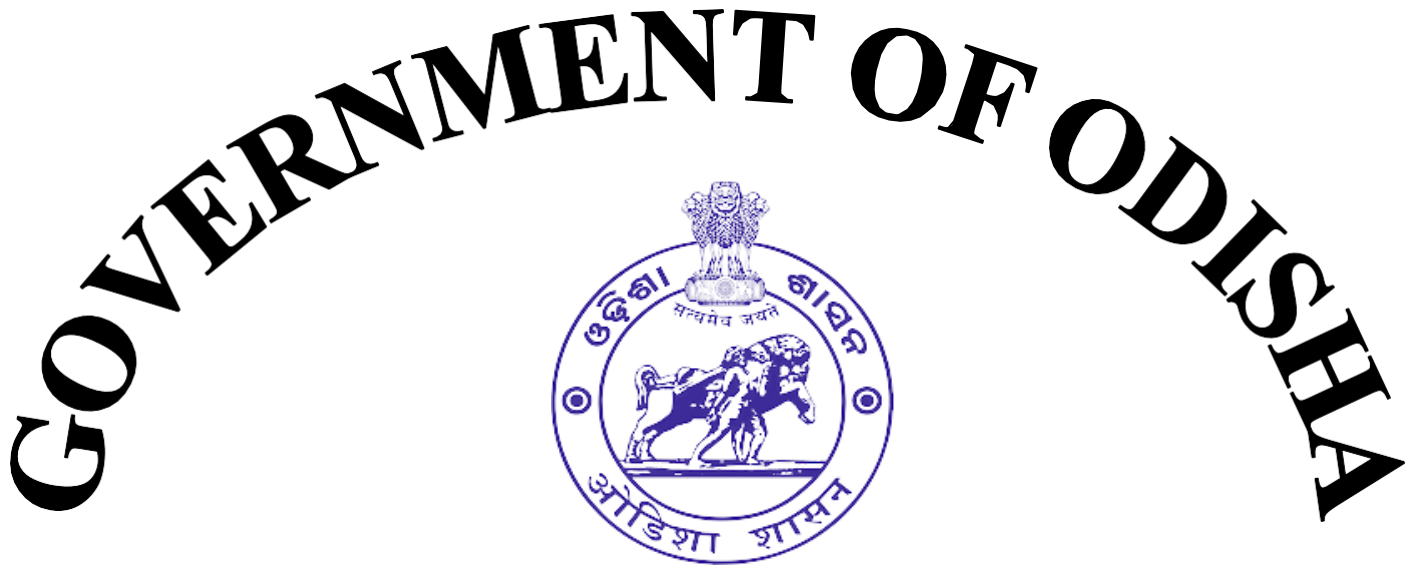




**DEPARTMENT OF WATER RESOURCES
UPPER INDRAVATI DAM CIRCLE, KHATIGUDA
MURAN DAM DIVISION
AT/PO: - KHATIGUDA, DISTRICT: - NABARANGPUR, ODISHA
e-PROCUREMENT BID DOCUMENT (TECHNICAL)**

FOR THE WORK

" Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."

BID IDENTIFICATION NO.: EEMDD-03(02/03)/2026-27, Dt:-07.08.2026

Certified that this bid document contains
1 2 5 Nos. of pages only.

Executive Engineer
Muran Dam Division
Khatiguda

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**GOVERNMENT OF ODISHA
DEPARTMENT OF WATER RESOURCES
OFFICE OF THE EXECUTIVE ENGINEER
MURAN DAM DIVISION, KHATIGUDA
AT/PO-KHATIGUDA, DIST-NABARANGPUR, PIN-764085
Email I.D- eemurandamdivision@gmail.com**

PAPER PUBLICATION NOTICE

e-Tender Call Notice No.- EEMDD-03(03)/2026-27, Dated: -07.08.2026

EE-MDD-Lr. No- 1150/WE

Dated: - 07.08.2026

To

The Deputy Director of Information & Public Relations (Advt.)
and Deputy Secretary to Government,
Information & Public Relation Department, Odisha, Bhubaneswar.
E-Mail: - ipr.advt@gmail.com

Sub: Publication of e-Tender Call Notice No. **EEMDD-03(03)/2026-27, Dated: 07.08.2026**

Sir,

The e-Procurement Notice No. **EEMDD-03(03)/2026-27, Dated: - 07.08.2026** of this division is enclosed herewith for kind information and necessary action. It is requested for publication in **Two Odia Daily Leading Local News Paper and One Local English News Paper** on or before Dt: **14.08.2026** for wide publication of the notice. The tender for the same will also be available in the official e-procurement web site www.tendersodisha.gov.in. Date & time of availability of bid documents in the portal is **from Dt. 14/08/2026 (11:00 A.M.) to Dt. 24/08/2026 (05:00 P.M.)**. The tender for the same will also be available in Office of The Executive Engineer, Muran Dam Division, Khatiguda.

Action may please be taken to consume the minimum possible space for the publication.
A complimentary copy of the same may be sent to this office for making necessary payment.

Bid documents consist of the schedule of quantities and the set of terms & Conditions of contract and all other details can be seen from the office of the undersigned & issuing the tender documents during the office hours every day except on Sunday and public holidays till last day of sale of tender papers.

Encl: 1. e-Tender Call Notice No. **EEMDD-03(03)/2026-27, Dated: -07.08.2026**

Yours faithfully,

Sd/-
Executive Engineer
Muran Dam Division
Khatiguda

**GOVERNMENT OF ODISHA
DEPARTMENT OF WATER RESOURCES
OFFICE OF THE EXECUTIVE ENGINEER
MURAN DAM DIVISION, AT/PO-KHATIGUDA
DIST-NABARANGPUR, PIN-764085
Email I.D- eemurandamdivision@gmail.com**

PAPER PUBLICATION NOTICE

e-Tender Call Notice No.- EEMDD-03(03)/2026-27, Dated: -07.08.2026

Bid Documents consisting of work, Estimated Cost of bid document, time of completion, Class of Contractors and the set of terms and conditions of contract and other necessary documents can be seen in Govt. Website i.e. www.tendersodisha.gov.in .

