down to worksite by the contractor at his own cost. The contractor shall remain responsible for the proper storage and safety of the materials. Suitable Go-down/Store shall have to be made by the contractor at his/her own cost. Penalty charges shall be levied at higher rate for loss, wastage, misuse. Surplus materials of the departmental if any, shall have to be returned to the issuing Go-down or store at the contractor's cost within the time frame as fixed by Engineer-in-Charge, otherwise, the cost at penal rate will be recovered from the bill. Indent for departmental materials shall be submitted by the contractor to the AE/S.D.O. at least 7 days in advance of actual requirement. No claim will be entertained for non-issuance of such materials in time but reasonable extension of time will be granted. All materials, whatever be the category thereof, shall be properly stored by the contractor in suitable go downs near the site of work at his own cost & under no circumstances whatsoever shall any material be removed from the site of work without prior written permission of the Engineer-in-Charge. The contractor shall be responsible for any damage, wastage or loss of such materials.
22. The contractor shall also have to satisfy the Engineer-in-Charge regarding the proper utilization of materials which have been issued departmentally.
23. Value of the material, under category (a) & (b) of clause 19, will be recovered from the bills of the contractor in one or successive instalments as may be decided by the Engineer-in-Charge.
24. Requisite quantity of cement as may be required for the work will be supplied from the nearest Departmental go down if stock permits. The issue rate of cement is shown in the Schedule of materials attached. Any excess consumption of cement by more than 5% over the final consumption statement drawn up as per consumption rate specified in the Schedule will be recovered at a penal rate shown in schedule.
25. Reinforcement steel rods/MS sheet piles/bitumen will be issued when stock permits, from the nearest departmental go-down where such material is available in marketable length/quantities. While issuing the same, for any particular work the quantity actually required as per approved drawing shall only be issued. While executing the work, it will be responsibility of the Contractor/bidder as well as the Engineer-in-Charge to get this quantity properly utilized in the work. Cut pieces, if any will not be taken back by the Department. Recovery for the total quantum of steel issued will be made at the issue rate shown in the Schedule below. In case of misuse over +10%, deduction will be made at a penal rate shown in the Schedule below. This whole principle shall apply in case of other M.S materials like sheet piles and structural steel members as well.
- 26. SCHEDULE OF MATERIALS TO BE SUPPLIED DEPARTMENTALLY AND THEIR RECOVERY RATES**

Sl. No.	Name of materials	Issue rate (in `)	Unit	Penalty recovery rate for loss or misuse or wastage (if otherwise not mentioned specifically in the SoR)	Place of delivery
01	Cement		MT	2 (Two) times issue rate	Departmental Godown
02	Reinforce-ment steel rods, structural steel members, M.S sheet Piles		MT	2 (Two) times issue rate	-do-
03	Bitumen		MT	2(Two) times issue rate	-do-

27. All queries and disputes arising out of the works contract during construction phase are to be brought to the notice of the Chairman of the 'Department Dispute Redressal Committee' in writing for decision within 15 days.

Technical specification & methodology

28. Under Water Survey of Upstream and submerged structure of barrage body, between barrage gate guide plate & concrete and gate seals for checking for leakages, grid wise demarcation of suction point with colour video monitoring wherever required including covering all activities indicating suction points using necessary equipment and material and manpower such as driver, colour die, underwater video camera monitoring unit with surface TV set for display at top of dam with reference to making grids on the crest and impervious portion of upstream of dam including cost of all equipment, labours, drivers, colour video etc.as required and delivery of 4 sets of recorded CD etc. as directed by E-I-C.

In order to identify the Cracks and Defects point in inspection to be carried out on the barrage body (wherever exposed) from the river bed to the top water level using with highly trained and capable diving teams and Video camera. The divers shall carryout the inspection following the grid pattern, carefully observing cracks and defection of wall after cleaning of surface and communicating the same to the top. A detailed report with plotted drawings shall be prepared for further treatment. The various types of distresses shall be marked & located and reported as Cavities, Pot holes, Blow Holes, Peeled Joints, cracks, honeycombed concrete, loose concretes etc along with the size and dimension.

29. Underwater Geo- Technical & geophysical investigation asses the Condition/ health of subsoil in various sections as per the approved methodology through following tests.

a. Bore and Cross bore test

Geo-technical investigation will be carried out at upstream after the impervious floor in concrete block areas under submerged/underwater condition following standard practices. The drilling with rotary method of required diameter and to required depth minimum 5/6 m below sheet pile. Soil samples are to be collected for the various tests and during boring identifying the areas of voids, unconsolidated loose, unstable, collapsing formations etc.

b. Piezometer installation and groundwater monitoring

Standpipe piezometers are to be used for monitoring and to determine whether there is an upward or downward gradient of water. The piezometer tip will be installed at the height to which the water rises in the hole is a direct measure of the water pressure of the soil at the depth.

c. Electrical Resistivity & Imaging and Streaming Potential profiles

To be conducted under standard practice by using pairs of electrodes to inject current into the ground and measure the resulting electrical potential distribution. The results of electrical surveys carried out along the structures are to be presented as vertical sections showing the electrical properties of the bank materials showing picture of internal resistivity distribution of the structure, identifying areas of water saturation, identifying the zones of water accumulation and wetting. 2D Resistivity Imaging using an array of electrodes connected by multicore cable to provide a linear depth profile, or pseudo section, of the variation in resistivity both along the survey line and with depth.

d. Coefficient of permeability

In-situ test to be conducted through Percolation Testing or Lugeon Testing procedure.

30. Drilling of Core holes of BX/BW size(54mm) vertical or inclined upto 10 degree to vertical as directed , in masonry or concrete or rock masonry for barrage body from sill level of barrage gates including cost of all materials ,machinery, labour , water charges as directed by Engineer In Charge.

Core specimen for the determination of strength and other parameters of barrage structure shall have a diameter of at least 5.4 cm or shall have a diameter at least three times the maximum nominal size of the coarse aggregate used in the concrete Identify the areas where core to extracted core cutter shall be located perpendicular / inclined upto 10 degree to the horizontal surface of the concrete bed. IS: 456-2000 specified that the points from which cores are to be taken and the number of cores required shall be at the discretion of the engineer-in-charge and shall be representative of the whole of concrete concerned in no case, however, shall fewer than three cores be tested. Core shall be prepared and tested as described in IS: 516.

31. Under water curtain grouting of soil for blocking of leakage/ flow at required locations as per approved design including making drill upto required depth and grouting as per methodology and specification.

Initially, the area where the soil has to be treated is chosen and a hole is drilled to the required depth. The depth depends upon how deep the weak subsoil exist. The hole drilled may be small of approximately 10 to 20 cm. Drilling can be done by

rotating drilling system under high pressure to the desired depth. The next step is to place the equipment over the drill hole to conduct the injection process. The equipment consists of a jet grouting string of required diameter. At the end of this string, it possesses a nozzle in order to have an injection at a higher velocity. At the start, the string is raised and rotated slowly to seal the whole column surface with soil and the fluid system that has to be injected. After that main jetting starts and in process the fluid is injected (through a rotary motion) and the string is raised and spoil is discharge out.

32. Providing & Laying of abrasive resistant impermeable UV resistant protective screed of avg 15 m.m. thik on downstream glacis structure with high strength polymer modified mortar with cost of all materials, Scaffolding, labour, machineries etc. Complete with all lead and lifts as per the direction of E-I-C.

Material:- Fibre reinforced polymer modified pre batched repair mortar maintaining consumption 2200 Kg/m³ with water: powder ratio 0.13-0.15 W :P ratio. Compressive Strength - 1 Day is 20 N/mm², 7 days – 35 N/mm² as per ASTM C109. Flexural Strength, 7 days -3 N/mm²(According to ASTM C293-79), 28 days -5 N/mm² (According to ASTM C 293-79).

Material should be of approved make like SIKA, FOSROC, BASF, Dr FIXIT or equivalent.

Methodology:- Surface cleaning by removing dust/coating if any to completely expose concrete without chipping and without damaging concrete and using high-pressure water jet to remove the dried fungal growth and other foreign materials to until the surface looks sound, repair of surface and then applying abrasive resistant impermeable UV resistant protective screed of average 15 mm thick on downstream glacis structure with high strength polymer modified mortar for concrete of average thickness of 15 mm.

Saturate the area to be repaired with clean water. The surface must be mat-damp, but without standing water. Apply slurry coat scrape coat of repair mortar or primer onto the prepared wet surface as required. Thereafter apply full coat of repair mortar upto the desired thickness, line and level while previous coat is still wet within the specified time. The top surface should be smoothed with a trowel or finishing by float or sponge as soon as the mortar has begun to stiffen.

The material shall be performed with High Performance Cementitious Mortar CE certified conforming to EN: 1504-3-R4.

33. Temporary plugging of leakage through gates using epoxy putty, rubber seal etc. from upstream face with driver to facilitate the downstream apron rehabilitation works and removal of same after the downstream work.

Material:- Solvent free moisture insensitive, two component epoxy putty (Coverage 1.5 Kg./sq. m. per mm thickness. Bond strength on concrete > 1.5 N/mm² (According to ISO 4624).

Material should be solvent free, Low VOC and non-shrink, Easy application, No primer necessary for rubber base product.

Material should be of approved make like SIKA, FOSROC, BASF, Dr FIXIT or equivalent.

- a. Identifying the temporary plugging of leakages points.
- b. Leakages portion shall be cleaned using underwater jet to remove the fungal growth and other foreign materials to enable a clean and visible surface.
- c. Filling the leakage with epoxy putty by mixing of base and hardener and quartz sand.

34. Rebar fastening with MS 16mm dia. anchor bar Embedment of 200mm Making hole in the concrete in dry or wet condition including dewatering if required by different type of machinery like hammer drill, Dipenser, Holder, Blowout Pump and Consumables, Drill bits, chemical adhesive complete with all material, labour, plant equipment.

- a. Drilling hole of 20 mm dia to a depth of 200mm by rotary hammer drill,
- b. Cleaning of holes with water jet and air.
- c. Pouring of low VOC and non-shrink epoxy (by mixing of base and hardener and quartz sand) around of half of hole depth and inserting the 16mm dia bar with overflowing epoxy material.

Material should be solvent free, Low VOC and non-shrink epoxy, moisture insensitive, Easy application and mixing.

Material should be of approved make like SIKA, FOSROC, BASF, Dr FIXIT or equivalent.

35. Sealing of cracks/porous concrete including dewatering or in underwater as the case may be by injecting with non-shrink cementitious grout process 1 m c/c followed by moisture incentive epoxy injection through packer on identified point including material/manpower as per Technical Specification complete in all respect.