1. Name of the Work	Civil Works
2. No. of Works	03 (Three) Numbers
3. Estimated cost	Rs. 11.25 Lakhs (TCN SL NO. 1), Rs. 5.78 Lakhs (TCN SL NO. 2), Rs. 34.99 Lakhs (TCN SL NO. 3)
4. Eligibility of the bidders	‘B’, ‘C’ & ‘D’ Class Contractors (Odisha P.W.D or equivalent class of other licensing authority) as per Detail Tender Call Notice.
5. Period of completion	Twelve Calendar Months (e-TCN SL. No.-01 & 02) Three Calendar Months (e-TCN SL. No.-03)
6. Date of Clarification	14.08.2026 to 17.08.2026 only During Office Hour
7. Time for receipt of bid in the portal	From 14.08.2026 (11.00 AM) to 24.08.2026 (up to 5:00 P.M)
8. Date & place of opening of the bids on-line	25.08.2026 (11:00 A.M) O/o The Executive Engineer, Muran Dam Division, UIDC Khatiguda.
9. Name and address of the Tender Inviting Authority (TIA)	Executive Engineer Muran Dam Division, At/Po: Khatiguda, District: Nabarangpur

Further details can be seen from the e-procurement portal <http://tendersodisha.gov.in>

**Sd/-
Executive Engineer
Muran Dam Division
Khatiguda**

INVITATION FOR BIDS (IFB)
GOVERNMENT OF ODISHA
OFFICE OF THE EXECUTIVE ENGINEER
MURAN DAM DIVISION, AT/PO: KHATIGUDA
DIST.: NABRANGPUR (ODISHA), PIN-764085
E-Mail Id: eemurandamdivision@gmail.com

EE-MDD-Lr. No- 1149

Dated:07.08.2026

e-Procurement Notice**Bid Identification No.- EEMDD- 03(03)/2026-27, Dt: -07.08.2026**

1. The Executive Engineer, Muran Dam Division, Khatiguda, Dist.: Nabarangpur, on behalf of Hon'ble Governor of Odisha invites on-line **Percentage Rate bid** through e-procurement in **Single Cover System** for the works as mentioned below, through website in the prescribed form to be eventually drawn in P.W.D. Form No. P1 (Percentage Rate of Tender). The bid should be submitted by the eligible class of contractors as mentioned below registered with State Governments & contractors of equivalent grade / class registered with Central Government / MES / Railways through On-line in the Govt. website www.tendersodisha.gov.in. The bidders should have necessary portal enrolment (with own Digital Signature Certificate). The registered bidders outside of Odisha State can also participate in this on-line tender process after necessary portal enrolment but shall have subsequently undergo registration with appropriate authority of the Odisha State Govt. before signing of the agreement. The bidders registered outside the State are required to submit an undertaking in the form of an affidavit, that they are not registered under the GST Act 2017 in the State of Odisha as they have not started any business in the State and they have no liabilities under the Act. But successful bidder has to produce GSTIN Registration before signing of agreement. The bidders may submit their bids for the following works.

SL. No.	Bid Identification No.	Name of work	Value of works (Rupees) Excluding GST	Cost of Bid Document (in Rs.) Non-Refundable	EMD Amount (Bid Security) in Rs.	Period of Completion	Date of availability and receipt of tender paper	Class of Contractor
1	2	3	4	5	6	7	8	9
1	EEMDD-03(01/03)/2026-27	"Annual Maintenance of Muran Masonry and Concrete Dam by cleaning of dam top, removal of calcination debris, silt and muck from galleries, painting of iron grills and sign boards, and cleaning of the periphery of Muran Dam under UIDC, Khatiguda."	Rs. 11,25,353 /-	Rs. 6,000/-	Rs. 11,300 /-	12 (Twelve) Calendar Months	From 14.08.2026 (11:00 A.M) to 24.08.2026 up to (5.00 PM)	"C" & "D"
2	EEMDD-03(02/03)/2026-27	"Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."	Rs. 5,78,141 /-	Rs. 4,000/-	Rs. 5,800 /-	12 (Twelve) Calendar Months	From 14.08.2026 (11:00 A.M) to 24.08.2026 up to (5.00 PM)	"C" & "D"
3	EEMDD-03(03/03)/2026-27	"Improvement to the damaged Bituminous approach Road on left Flank of Muran Dam under UIDC, Khatiguda."	Rs. 34,99,510 /-	Rs. 6,000 /-	Rs. 35,000 /-	03 (Three) Calendar Months	From 14.08.2026 (11:00 A.M) to 24.08.2026 up to (5.00 PM)	"B" & "C"

2. **Procurement Details:** Period of availability of tender On-line/ date of time of bidding on-line/ date of opening of tender paper: Details as follows

(i)	Procurement officer	:	Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.
(ii)	Bid Identification No.	:	e-procurement Notice No.- EEMDD-03 (03) /2026-27
(iii)	Availability of bid documents in the portal	:	14.08.2026(11:00 A.M.) to 24.08.2026 (05:00 P.M.)
(iv)	Receipt of bids on-line in the portal	:	14.08.2026(11:00 A.M.) to 24.08.2026 (05:00 P.M.)
(v)	Date & Place of Opening of the bids on-line (Both Technical & Financial Bid of the works)	:	Date: 25.08.2026 (11:00 A.M.) Place: O/o Executive Engineer, Muran Dam Division, Khatiguda.

PARTICULARS OF TENDER (01/03)

1.	Name of work	:	"Annual Maintenance of Muran Masonry and Concrete Dam by cleaning of dam top, removal of calcination debris, silt and muck from galleries, painting of iron grills and sign boards, and cleaning of the periphery of Muran Dam under UIDC, Khatiguda."		
2.	Class of contractor	:	“C” & “D” Class (Odisha PWD or equivalent class of other licensing authority).		
3.	Value of work.	:	Rs. 11,25,353 /- (Excluding GST)		
4.	Time for Completion	:	12 (Twelve) Calendar Months		
5.	Cost of tender Paper	:	Rs. 6,000/- (non-refundable) should transfer through online payment mode / payment gateway of designated Bank. The scanned copy of Electronic Receipt of Paper cost amounting to Rs. 6,000/- will be uploaded in website at the time of submission of Bid.		
6.	EMD required	:	Bid must be accompanied by security amount of Rs. 11,300/- duly transferred through online payment mode / payment gateway of designated Bank. The scanned copy of Electronic Receipt of E.M.D. will be uploaded in website at the time of submission of Bid with the tender paper.		
7.	Mode of transmission of tender.	:	Tender should be submitted On-line in the web site www.tendersodisha.gov.in		
8.	Period of availability of tenders On-line / date and time of Bidding On-line / Last date of seeking clarification (14.08.2026 to 17.08.2026) /date of opening of tender papers.: Details as follows.				
Procurement officer		Bid Identification No.	Availability of tender On – line for Bidding.		Date & place of opening of Both Technical & Financial Bid online.
			From	To	
1		2	3	4	5
Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.		e-Procurement Notice No. EEMDD-03(03)/2026-27	14.08.2026 (11.00 A.M)	24.08.2026 (05.00 P.M.)	25.08.2026 (11:00 A.M.) O/o Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.