Providing and inserting nipples with approved fixing compound after drilling holes for grouting as per technical specifications including subsequent cutting / removal and sealing of the hole as necessary of nipples after completion of grouting with cement / epoxy.

- a. Identifying the damages joint, honeycombed, pockets, blow holes and slots at various locations at different depth.
- b. Cleaning the joints with wire brush and fixing the nozzle at intermediate & critical location with underwater setting thixotropic moisture insensitive Epoxy based moisture insensitive putty along the joints. The same putty also used for the sealing of the nozzles.
- c. Grouting through nozzles with non-shrink under water cementitious Grout material. The mixed material shall be poured in to the high pressure grouting machine container and grouted through the non-return nozzle already fixed on cracks. The grouting shall be done from the bottom of crack until grout rejects of all other grouting ports. The grouting shall be carried out with the help of divers and underwater communication device to know the conditions.

Process for Grouting:-

Drilling and fixing injection packers in RC members including –

Drilling holes: Drilling holes in structural members at the intervals as per recommendation of Engineer in Charge.

Cleaning of holes: Cleaning the holes by air blower prior to fixing nozzles.

Fixing of packers: Insert 12 mm dia 50-75 mm long injection packers in clean holes with moisture insensitive epoxy resin based putty or equivalent.

Cutting of packers: Cut the packers by cut of wheel after completion of grouting without damaging structural-elements.

Sealing of holes: Supply and apply solvent free, moisture insensitive epoxy resin based patch repair putty.

Material: Suitable for submerged condition; compressive strength of 40 N/mm² (1 day) according to IS 9162-1979. Sealing of cracks / porous concrete including dewatering or in under water as the case may be by injecting with moisture insensitive cementitious injection grout process with injection packer including material / manpower as per technical specification complete in all respect.

Product: Compressive strength 1 day \geq 40 N/mm².

(According to ASTM C 579), Tensile strength \geq 30 N/mm² (after 14 days at + 30°C) (According to ISO 527), Bond strength – after 14 days \geq 8 N/mm² (According to ASTM C 882) (Item – 8 of BOQ)

Material should be of approved make like SIKA, FOSROC, BASF, Dr FIXIT or equivalent.

36. Filling of cracks in Divide wall with micro concrete after 'V' cutting water jet cleaning surface preparation all complete as per Technical Specification of Specialized agency and methodology approved by E.I.C.

Material:- Factory designed pourable, non shrink micro concrete with consumption – 2000 kg / m³ at water : powder ratio 0.14 (Standards ASTM C1107), compressive strength in 1 day (according to ASTM C 109, 70 mm cube) – 25 N /mm², 7 days 25 N/mm² after 'V' cutting, water jet cleaning and surface preparation and using epoxy bonding agent complies with ASTM C 881 – 78 type II, Grade 2 Class B+C; Bond strength – 7 days – 2.5 – 3 N/mm², Consumption 0.4 kg/m²)

High flow, single component, shrinkage-compensated, cementations free flow micro concrete that achieves a compressive strength 40 MPa @ 28 days.

Material should be of approved make like SIKA, FOSROC, BASF, Dr FIXIT or equivalent.

Crack Groove Cutting: Groove shall be cut using under water concrete cutting machine of size of 25 mm wide and 50 mm deep on each side of the crack to form as "V" groove all along the crack to fill the underwater high strength, free flow micro concrete with anti-wash agent of pre packed as per manufacturer specifications and replaced 20% by weight with well graded cleaned crushed aggregate 10mm & down (aggregate should be less than 10 mm but retained on 3.36 mm) for repairing

excessive damaged area of structural elements excluding reinforcement but including necessary scaffolding and staging, centering, fixing watertight form work , shuttering, curing inclusive of labour, materials, equipment etc. complete as per specifications.

37. Proving and filling the gaps of 100mm between existing concrete blocks to act as a compact mass with dry packed 20mm graded down stone grouted with non-shrink and anti-wash cementitious compound, keeping 150mm free from the top level which to be filled with dense micro concrete complete with all material , labour, equipment, tools and plants, chemicals and additives in under water condition as per specification of specialized agency dimension of blocks being 1.52x1.52 in plan with a depth of 1.22m after approval of methodology by E-I-C.

Material:- Factory designed pourable, non shrink micro concrete with consumption – 2000 kg / m³ at water : powder ratio 0.14 (Standards ASTM C1107), compressive strength in 1 day (according to ASTM C 109, 70 mm cube) – 25 N /mm², 7 days 25 N/mm² after ‘V’ cutting, water jet cleaning and surface preparation and using epoxy bonding agent complies with ASTM C 881 – 78 type II, Grade 2 Class B+C; Bond strength – 7 days – 2.5 – 3 N/mm², Consumption 0.4 kg/m²

Material should be of approved make like SIKA, FOSROC, BASF, Dr FIXIT or equivalent.

- a. Gaps shall be cleaned using underwater jet to remove the slit, fungal growth and other foreign materials to enable a clean and visible surface.
- b. Laying of 20 mm down aggregate with cement mortar with anti-wash agent to fill the gap keeping 150 mm down from the top with necessary vibration, hammering and shuttering if necessary.
- c. Filling of 150 mm with underwater high strength, free flow micro concrete with anti-wash agent of pre packed as per manufacturer specifications and replaced 20% by weight with well graded cleaned crushed aggregate 10mm & down (aggregate should be less than 10 mm but retained on 3.36 mm).

Technical specification & methodology (item no. 14 of BOQ)

Applying epoxy based reactive bonding agent with high pot life till receiving new concrete complies with ASTM C 881 – 78 type II, Grade 2 Class B+C; Bond strength – 7 days – 2.5 – 3 N/mm² for joining the old concrete with fresh concrete to be applied within manufacturers specified time as per manufacturers specification, (Consumption: 0.4 kg/m² of concrete surface).

Special Note: The concrete should be durable, smooth finished free from cracks, pot holes, honey combs etc. after repair work. The contractor to ensure protection of concrete structure from carbonation and chloride attack.

(For item no 15, 16 and 18)

38. Supply and Installation of Uniform Section (US) Tech Revetment fabric form work including concreting work (Under water including all protective work) having filled in thickness as per drawing in river bed floor along with supply & laying of Fine & coarse Aggregate(Pakur Varity) of M -15 Grade Concrete by pumping system inside fabric form as per the technical specification including waste, overlapping and stitching of fabric form work, material & labour cost, complete in all respect. (Methodology to be approved by E.I.C)

Under Water Concrete with fabric form and fine aggregate concrete as per the details below:-

38.01. Fabric Form

Fabric forms are constructed of woven, double-layer synthetic fabric. Fabric form concrete linings are installed by positioning fabric forms over the areas to be protected and then pumping, high-strength, fine aggregate concrete into the forms. The fabric forms can be placed and filled either underwater or in-the-dry. The high-strength, fine aggregate concrete is used in place of conventional concrete because of its pump ability, compressive strength, density and absorption resistance.

38.02. Uniform Section (US) Lining

Uniform Section Linings are similar to traditional concrete slope paving. They create a solid, high quality concrete lining with a relatively low hydraulic resistance and uniform cross section. These linings are used to reduce the infiltration or exfiltration of aggressive waste and chemical fluids into or out of open channels and basins. They are also used to reduce exfiltration in arid regions where open channels and basins require watertight linings.

Uniform Section Linings are resistant to leach ate and most chemicals. They protect geosynthetic liners from mechanical damage, exposure to UV light, and freeze-thaw cycles. These self-supporting, high strength linings permit construction on steep side slopes and replace the conventional use of clay or sand as liner protection. Placement of the forms and concrete filling can be performed without the use of equipment on the liner. The tensile strength and abrasion resistance of the fabric

protect the liner from the pumped concrete.

38.03. Fabric Form Panels

Fabric form mill rolls are factory assembled by sewing multiple mill widths of fabric forms side-to-side to form large panels. Mill width rolls of fabric forms are cut to the lengths required and their two layers of fabric separately sewn together, bottom layer to bottom layer and top layer to top layer, to form multiple mill width panels that are comprised of one or more sections divided by baffles at predetermined intervals.

38.04. Baffle

Baffles are flow-directing longitudinal and/or lateral geotextile walls constructed between sections of fabric form layers. Baffles are an integral part of the fabric form design. Baffles are designed to support the panel section, determine the concrete area of the section and direct the flow of fine aggregate concrete for maximum efficiency.

38.05. Slide Fastener (Zipper):

A device consisting of two flexible strips of molded plastic with interlocking tooth-like projections closed by pulling a slide used to fasten fabric forms panels together.

•Uniform Section Concrete Form Liner : The fabric form shall be as per the details specification as under;

TABLE 1.0 PROPERTY REQUIREMENTS – UNIFORM SECTION (US) FABRIC

	Test Method	Units	Values
PHYSICAL PROPERTIES ^{1,2}			
Composition of Yarns			Polyester
Mass Per Unit Area (double-layer)	ASTM D 5261	g/m ²	500
Thickness	ASTM D 5199	mm	0.40
Mill Width		M	2.13
MECHANICAL PROPERTIES ^{1,2}			
Wide-Width Strip Tensile Strength	ASTM D 4595		
Machine Direction		kN/m	50
Cross Machine Direction		kN/m	60
Elongation at Break	ASTM D 4595		
Machine Direction		%	8
Cross Machine Direction		%	8
Grab Tensile Strength	ASTM D 4632		
Machine Direction		N	1395
Cross Machine Direction		N	1365
Elongation at Break	ASTM D 4632		
Machine Direction		%	25
Cross Machine Direction		%	20
Trapezoidal Tear Strength	ASTM D 4533		
Machine Direction		N	460
Cross machine Direction		N	600
CBR Puncture Strength	ASTM D 6241	N	5450
Mullen Burst Strength	ASTM D 3786 (Mod.)	kg/cm ²	40
HYDRAULIC PROPERTIES ^{1,3}			
Apparent Opening Size (AOS)	ASTM D 4751	mm	0.30-0.80
Permittivity	ASTM D 4491	sec ⁻¹	0.40-0.55
Flow Rate	ASTM D 4491	l/min/m ²	1200-1625

38.06. Drainage behind Concrete Lining

Geotextile Filter Fabric:

The geotextile filter fabric shall be composed of synthetic fibers formed into nonwoven sheets. The geotextile filter fabric must be permitted to function properly by allowing relief of hydrostatic pressure; therefore fine soil

particles shall not be allowed to clog the geotextile. The non-woven geotextile shall have a Mass per unit Area of 200 g/m².

38.07. Coarse Aggregate

Coarse aggregate shall be approved hard aggregate generally conforming to latest Indian Standards: IS - 383. The following tests should be carried out for every new lot of supply:-

- Crushing value
- Impact value
- Sieve analysis
- Deleterious material
- Flakiness index

For every 150 CUM of concrete work of all kinds (apart from RMC) and part thereof one test shall be carried out.