PARTICULARS OF TENDER (02/03)

1.	Name of work	:	"Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."		
2.	Class of contractor	:	“C” & “D” Class (Odisha PWD or equivalent class of other licensing authority).		
3.	Value of work.	:	Rs. 5,78,141 /- (Excluding GST)		
4.	Time for completion	:	12 (Twelve) Calendar Months		
5.	Cost of tender paper	:	Rs. 4,000/- (non-refundable) should transfer through online payment mode / payment gateway of designated Bank. The scanned copy of Electronic Receipt of Paper cost amounting to Rs. 4,000/- will be uploaded in website at the time of submission of Bid.		
6.	EMD required	:	Bid must be accompanied by security amount of Rs. 5,800/- duly transferred through online payment mode / payment gateway of designated Bank. The scanned copy of Electronic Receipt of E.M.D. will be uploaded in website at the time of submission of Bid with the tender paper.		
7.	Mode of transmission of tender.	:	Tender should be submitted On-line in the web site www.tendersodisha.gov.in		
8.	Period of availability of tenders On-line / date and time of Bidding On-line / Last date of seeking clarification (14.08.2026 to 17.08.2026) /date of opening of tender papers.: Details as follows.				
Procurement officer		Bid Identification No.	Availability of tender On – line for Bidding.		Date & place of opening of Both Technical & Financial Bid online.
			From	To	
1		2	3	4	5
Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.		e-Procurement Notice No. EEMDD-03(03)/2026-27	14.08.2026 (11.00 A.M)	24.08.2026 (05.00 P.M.)	25.08.2026 (11:00 A.M.) O/o Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.

PARTICULARS OF TENDER (03/03)

1.	Name of work	:	"Improvement to the damaged Bituminous approach Road on left Flank of Muran Dam under UIDC, Khatiguda."	
2.	Class of contractor	:	"B" & "C" Class (Odisha PWD or equivalent class of other licensing authority).	
3.	Value of work.	:	Rs. 34,99,510 /- (Excluding GST)	
4.	Time for completion	:	03 (Three) Calendar Months	
5.	Cost of tender paper	:	Rs. 6,000/- (non-refundable) should transfer through online payment mode / payment gateway of designated Bank. The scanned copy of Electronic Receipt of Paper cost amounting to Rs. 6,000/- will be uploaded in website at the time of submission of Bid.	

6.	EMD required	:	Bid must be accompanied by security amount of Rs. 35,000/- duly transferred through online payment mode / payment gateway of designated Bank. The scanned copy of Electronic Receipt of E.M.D. will be uploaded in website at the time of submission of Bid with the tender paper.		
7.	Mode of transmission of tender.	:	Tender should be submitted On-line in the web site <u>www.tendersodisha.gov.in</u>		
8.	Period of availability of tenders On-line / date and time of Bidding On-line / Last date of seeking clarification (14.08.2026 to 17.08.2026) /date of opening of tender papers.: Details as follows.				
Procurement officer		Bid Identification No.	Availability of tender On – line for Bidding.		Date & place of opening of Both Technical & Financial Bid online.
			From	To	
1		2	3	4	5
Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.		e-Procurement Notice No. EEMDD-03(03)/2026-27	14.08.2026 (11.00 A.M)	24.08.2026 (05.00 P.M.)	25.08.2026 (11:00 A.M.) O/o Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.

The Bidder must possess **Compatible Digital Signature Certificate (DSC)**. Bids shall be submitted only on “On-line” from **Dt. 14.08.2026, 11.00 AM to Dt. 24.08.2026, 5:00 PM** for the work. mentioned in the above table in the Office of the Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha. Bid shall be opened/downloaded on **Dt. 25.08.2026 at 11:00 AM** in the office of the Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha in presence of Tender Evaluation Committee Members & Bidders or their authorized representatives who wish to attend, if download of uploaded documents did not complete in same day, it will continue to next day. Bidders who participate in the bid can witness the opening of bids after logging on to the site through their DSC. If it happens to be a holiday on the stipulated date of opening of Bids as specified, the bids will be opened on the next working day at the same time and venue.

3. **Date of Clarification:** The bidders desire of participating in the tender can seek clarification through on-line from **Dt. 14.08.2026 to Dt. 17.08.2026** during office hour. The official e-mail Id of the Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha is eemurandamdivision@gmail.com
For any other modification in the above tender, if required, under unavoidable circumstances, necessary corrigendum to the tender will be made available in the websites: www.tendersodisha.gov.in .
4. Bid document consisting of qualification, information and eligibility criteria of bidders, plans, specification and schedule of quantities of the work is available in web site www.tendersodisha.gov.in and the set of terms and conditions of contract and other necessary documents can be seen in the web-site till last date of sale and receipt of tender papers. Interested tenderer may obtain further information at the web site www.tendersodisha.gov.in.
5. Bid validity period of the Tender is for a period of **90 days** from the last date of submission of Bid.
6. No Engineer of Gazette rank or other Gazette officer employed in Engineering or Administrative duties in an Engineering Department of the State Government is allowed to work as a contractor for a period of two years after his retirement from Government service, without Government permission.
7. **Mode of submission of tender:** Tender should be submitted on-line in www.tendersodisha.gov.in .

- A. The bidder has to deposit Cost of Tender Paper (BID Cost) and Earnest Money Deposit (EMD/BID Security) on submission of bids through online only by a process as per works Department office Memorandum vide letter no 17254 Dated 05.12.2017 as mentioned under DTCN which will be carried

out through a single banking transaction by the bidder for multiple payments.