All costs to carry out field as well as laboratory tests shall be borne by the Contractor.

Fine Aggregate Concrete

Fine aggregate concrete shall consist of a proportioned mixture of Portland-Puzzolana cement, fine aggregate (sand) and water. The consistency of the fine aggregate concrete delivered to the concrete pump shall be proportioned and mixed as to have a flow time of 9-12 seconds when passed through the 19 mm orifice of the standard flow cone that is described in ASTM C 939. Additional Puzzolana and/or admixtures may be used with the approval of the Engineer-in-charge. The water/cement ratio varies with the exact granulometry of the fine aggregate (sand) and shall be determined by the ready-mix manufacturer using the above referenced flow cone.

At the direction of the Engineer-in-charge, the Contractor shall demonstrate the suitability of the fine aggregate concrete mix design by placing the proposed fine aggregate concrete into three (3) 50 mm concrete cubes. The mix shall exhibit a minimum compressive strength of 20 N/mm² at 28 days, when made and tested in accordance IS: 516. The sand/cement ratio shall be determined by the ready-mix manufacturer and shall be on the order of 2.4:1. The water/cement ratio shall be determined by the ready-mix manufacturer, but generally shall be on the order of 0.7.

Any standing mixing trucks shall be flow cone testing every thirty (30) minutes and water added as required. The mix is expected to have a working fluidity period of a maximum of two (2) hours after which the fluidity or quantity of water added shall render the mix unsuitable.

38.08. Cement

The cement used shall be Portland-Puzzolana conforming to IS: 1489.

38.09. Fine Aggregate (Sand)

Fine aggregate shall consist of suitable clean, hard, strong and durable natural or manufactured sand. It shall not contain dust, lumps, soft or flaky materials, mica or other deleterious materials in such quantities as to reduce the strength and durability of the concrete, or to attack any embedded steel, neoprene, rubber, plastic, etc. Motorized sand washing machines shall be used to remove impurities from the fine aggregate. Fine aggregate having positive alkali-silica reaction shall not be used. All fine aggregates shall conform to IS: 383, (Parts 1 to VIII). The fineness modulus of fine aggregate shall neither be less than 2.0 nor greater than 3.5. Aggregate grading shall be reasonably consistent and shall not exceed the maximum size which can be conveniently handled with available pumping equipment, nor exceed the maximum size which allows the proper and efficient filling of the fabric formed concrete lining.

REQUIREMENT FOR FINE AGGREGATE			
IS Sieve Size	Percent by Weight Passing the Sieve		
	Zone-I	Zone-II	Zone-III
10 mm	100	100	100
4.75 mm	90-100	90-100	90-100
2.36 mm	60-95	75-100	85-100
1.18 mm	30-70	55-90	75-100
600 micron	15-34	35-59	60-79
300 micron	5-20	5-30	12-40
50 micron	0-10	0-10	0-10

38.10. Plasticizing and Air Entraining Admixtures:

Any air entraining agent or any other admixture may be used, as approved, by the Engineer-in-charge to increase workability, to make concrete impervious and more durable. Air entraining admixture shall conform to ASTM, Indian Standards (IS) or International Organization of Standards (ISO).

“Notwithstanding anything stated in the description of Item No.12 of this e-NIT, Specification, type and properties of sheet piles should be as per the following provision:

39.0 Specification and type of sheet pile

39.1 Hot rolled ‘Z’-type or ‘U’-type sheet piles conforming to IS: 2314-1986 of the following designations may preferably be used.

Type	Designation	Nominal Dimensions	Mass per metre (kg)
‘Z’-type	ISPS 2322 Z	As per Table-2 of IS: 2314-1986	81.6
‘U’-type	ISPS 2770 U		95.0

39.2 In case of non availability of hot rolled ‘Z’-type or ‘U’-type sheet piles conforming to IS: 2314-1986, hot rolled sheet piles of non alloy steels conforming to EN 10248 (European Standard) of nearest equivalent section to the BIS Specification (‘U’-type or ‘Z’-type) may also be used, subject to fulfilment of the following conditions:

- (i) Minimum section modules of the ‘Z’-type or ‘U’-type sheet piles conforming to EN 10248 shall not be less than 2000 cm³.
- (ii) Minimum yield strength of the section should be 430 N/mm².
- (iii) Minimum thickness (excluding tolerance) should not be less than 10.0 mm.

**Sd/-
Superintending Engineer
Damodar Irrigation Circle
Irrigation & Waterways Directorate**

(DIGITAL SIGNATURE IS SUFFICIENT)

Copy with enclosure forwarded for information and taking necessary action for wide publication to the:-

01.	Chief Engineer(West), Kanainatsal, Purba Bardhaman.
02.	Chief Engineer(South), I&W Directorate, JalasampadBhaban, Salt Lake City, Kolkata-91.
03.	Superintending Engineer, Metropolitan Drainage Circle, Jalasampad Bhawan, Salt Lake City, Kolkata.
04.	Superintending Engineer, Greater Calcutta Drainage Circle, Jalasampad Bhawan, Salt Lake City, Kolkata.
05.	Superintending Engineer, Western Circle No – 1, Jalasampad Bhawan, Salt Lake City, Kolkata.
06.	Superintending Engineer, Eastern Circle, Jalasampad Bhawan, Salt Lake City, Kolkata.
07.	Superintending Engineer, Mechanical & Electrical Circle, Jalasampad Bhawan, Salt Lake City, Kolkata.
08.	Director of Design, Central Design Office, Jalasampad Bhawan, Salt Lake City, Kolkata.
09/13	Executive Engineer, Damodar Canal Division/ Burdwan Irrigation Division/Right Bank Irrigation Division/Damodar Headworks Division/Lower Damodar Irrigation Division.
14.	Notice Board.