- B. **EMD/BID SECURITY:** The Bidders shall transfer the amount towards EMD (Bid Security) as specified against the work in table Column No.6 through online payment mode / payment gateway of designated Bank. As per memorandum No.17254/ W/ Dtd. 05.12.2017, Memorandum No.1499/ W/ Dtd. 01.02.2023 of Works Department Govt. of Odisha and OM No. WORKS-FA-MISCSB-0003-2026-4909/W, dtd. 12.03.2026.
 - C. **BID COST:** The Bidders shall transfer the amount towards cost of Bid documents as specified against the work in table Column No.5 through online payment mode / payment gateway of designated Bank.
 - D. Designated Banks (**SBI / ICICI Bank / HDFC Bank**) payment gateway is being integrated with e-Procurement portal of Government of Odisha (<https://tendersodisha.gov.in>).
 - E. The Designated Banks participating in Electronic Receipt, Accounting and Reporting of Cost of Tender Paper and Earnest Money Deposit on submission of bids will nominate a Focal Point Branch called e-FPB, who is authorized to collect and collate all e-Receipts. Each such branch will act as the Receiving branch and Focal Point Branch notwithstanding the fact that the bidder might have debited his account in any of the bank's branches while making payment.
 - F. A bidder shall make electronic payment using his/her internet banking enabled account with designated Banks or their aggregator banks. A bidder having account in other Banks can make payment using NEFT/RTGS facility of designated Banks.
 - G. Only those Bidders who successfully remit their cost of Tender paper and Earnest Money Deposit on submission of Bids would be eligible to participate in the tender/ bid process. The Bidders with pending or failure payment status shall not be able to submit their Bid. Tender Inviting Authority (TIA), State Procurement Cell (SPC), National Informatics Centre (NIC), Nodal Officer e-procurement and designated Banks shall not be held responsible for such Pendency and failure.
 - H. Bid submission: Only after receipt of intimation at the e-Procurement portal regarding successful transaction by bidder the system will activate the '**Freeze Bid Submission**' button to conclude the bid submission process System generated acknowledgement receipt for successful bid submission: System will generate an acknowledgement receipt for successful bid submission. The bidder should make a note of '**Bid ID**' generated in the acknowledgement receipt for tracking their bid status.
8. For a particular work a bidder can submit only one tender paper. Submission of more than one tender paper by a bidder for a particular work will be liable for rejection of all such tender.
 9. If more than one bid is quoted (decimal up to two numbers will be taken for all practical purposes), either at the estimated cost put to tender or less than the estimated cost put to tender, the tender accepting Authority will finalize the tender through a transparent lottery system, where all the concerned bidders/their authorized representatives, the concerned SE/EE of the concerned Division and Divisional Accounts Officer (DAO) will remain present.

If Required, Date of lottery will be intimated later for all works of the Notice No EEMDD- 03(03)/2026-27 in office Chamber of the under signed failure to attend the lottery personally or through representative will lose to claim or complain in future regarding the transparency of drawl of the lottery. After the lottery system the eligible bidders are requested to collect their intimation letters in this regard from the Division Office during working hours positively and no claim in future regarding non receipt of intimation letters will be entertained. If the rate quoted by the SC and ST Category Contractors comes to the rate quoted by the L1 bidder (decimal up to two numbers will be taken for all practical purposes) after availing 10% price preference as per Para 2 of Works Department Resolution No. 27748 dated. 11.10.1977, the tender shall be finalized by the tender accepting authority through a transparent lottery system along with other categories of contractors.

- A. The successful bidder will have to be produced labour license within 15 days of receipt of the work order/ Letter of acceptance.

10. In pursuance to the Govt. of Odisha Works Dept. Office Memorandum No. 4559 dt: 05.04.2021, **Additional Performance Security** shall be obtained from the bidder when the bid amount is less than the estimated cost put to tender. In such an event, only the successful bidder who has quoted less bid price / rates than the estimated cost put to tender shall have to furnish the APS in the rates as noted below:

- Amended vide O.M. No.173 Dt.03.01.2026 & O.M. No.632 dtd.09.01.2026 of Works Dept., Govt. of Odisha to fix the following rate of Additional Performance Security (APS).

Sl. No.	Range of difference between the estimated cost put to tender and Bid amount	Additional performance Security to be deposited by the successful Bidder
1	Below 0.0 % but not below 10.00%	No additional Performance Security
2	Below 10.00% and not below 20.00%	The Additional Performance Guarantee/ Security percentage shall be incremented by 0.1% for every percentage of bid price below 10% of the project cost put to bid starting at 11% with the additional bid performance guarantee being 0.1% and this additional performance guarantee percentage shall be applied on the bid price.
3	Below 20%	The additional performance guarantee percentage shall be incremented by 0.2% for every percentage of bid price below 20% of the project cost put to bid in addition to 1% of the bid price and this additional performance guarantee percentage shall be applied on the bid price.

- The additional performance guarantee percentage shall be rounded off to the next lower percentage based on whether the decimal point of the percentage of bid price is below 0.5% or next higher percentage based on whether the decimal point of the percentage of bid price is 0.5% or more.
- The additional performance security shall be treated as part of the performance security.
- Justification for abnormally low bids shall be scrutinized by the Departmental Technical committee and recommended to the competent authority of the Administrative Department for the approval of the Additional Performance Security (APS). An abnormally low bid is one in which the Bid price, in combination with other elements of the Bid, appears so low that it raises material concerns as to the capability of the Bidder to perform the contract at the offered price. Procuring Entity may, in such cases, seek written clarifications from the Bidder, including detailed price analyses of its Bid price in relation to scope, schedule, resource mobilization, allocation of risks and responsibilities, and any other requirements of the bid document. If, after evaluating the price analyses, the procuring entity determines that the Bidder has substantially failed to demonstrate its capability to deliver the contract at the offered price, the Procuring Entity may reject the Bid/Proposal. However, it would not be advisable to fix a normative percentage below the estimated cost, which would automatically be considered as an abnormally low bid.

Additional Performance Security shall be obtained from the successful bidder in shape of Term Deposit Receipt/ Bank guarantee from any Nationalized Bank, pledged in favour of The Executive Engineer, Muran Dam Division, Khatiguda within seven days of issue of letter of acceptance (LoA) by the Divisional Officer (By e-mail) to the successful bidder otherwise his/her bid shall be cancelled and the Earnest Money Deposit (Bid Security) shall be forfeited. Further proceeding for blacklisting shall be initiated against bidder Vide the Works Department, Govt of Odisha Office Memorandum No. 14459/W Dated 20.09.2018.

Note: - After evaluation of price bid, abnormally low bids have to submit the above-mentioned data specified in Clause VI within 15 days of receipt of letter by the Divisional Officer (By Mail) to the bidders,

if fails to submit the mentioned document, the bid is liable for rejection.

11. **On-line Submission of Documents:** - The bidders are required to upload the documents (1) Acknowledge of online deposit of EMD & Tender paper cost, (2) C.R.C. (Contractor Registration certificate), (3) PAN Card, (4) GSTIN Registration Certificate, (5) Original Affidavit regarding authentication of documents with no adverse certificate (*Annexure- 'A'*), (6) Information regarding current litigation debarring expelling of tendered or abandonment of work by the tenderer. (*Annexure- 'B'*), (7) Affidavit towards exemption of EMD in case of Engineering Contractor, (8) Certificate for Price preference in case of SC / ST Contractor with valid caste certificate, (9) No Relation Certificate (*Annexure- 'C'*), (10) Tender Document along with other required documents etc. should be uploaded through web site following the DTCN instructions failing which the bid will be rejected.
12. No Relation Certificate: The Bidders shall have to furnish a certificate along with the Tender to the effect that he / she is not related to any officer/ Water Resources Department in the rank of Asst. Engineer and above connected with the estimate, Tender and execution of work and any officer in the rank of Under Secretary or above.
13. Bidders registered as "Engineer Contractors" will have to upload affidavit exemption as per OPWD to avail exemption of E.M.D. for participating in bid shall have to upload an affidavit for not having availed this facility. In such case, the successful Engineer Contractor has to produce the original Registration Certificate for recording the fact of availing exemption of E.M.D. as per rules.
14. Bidders registered as S.C. & S.T. Contractors desiring to avail concession(s) / price preference as per prevailing rules should upload necessary document in support of their claim along with their bid.
15. If the successful bidder withdraws the Bid during the validity period of Bid / if he fails to submit ISD as specified in instructions to bidder or if he doesn't turn up for agreement after finalization of the tender, he shall be **debarred from participation in the bidding for three years** & action will be taken to black list the contractor.
16. **The bidders have to furnish the scanned copy of Contractors Registration Certificate, EMD, GST, PAN Card, and Original Affidavits, including all required papers as mentioned serial-11 should be uploaded in web-site portal. All uploaded original documents may also be submitted to the Executive Engineer, Muran Dam Division, Khatiguda, Dist.-Nabarangpur as and when required for verification before drawl of agreement. The bidder should mention his present Postal Address, e-mail id and Mobile Number in the Affidavit submitted with the tender. If the bidder found to have mislead the evaluation through wrong information, action will be taken up as per Codal procedure.**
17. The successful bidder is required to register his establishment under section-7 of the building & other construction workers (R.E.& C.S.) act 1996 & is liable to pay cess there of as per labour and employment Department Lr no 3757 Date 25/04/2009. 1% (One Percent) of gross bill of the bidder will be deducted towards labour cess over and above the usual deduction.
18. **The bidder must get registered under ODISHA G.S.T Act 2017.** He shall liable to follow the rules of Odisha GST Act 2017 strictly. GST as applicable (Presently TDS- 2%) on the gross amount of the bill will be deducted from the contractor's bill while making payment, where agreement value exceeds rupees two lakh fifty thousand only. The contractor should submit commercial invoice at the time of preparation of the work bill to the concerned Junior Engineer with a copy to the Divisional Office for enabling the Division to make necessary payment, failing which no GST payment can be made. Amendment to Para 3.5.13 and Rule 29 of Appendix-IX of OPWD Code Vol.-I: - The single tender received in the first call shall be cancelled without opening of the bid and fresh tender will be invited, as per office memorandum No.16 dated 01.01.2015 of Works Department, Govt. of Odisha.
19. The modalities prescribed in this Office Memorandum for downloading of tender paper, submission and rejection of bid, acceptance of Bids will be applicable for electronic submission of bids through e-procurement portal. Existing provisions regulating cost of Tender Paper in OPWD Code and OGFR would stand modified to the extent prescribed in this Office Memorandum no.17254 dated: 05.12.2017.

20. Authority will not be held responsible for system failure, malfunction of internet or traffic jam. Bidders are advised to submit their bids well in advance within the stipulated period.
21. The contractor shall have to furnish a certificate along with the tender to the effect that he / she is not related to any officer of Water Resources Department in the rank of Asst. Engineer and above connected with the estimate, tender and execution of the work and any officer in the rank of Under Secretary or above.
22. **EMD & ISD:** Successful bidder will have to submit (EMD @ 1% & ISD @ 1%), Total @ 2% of his/her quoted/negotiated/contract value for the work in shape of N.S.C./ Post Office Savings Bank Account/Post Office Time Deposit Account/ Kisan Vikas Patra Bank Guarantee in favour of the Divisional Officer from any Nationalized Scheduled Bank in India counter guaranteed by its local Branch at Bhubaneswar/ e-Bank Guarantee executed on the National e-Governance Services Limited (NeSL) Digital Document Execution Portal/ Insurance Surety Bond issued by an Insurance Company authorized by the Insurance Regulatory and Development Authority of India (IRDAI) pledged in favour of **The Executive Engineer, Muran Dam Division, Khatiguda, Dist.: Nabarangpur** before concluding the agreement.
23. **Legal Dispute:** If any discrepancy is found after opening of the bid, the Tender Inviting Authority may ask such bidder to furnish the information of documents as required within 5 (five) days. Legal dispute if any arises shall be subject to the jurisdiction of competent Court within Nabarangpur District.
24. The general instruction to the contractors as per Govt. of Odisha, DOWR Lr. No.20415 dated: 14.09.2015 is applicable for all bidders.
25. The bidders shall have to upload an affidavit in support of authenticity of documents/ credential accompanied with the bid failing which the bid will be rejected.
26. As per OPWD code **clause 12.4 (Appendix-IX (A))** the contractors participated in the above tender mandated to **register themselves in Contractor Data Base Management System (CDMS) available at www.cdmsodisha.gov.in.**
27. All the existing provisions of OPWD code with amendment from time to time will be applicable in deciding the tender.
28. Other details can be seen in the bidding documents, which is available in website www.tendersodisha.gov.in
29. The authority reserves the right to accept or reject any or all the Tenders without assigning any reason thereof.
30. No Bidder will be permitted to furnish his Bid in his own manuscript.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No.: 1150/WE**/Dated: 07.08.2026**

Copy along with Tender Call Notice submitted to the Deputy Director (Publication), Public Relation Department, Govt. of Odisha, Bhubaneswar for information and necessary action. Necessary News Paper Publication of above e-TCN may be done for wide circulation in **Two Odia Daily Leading Local News Paper and One Local English News Paper** in one of its issues. A complimentary copy of the same may be sent to this office for making necessary payment.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No.: 1151**/Dated: 07.08.2026**

Copy submitted to the Engineer-in-Chief, (W.R.) Odisha Bhubaneswar for favour of kind information.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No.: 1152**/Dated: 07.08.2026**

Copy submitted to the Chief Engineer & Basin Manager, Indravati & Kolab Basin, Bariniput, Jeypore (K) for favour of kind information.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No.: 1153**/Dated: 07.08.2026**

Copy submitted to the Additional Chief Engineer, UIDC, Khatiguda for favour of kind information.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No.: 1154 (7)**/Dated: 07.08.2026**

Copy submitted to the Collector & District Magistrate, Nabarangpur / Sub-Collector Nabarangpur / Superintendent of Police, Nabarangpur/ SDPO, Nabarangpur / IIC, Khatiguda Police Station / B.D.O., Tentulikhunti / Tahsildar, Tentulikhunti for information and wide circulation.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No.: 1155**/Dated: 07.08.2026**

Copy submitted to Superintending Engineer, Quality Assurance Division, Bariniput, Jeypore for favour of information.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No.: 1156 (2)**/Dated: 07.08.2026**

Copy submitted to Executive Engineer, Podagada Dam Division / Executive Engineer, Mechanical Division, Khatiguda for favour of information.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No.: 1157 (9)**/Dated: 07.08.2026**

Copy to All SDOs of this Division/ Head Clerk / Estimator / Cashier / Auditor / Notice Board of this Office for information and wide circulation.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

Memo No: 1158**/Dated: 07.08.2026**

Copy to Sri Sakeri Chidananda (JE) for information and necessary action. He is directed to proceed to I&PR Department, Bhubaneswar for publication of the same Notice, as mentioned in the above.