Encl.:-

- 1) Form – 1, APPLICATION FOR e-TENDER.
- 2) Form – 2, Declaration against Common Interest.
- 3) Form - 3, Power of Attorney for signing of Contract/Tender Agreement.
- 4) Form - 4, Declaration on antecedents and performance.
- 5) Form - 5, Power of Attorney for Lead Member of Consortium/Joint Venture.
- 6) Form - 6, SPECIMEN FORMAT FOR THE BANK GUARANTEE FOR ADDITIONAL PERFORMANCE SECURITY DEPOSIT.

Sd/-**Superintending Engineer
Damodar Irrigation Circle**

FORM 1

(To be submitted in plain paper/letter head as per specimen, duly filled up and uploaded with digital signature which shall be treated as the self declaration of the bidder)

APPLICATION FOR e-TENDER

**To,
The Superintending Engineer
Damodar Irrigation Circle, I&W Directorate**

e- Tender No:- WBIW/SE/DIC/ NIT.....(e) /201.....-1....

Serial No. of Works applied for :-

Amount put to e-Tender: Rs

Dear Sir,

Having examined the Technical PQ cover, OID cover, Corrigendum (*optional) & entire e-NIT documents, I/we hereby would like to state that I/we wilfully accept all your conditions and offer to execute the work as per the tenders rules in e-NIT, terms & conditions, specifications, drawings, bill of quantities and corrigenda/addenda, SoR, and Agreement (WB Form No. 2911(i)/(ii) involving the e-Tender and Serial no of work stated above. I/We acknowledge that the making of our bid shall be regarded as an unconditional and absolute acceptance of the terms & conditions of the e-NIT. I/We also agree to remedy the defects during execution and upto end of security period of the above work in conformity with the conditions of contract, specifications, drawings, bill of quantities and addenda/corrigenda.

Dated this _____ day of _____ 201____

Full name of Bidder / Contractor: _____

Name in full of Signatory/s*: _____

In the capacity* of: _____

Duly authorized to sign bid

for & on behalf of (Name of Firm): _____

(In block Capital letters or typed)

Office address with seal:

Telephone no(s) (office): _____

Mobile No: _____

Fax No: _____

E mail ID: _____

*In case of Joint Venture & Consortium the Lead Member to submit this format.

(DIGITAL SIGNATURE OF BIDDER)

FORM – 2

Declaration against Common Interest

(To be submitted in plain paper/letter head as per specimen, duly filled up and uploaded with digital signature, which shall be treated as the self declaration of the bidder)

Ref:- e-NIT No.

e-Tender ID No.....

Sl. No. of work (in the list of work in the e-NIT)

To,
Superintending Engineer
.....Circle
Irrigation & Waterways Directorate

I/We, Sri/Smt. _____, the authorized signatory on behalf of
..... do hereby affirm that I/We/any of the member
of..... bidding against e - NIT No. Sl. No. do
not have any common interest either as a partner in any other partnership firm /consortium/Joint Venture or as
Proprietor / Principal Share Holder of any other Firm/Company in the same serial for the work I / we want to participate.

Dated this _____ day of _____ 201____

Full name of Bidder / Contractor: _____

Authorised Signatory: _____

In the capacity of: _____

Duly authorized to sign bid

for & on behalf of (Name of Firm): _____

(In block Capital letters or typed)

Office address with seal:

Telephone no(s) (office): _____

Mobile No: _____

Fax No: _____

E mail ID: _____

*In case of Joint Venture & Consortium the Lead Member to submit this format.

(DIGITAL SIGNATURE OF BIDDER)

FORM – 3

Power of Attorney for signing of Contract/Tender Agreement *

(May be submitted if the bidder is a Company, Autonomous Body, Undertaking, Corporation, and NGO, in plain paper or otherwise in any legally acceptable format which shall be treated as the self declaration of the bidder)

Know all men by these presents, I/We, (name of the firm and address of the registered office) do hereby irrevocably constitute, nominate, appoint and authorise Mr./Ms (Name).....son/daughter of and presently residing at....., who is presently employed with us/ the Lead Member of our Consortium/Joint Venture and holding the position of, as our true and lawful attorney (hereinafter referred to as the "Attorney") to do in our name and on our behalf, all such acts, deeds and things as are necessary or required in connection with or incidental to submission of our bid for the ***** Project proposed or being developed by the Governor of the State of West Bengal represented by the Superintending Engineer, Circle, Irrigation & Waterways Directorate, Government of West Bengal, including but not limited to signing and submission of all applications, bids and other documents and writings, participate in bidders' and other conferences and providing information / responses to the Authority, representing us in all matters before the Authority, signing and execution of all contracts including the Agreement and undertakings consequent to acceptance of our bid, and generally dealing with the 'Authority' in all matters in connection with or relating to or arising out of our bid for the said Project and/or upon award thereof to us and/or till the entering into of the Agreement with the Authority;

AND we hereby agree to ratify and confirm and do hereby ratify and confirm all acts, deeds and things done or caused to be done by our said Attorney pursuant to and in exercise of the powers conferred by this Power of Attorney and that all acts, deeds and things done by our said Attorney in exercise of the powers hereby conferred shall and shall always be deemed to have been done by us.