Sd/-

**Executive Engineer
Muran Dam Division
Khatiguda**

SECTION – 1

DETAILED TENDER CALL NOTICE

- The Executive Engineer, Muran Dam Division, Khatiguda, Dist.: Nabarangpur, on behalf of Hon'ble Governor of Odisha invites on-line **Percentage Rate bid** through e-procurement in **Single Cover System** for the works as mentioned below, through website in the prescribed form to be eventually drawn in P.W.D. Form No. P1 (Percentage Rate of Tender). The bid should be submitted by the eligible class of contractors as mentioned below registered with State Governments & contractors of equivalent grade / class registered with Central Government / MES / Railways through On-line in the Govt. website www.tendersodisha.gov.in. The bidders should have necessary portal enrolment (with own Digital Signature Certificate). The registered bidders outside of Odisha State can also participate in this on-line tender process after necessary portal enrolment but shall have subsequently undergo registration with appropriate authority of the Odisha State Govt. before signing of the agreement. The bidders registered outside the State are required to submit an undertaking in the form of an affidavit, that they are not registered under the GST Act 2017 in the State of Odisha as they have not started any business in the State and they have no liabilities under the Act. But successful bidder has to produce GSTIN Registration before signing of agreement. The bidders may submit their bids for the following works.

SL. No.	Bid Identification No.	Name of work	Value of works (Rupees) Excluding GST	Cost of Bid Document (in Rs.) Non-Refundable	EMD Amount (Bid Security) in Rs.	Period of Completion	Date of availability and receipt of tender paper	Class of Contractor
1	2	3	4	5	6	7	8	9
2	EEMDD-03(0 2 / 0 3) /2026-27	"Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."	Rs. 5,78,141 /-	Rs. 4,000/-	Rs. 5,800 /-	12 (Twelve) Calendar Months	From 14.08.2026 (11:00 A.M) to 24.08.2026 up to (5.00 PM)	"C" & "D"

- Procurement Details:** Period of availability of tender On-line/ date of time of bidding on-line/ date of opening of tender paper: Details as follows

(i)	Procurement officer	:	Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.
(ii)	Bid Identification No.	:	e-procurement Notice No.- EEMDD-0 3 (0 3) /2026-27
(iii)	Availability of bid documents in the portal	:	14.08.2026(11:00 A.M.) to 24.08.2026 (05:00 P.M.)
(iv)	Receipt of bids on-line in the portal	:	14.08.2026(11:00 A.M.) to 24.08.2026 (05:00 P.M.)
(v)	Date & Place of Opening of the bids on-line (Both Technical & Financial Bid of the works)	:	Date: 25.08.2026 (11:00 A.M.) Place: O/o Executive Engineer, Muran Dam Division, Khatiguda.

PARTICULARS OF TENDER (01/03)

1.	Name of work	:	"Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."		
2.	Class of contractor	:	“C” & “D” Class (Odisha PWD or equivalent class of other licensing authority).		
3.	Value of work.	:	Rs. 5,78,141 /- (Excluding GST)		
4.	Time for Completion	:	12 (Twelve) Calendar Months		
5.	Cost of tender Paper	:	Rs. 4,000/- (non-refundable) should transfer through online payment mode / payment gateway of designated Bank. The scanned copy of Electronic Receipt of Paper cost amounting to Rs. 4,000/- will be uploaded in website at the time of submission of Bid.		
6.	EMD required	:	Bid must be accompanied by security amount of Rs. 5,800/- duly transferred through online payment mode / payment gateway of designated Bank. The scanned copy of Electronic Receipt of E.M.D. will be uploaded in website at the time of submission of Bid with the tender paper.		
7.	Mode of transmission of tender.	:	Tender should be submitted On-line in the web site www.tendersodisha.gov.in		
8.	Period of availability of tenders On-line / date and time of Bidding On-line / Last date of seeking clarification (14.08.2026 to 17.08.2026) /date of opening of tender papers.: Details as follows.				
Procurement officer		Bid Identification No.	Availability of tender On – line for Bidding.		Date & place of opening of Both Technical & Financial Bid online.
			From	To	
1		2	3	4	5
Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.		e-Procurement Notice No. EEMDD-03(03)/2026-27	14.08.2026 (11.00 A.M)	24.08.2026 (05.00 P.M.)	25.08.2026 (11:00 A.M.) O/o Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha.

The Bidder must possess **Compatible Digital Signature Certificate (DSC)**. Bids shall be submitted only on "On-line" from **Dt. 14.08.2026, 11.00 AM to Dt. 24.08.2026, 5:00 PM** for the work. mentioned in the above table in the Office of the Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha. Bid shall be opened/downloaded on **Dt. 25.08.2026 at 11:00 AM** in the office of the Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha in presence of Tender Evaluation Committee Members & Bidders or their authorized representatives who wish to attend, if download of uploaded documents did not complete in same day, it will continue to next day. Bidders who participate in the bid can witness the opening of bids after logging on to the site through their DSC. If it happens to be a holiday on the stipulated date of opening of Bids as specified, the bids will be opened on the next working day at the same time and venue.

3. **Date of Clarification:** The bidders desire of participating in the tender can seek clarification through on-line from **Dt. 14.08.2026 to Dt. 17.08.2026** during office hour. The official e-mail Id of the Executive Engineer, Muran Dam Division, Khatiguda, Dist. Nabarangpur, Odisha is eemurandamdivision@gmail.com
For any other modification in the above tender, if required, under unavoidable circumstances, necessary corrigendum to the tender will be made available in the websites: www.tendersodisha.gov.in .