IN WITNESS WHEREOF WE,, THE ABOVE NAMED PRINCIPALS HAVE EXECUTED THIS POWER OF ATTORNEY ON THIS DAY OF, 20.....For.....

(Signature Name date designation and address of the bidder/(s) & Contact No. & e-mail ID)

Witnesses: (Full Name with permanent addresses and contact nos.)

- 1.
- 2.

Signed & accepted

Notarized

Notes:

- 1 *The mode of execution of the Power of Attorney should be in accordance with the procedure, if any, laid down by the applicable law in India and the charter documents of the executants and when it is so required, the same should be under common seal affixed in accordance with the required procedure.*
- 2 *Wherever required, the Bidder should submit for verification the extract of the charter documents and documents such as a board or shareholders' resolution/ power of attorney in favour of the person executing this Power of Attorney for the delegation of power hereunder on behalf of the Bidder.*
- 3 *For a Power of Attorney executed and issued overseas, the document will also have to be legalized by the Indian Embassy and notarized in the jurisdiction where the Power of Attorney is being issued. However, the Power of Attorney provided by Bidders from countries that have signed the Hague Legislation Convention, 1961 are not required to be legalized by the Indian Embassy if it carries a conforming Apostle certificate.*

- ***This is only a specimen format and the bidder may submit any other legally valid format by bidder organisation except Proprietorship Firms.***

FORM – 4

Declaration on antecedents and performance

(To be submitted in plain paper/letter head as per specimen, duly filled up and uploaded with digital signature, which shall be treated as the self declaration of the bidder)

Ref:- e-NIT No.

e-Tender ID No.....

List of Work Sl. No.....

To,
Superintending Engineer
.....Circle
Irrigation & Waterways Directorate

I/We, Sri/Smt. _____, the authorized signatory on behalf of _____ do hereby affirm that I/We/any of the member of..... bidding against e - NIT No. Sl. No. are not black listed suspended or debarred from participation in State Government procurements and tenders in the Irrigation & Waterways Directorate, Government of West Bengal, other Departments of the State Government and Government of India on the date of publication of this Notice Inviting Tender (NIT).

If at a later stage this submission (undertaking) is found incorrect, the bidder company along with all its constituent members/owners/partners would be liable to penal actions as decided by the Government under the law.

Dated this _____ day of _____ 201____

Full name of Bidder / Contractor: _____

Authorised Signatory: _____

In the capacity of: _____

Duly authorized to sign bid

for & on behalf of (Name of Firm): _____

(In block Capital letters or typed)

Office address with seal:

Telephone no(s) (office): _____

Mobile No: _____

Fax No: _____

E mail ID: _____

(DIGITAL SIGNATURE OF BIDDER)

FORM-5*

Power of Attorney for Lead Member of Consortium/Joint Venture

(To be submitted in Non-Judicial Stamp Paper of appropriate value, which shall be treated as the self declaration of the bidder Consortium/Joint Venture as their joint affidavit-Specimen format, bidder may furnish in any other legally accepted format)

Whereas the Governor of West Bengal represented by having its Head Quarters at,PIN-.....Phone No....., e-mail ID & Principal office at Jalasampad Bhawan, Salt Lake, Sector-II, Bidhannagar, Kolkata, PIN 700091, in West Bengal (“The Authority”) has invited bids from eligible, bonafide, registered companies/registered joint ventures or consortiums, having desired credentials within India for the Project, Irrigation & Waterways Department, Government of West Bengal”;

AND Whereas, (1).....,(2) and (3)..... (collectively the “Consortium”/Joint Venture) being Members of the Consortium/Joint Venture are interested in bidding for the Project in accordance with the terms and conditions of the Tender and other connected documents in respect of the Project, and

Whereas, it is necessary for the Members of the Consortium/JV to designate one of them as the Lead Member with all necessary power and ‘The Authority’ to do for and on behalf of the Consortium/Joint Venture, all acts, deeds and things as may be necessary in connection with the Consortium/Joint Venture’s bid for the Project and its execution;

NOW, THEREFORE, KNOW ALL MEN BY THESE PRESENTS

We, having our registered office at, M/s....., having our registered office at, and M/s....., having our registered office at, (hereinafter collectively referred to as the “Principals”) do hereby irrevocably designate, nominate, constitute, appoint and authorize M/s, having its registered office at, being one of the Members of the Consortium/Joint Venture, as the **Lead Member** and true and lawful attorney of the Consortium/Joint Venture (hereinafter referred to as the “Attorney”) and hereby irrevocably authorize the Attorney (with power to sub-delegate) to conduct all business for and on behalf of the Consortium/JV and any one of us during the bidding process and, in the event the Consortium/JV is awarded the Contract, during the execution of the Project, and in this regard, to do on our behalf and on behalf of the Consortium/JV, all or any of such acts, deeds or things as are necessary or required or incidental to the submission of its bid for the Project, including but not limited to signing and submission of all applications, bids and other documents and writings, participate in bidders’ and other conferences, respond to queries, submit information/ documents, sign and execute contracts and undertakings consequent to acceptance of the bid of the Consortium/Joint Venture and generally to represent the Consortium/Joint Venture in all its dealings with the Authority, and/ or any other Government Agency or any person, in all matters in connection with or relating to or arising out of the Consortium/Joint Venture’s bid for the Project and/ or upon award thereof till the Agreement is entered into with the Authority;

AND hereby agree to ratify and confirm and do hereby ratify and confirm all acts, deeds and things done or caused to be done by our said Attorney pursuant to and in exercise of the powers conferred by this Power of Attorney and that all acts, deeds and things done by our said Attorney in exercise of the powers hereby conferred shall and shall always be deemed to have been done by us/ Consortium/Joint Venture.

IN WITNESS WHEREOF WE THE PRINCIPALS ABOVE NAMED HAVE EXECUTED THIS POWER OF ATTORNEY ON THIS DAY OF 20....

For
(Signature, Name & Title)
For
(Signature, Name & Title)
For
(Signature, Name & Title)
(Executants/s)

(To be executed by all the Members of the Consortium/Joint Venture)

Notes:

- 1 The mode of execution of the Power of Attorney should be in accordance with the procedure, if any, laid down by the applicable law and the charter documents of the executants (s) and when it is so required, the same should be under common seal affixed in accordance with the required procedure.*
- 2 Wherever required, the Bidder should submit for verification the extract of the charter documents and documents such as a board or shareholders' resolution/ power of attorney in favour of the person executing this Power of Attorney for the delegation of power hereunder on behalf of the Bidder.*
- 3 For a Power of Attorney executed and issued overseas, the document will also have to be legalized by the Indian Embassy and notarized in the jurisdiction where the Power of Attorney is being issued. However, the Power of Attorney provided by Bidders from countries that have signed The Hague Legislation Convention, 1961 are not required to be legalized by the Indian Embassy if it carries a conforming Apostle certificate.*

(* This is a specimen sample and the Consortium/Joint Venture is at liberty to furnish this affidavit in any legally valid format in India for Works contract)

FORM-6*

SPECIMEN FORMAT FOR THE BANK GUARANTEE FOR ADDITIONAL PERFORMANCE SECURITY DEPOSIT

(*To be submitted only if the bid price quoted by the bidder is below 20% of the estimated cost put to tender, non submission within 7 working days from date of issuance of LOA which may be maximum extended to 14 working days after issuance of LOA/LOI will lead to rejection of selected bidder. Similar standard format issued by RBI approved Bank pledging Bank Guarantee of the required value and period in favour of Engineer-in-Charge is acceptable)

To,

----- (Designation of Engineer-in-Charge)

----- (Office address of Engineer-in-Charge)

WHEREAS _____ (name and address of Contractor) (hereafter called "the Contractor") has undertaken, in pursuance of Contract No: _____ dated _____ to execute _____ (name of Contract and brief description of Works) (hereinafter called "the Contractor").

AND WHEREAS it has been stipulated by you in the said Contract that the Contractor shall furnish you with a Bank Guarantee by a Scheduled commercial bank for the sum specified therein for '**ADDITIONAL PERFORMANCE SECURITY DEPOSIT**' for compliance with his obligation in accordance with the Contract:

AND WHEREAS we _____ (Indicate the name of the bank and branch) have agreed to give the Contractor such a Bank Guarantee:

NOW THEREFORE we _____ ; _____ (Indicate the name of bank and branch) hereby affirm that we are the Guarantor and responsible to you on behalf of the Contractor, upto a total of _____ Rs. _____ (amount of guarantee) _____ (in words). We undertake to pay you, upon your first written demand and without cavil or argument, a sum within the limits of _____ (amount of guarantee) as aforesaid without your needing to prove or to show grounds or reasons for your demand for the sum specified therein.

We _____ (Indicate the name of the bank and branch) hereby waive the necessity of your demanding the said debt from the contractor before presenting us with the demand.

We _____ (Indicate the name of the bank and branch) further agree to pay to you any money so demanded notwithstanding any dispute or disputes raised by the contractor(s) in any suit or proceeding pending before any court or Tribunal relating thereto, our liability under this present absolute and unequivocal.

The payment/so made by us under this bond shall be a valid discharge of our liability for payment there under and the contractor(s) shall have no claim against us for making such payment.

We _____ (Indicate the name of the bank and branch) further agree that no change or addition to or other modification of the terms of the Contract or of the works to be performed there under or of any of the contract documents which may be made between you and the contractor shall in any way release us from any liability under this guarantee, and we hereby waive notice of any such change, addition or modification.

We _____ (Indicate the name of the bank and branch) lastly undertake not to revoke this guarantee except with the previous consent of you in writing.

This guarantee shall be valid upto ----- . It come into force with immediate effect and shall remain in force and valid for a period upto the time of completion of the work under the stated contract plus claim period of six months for the Bank Guarantee. Notwithstanding, anything mentioned above, our liability against this

guarantee is restricted to Rs (Rs.) and unless a claim in writing is lodged with us within the validity period, i.e upto.....of this guarantee all our liabilities under this guarantee shall cease to exist.

Signed and sealed this day of 20 at

SIGNED, SEALED AND DELIVERED

For and on behalf of the BANK by:

(Signature)

(Name)

(Designation)

(Code Number)

(Address)

NOTES:

- i. The bank guarantee should contain the name, designation and code number of the officer(s) signing the guarantee
The address, telephone number and other details of the Head Office of the Bank as well as of issuing Branch (within West Bengal only to be accepted) should be mentioned on the covering letter of issuing Branch.