4. Bid document consisting of qualification, information and eligibility criteria of bidders, plans, specification and schedule of quantities of the work is available in web site www.tendersodisha.gov.in and the set of terms and conditions of contract and other necessary documents can be seen in the web-site till last date of sale and receipt of tender papers. Interested tenderer may obtain further information at the web site www.tendersodisha.gov.in.
5. Bid validity period of the Tender is for a period of **90 days** from the last date of submission of Bid.
6. No Engineer of Gazette rank or other Gazette officer employed in Engineering or Administrative duties in an Engineering Department of the State Government is allowed to work as a contractor for a period of two years after his retirement from Government service, without Government permission.
7. **Mode of submission of tender:** Tender should be submitted on-line in www.tendersodisha.gov.in .
 - a. The bidder has to deposit Cost of Tender Paper (BID Cost) and Earnest Money Deposit (EMD/BID Security) on submission of bids through online only by a process as per works Department office Memorandum vide letter no 17254 Dated 05.12.2017 as mentioned under DTCN which will be carried out through a single banking transaction by the bidder for multiple payments.
 - b. **EMD/BID SECURITY:** The Bidders shall transfer the amount towards EMD (Bid Security) as specified against the work in table Column No.6 through online payment mode / payment gateway of designated Bank. As per memorandum No.17254/ W/ Dtd. 05.12.2017, Memorandum No.1499/ W/ Dtd. 01.02.2023 of Works Department Govt. of Odisha and OM No. WORKS-FA-MISCSB-0003-2026-4909/W, dtd. 12.03.2026.
 - c. **BID COST:** The Bidders shall transfer the amount towards cost of Bid documents as specified against the work in table Column No.5 through online payment mode / payment gateway of designated Bank.
 - d. Designated Banks (**SBI / ICICI Bank / HDFC Bank**) payment gateway is being integrated with e-Procurement portal of Government of Odisha (<https://tendersodisha.gov.in>).
 - e. The Designated Banks participating in Electronic Receipt, Accounting and Reporting of Cost of Tender Paper and Earnest Money Deposit on submission of bids will nominate a Focal Point Branch called e-FPB, who is authorized to collect and collate all e-Receipts. Each such branch will act as the Receiving branch and Focal Point Branch notwithstanding the fact that the bidder might have debited his account in any of the bank's branches while making payment.
 - f. A bidder shall make electronic payment using his/her internet banking enabled account with designated Banks or their aggregator banks. A bidder having account in other Banks can make payment using NEFT/RTGS facility of designated Banks.
 - g. Only those Bidders who successfully remit their cost of Tender paper and Earnest Money Deposit on submission of Bids would be eligible to participate in the tender/ bid process. The Bidders with pending or failure payment status shall not be able to submit their Bid. Tender Inviting Authority (TIA), State Procurement Cell (SPC), National Informatics Centre (NIC), Nodal Officer e-procurement and designated Banks shall not be held responsible for such Pendency and failure.
 - h. Bid submission: Only after receipt of intimation at the e-Procurement portal regarding successful transaction by bidder the system will activate the '**Freeze Bid Submission**' button to conclude the bid submission process System generated acknowledgement receipt for successful bid submission: System will generate an acknowledgement receipt for successful bid submission. The bidder should make a note of '**Bid ID**' generated in the acknowledgement receipt for tracking their bid status.
8. For a particular work a bidder can submit only one tender paper. Submission of more than one tender paper by a bidder for a particular work will be liable for rejection of all such tender.
9. If more than one bid is quoted (decimal up to two numbers will be taken for all practical purposes), either at the estimated cost put to tender or less than the estimated cost put to tender, the tender accepting Authority will finalize the tender through a transparent lottery system, where all the concerned bidders/their authorized

representatives, the concerned SE/EE of the concerned Division and Divisional Accounts Officer (DAO) will remain present.

If Required, Date of lottery will be intimated later for all works of the Notice No EEMDD- 03(03)/2026-27 in office Chamber of the under signed failure to attend the lottery personally or through representative will lose to claim or complain in future regarding the transparency of drawl of the lottery. After the lottery system the eligible bidders are requested to collect their intimation letters in this regard from the Division Office during working hours positively and no claim in future regarding non receipt of intimation letters will be entertained. If the rate quoted by the SC and ST Category Contractors comes to the rate quoted by the L1 bidder (decimal up to two numbers will be taken for all practical purposes) after availing 10% price preference as per Para 2 of Works Department Resolution No. 27748 dated. 11.10.1977, the tender shall be finalized by the tender accepting authority through a transparent lottery system along with other categories of contractors.

- a. The successful bidder will have to be produced labour license within 15 days of receipt of the work order/ Letter of acceptance.

10. In pursuance to the Govt. of Odisha Works Dept. Office Memorandum No. 4559 dt: 05.04.2021, **Additional Performance Security** shall be obtained from the bidder when the bid amount is less than the estimated cost put to tender. In such an event, only the successful bidder who has quoted less bid price / rates than the estimated cost put to tender shall have to furnish the APS in the rates as noted below:

- Amended vide O.M. No.173 Dt.03.01.2026 & O.M. No.632 dtd.09.01.2026 of Works Dept., Govt. of Odisha to fix the following rate of Additional Performance Security (APS).

Sl. No.	Range of difference between the estimated cost put to tender and Bid amount	Additional performance Security to be deposited by the successful Bidder
1	Below 0.0 % but not below 10.00%	No additional Performance Security
2	Below 10.00% and not below 20.00%	The Additional Performance Guarantee/ Security percentage shall be incremented by 0.1% for every percentage of bid price below 10% of the project cost put to bid starting at 11% with the additional bid performance guarantee being 0.1% and this additional performance guarantee percentage shall be applied on the bid price.
3	Below 20%	The additional performance guarantee percentage shall be incremented by 0.2% for every percentage of bid price below 20% of the project cost put to bid in addition to 1% of the bid price and this additional performance guarantee percentage shall be applied on the bid price.

- The additional performance guarantee percentage shall be rounded off to the next lower percentage based on whether the decimal point of the percentage of bid price is below 0.5% or next higher percentage based on whether the decimal point of the percentage of bid price is 0.5% or more.
- The additional performance security shall be treated as part of the performance security.
- Justification for abnormally low bids shall be scrutinized by the Departmental Technical committee and recommended to the competent authority of the Administrative Department for the approval of the Additional Performance Security (APS). An abnormally low bid is one in which the Bid price, in combination with other elements of the Bid, appears so low that it raises material concerns as to the capability of the Bidder to perform the contract at the offered price. Procuring Entity may, in such cases, seek written clarifications from the Bidder, including detailed price analyses of its Bid price in relation to scope, schedule, resource mobilization, allocation of risks and responsibilities, and any other requirements of the bid document. If, after evaluating the price analyses, the procuring entity determines that the Bidder has substantially failed to demonstrate its

capability to deliver the contract at the offered price, the Procuring Entity may reject the Bid/Proposal. However, it would not be advisable to fix a normative percentage below the estimated cost, which would automatically be considered as an abnormally low bid.

Additional Performance Security shall be obtained from the successful bidder in shape of Term Deposit Receipt/ Bank guarantee from any Nationalized Bank, pledged in favour of The Executive Engineer, Muran Dam Division, Khatiguda within seven days of issue of letter of acceptance (LoA) by the Divisional Officer (By e-mail) to the successful bidder otherwise his/her bid shall be cancelled and the Earnest Money Deposit (Bid Security) shall be forfeited. Further proceeding for blacklisting shall be initiated against bidder Vide the Works Department, Govt of Odisha Office Memorandum No. 14459/W Dated 20.09.2018.

Note: - After evaluation of price bid, abnormally low bids have to submit the above-mentioned data specified in Clause VI within 15 days of receipt of letter by the Divisional Officer (By Mail) to the bidders, if fails to submit the mentioned document, the bid is liable for rejection.

11. **On-line Submission of Documents:** - The bidders are required to upload the documents (1) Acknowledge of online deposit of EMD & Tender paper cost, (2) C.R.C. (Contractor Registration certificate), (3) PAN Card, (4) GSTIN Registration Certificate, (5) Original Affidavit regarding authentication of documents with no adverse certificate (*Annexure- 'A'*), (6) Information regarding current litigation debarring expelling of tendered or abandonment of work by the tenderer. (*Annexure- 'B'*), (7) Affidavit towards exemption of EMD in case of Engineering Contractor, (8) Certificate for Price preference in case of SC / ST Contractor with valid caste certificate, (9) No Relation Certificate (*Annexure- 'C'*), (10) Tender Document along with other required documents etc. should be uploaded through web site following the DTCN instructions failing which the bid will be rejected.
12. **No Relation Certificate:** The Bidders shall have to furnish a certificate along with the Tender to the effect that he / she is not related to any officer/ Water Resources Department in the rank of Asst. Engineer and above connected with the estimate, Tender and execution of work and any officer in the rank of Under Secretary or above.
13. Bidders registered as "Engineer Contractors" will have to upload affidavit exemption as per OPWD to avail exemption of E.M.D. for participating in bid shall have to upload an affidavit for not having availed this facility. In such case, the successful Engineer Contractor has to produce the original Registration Certificate for recording the fact of availing exemption of E.M.D. as per rules.
14. Bidders registered as S.C. & S.T. Contractors desiring to avail concession(s) / price preference as per prevailing rules should upload necessary document in support of their claim along with their bid.
15. If the successful bidder withdraws the Bid during the validity period of Bid / if he fails to submit ISD as specified in instructions to bidder or if he doesn't turn up for agreement after finalization of the tender, he shall be **debarred from participation in the bidding for three years & action will be taken to black list the contractor.**
16. **The bidders have to furnish the scanned copy of Contractors Registration Certificate, EMD, GST, PAN Card, and Original Affidavits, including all required papers as mentioned serial-11 should be uploaded in web-site portal. All uploaded original documents may also be submitted to the Executive Engineer, Muran Dam Division, Khatiguda, Dist.-Nabarangpur as and when required for verification before drawl of agreement. The bidder should mention his present Postal Address, e-mail id and Mobile Number in the Affidavit submitted with the tender. If the bidder found to have mislead the evaluation through wrong information, action will be taken up as per Codal procedure.**
17. The successful bidder is required to register his establishment under section-7 of the building & other construction workers (R.E.& C.S.) act 1996 & is liable to pay cess there of as per labour and employment Department Lr no 3757 Date 25/04/2009. 1% (One Percent) of gross bill of the bidder will be deducted towards labour cess over and above the usual deduction.
18. **The bidder must get registered under ODISHA G.S.T Act 2017.** He shall liable to follow the rules of Odisha GST Act 2017 strictly. GST as applicable (Presently TDS- 2%) on the gross amount of the bill will be deducted from the contractor's bill while making payment, where agreement value exceeds rupees two lakh fifty thousand only. The contractor should submit commercial invoice at the time of preparation of the work bill to the

concerned Junior Engineer with a copy to the Divisional Office for enabling the Division to make necessary payment, failing which no GST payment can be made. Amendment to Para 3.5.13 and Rule 29 of Appendix-IX of OPWD Code Vol.-I: - The single tender received in the first call shall be cancelled without opening of the bid and fresh tender will be invited, as per office memorandum No.16 dated 01.01.2015 of Works Department, Govt. of Odisha.

19. The modalities prescribed in this Office Memorandum for downloading of tender paper, submission and rejection of bid, acceptance of Bids will be applicable for electronic submission of bids through e-procurement portal. Existing provisions regulating cost of Tender Paper in OPWD Code and OGFR would stand modified to the extent prescribed in this Office Memorandum no.17254 dated: 05.12.2017.
20. Authority will not be held responsible for system failure, malfunction of internet or traffic jam. Bidders are advised to submit their bids well in advance within the stipulated period.
21. The contractor shall have to furnish a certificate along with the tender to the effect that he / she is not related to any officer of Water Resources Department in the rank of Asst. Engineer and above connected with the estimate, tender and execution of the work and any officer in the rank of Under Secretary or above.
22. **EMD & ISD:** Successful bidder will have to submit (EMD @ 1% & ISD @ 1%), Total @ 2% of his/her quoted/negotiated/contract value for the work in shape of N.S.C./ Post Office Savings Bank Account/Post Office Time Deposit Account/ Kisan Vikas Patra Bank Guarantee in favour of the Divisional Officer from any Nationalized Scheduled Bank in India counter guaranteed by its local Branch at Bhubaneswar/ e-Bank Guarantee executed on the National e-Governance Services Limited (NeSL) Digital Document Execution Portal/ Insurance Surety Bond issued by an Insurance Company authorized by the Insurance Regulatory and Development Authority of India (IRDAI) pledged in favour of **The Executive Engineer, Muran Dam Division, Khatiguda, Dist.: Nabarangpur** before concluding the agreement.
23. **Legal Dispute:** If any discrepancy is found after opening of the bid, the Tender Inviting Authority may ask such bidder to furnish the information of documents as required within 5 (five) days. Legal dispute if any arises shall be subject to the jurisdiction of competent Court within Nabarangpur District.
24. The general instruction to the contractors as per Govt. of Odisha, DOWR Lr. No.20415 dated: 14.09.2015 is applicable for all bidders.
25. The bidders shall have to upload an affidavit in support of authenticity of documents/ credential accompanied with the bid failing which the bid will be rejected.
26. As per OPWD code **clause 12.4 (Appendix-IX (A))** the contractors participated in the above tender mandated to **register themselves in Contractor Data Base Management System (CDMS) available at www.cdmsodisha.gov.in**.
27. All the existing provisions of OPWD code with amendment from time to time will be applicable in deciding the tender.
28. Other details can be seen in the bidding documents, which is available in website www.tendersodisha.gov.in
29. The authority reserves the right to accept or reject any or all the Tenders without assigning any reason thereof.
30. No Bidder will be permitted to furnish his Bid in his own manuscript.
31. The bidders are required to bear all the costs associated with preparation and submission of bids. Bids can be made through e-Procurement portal, the cost of bid being ₹4,000/-. Documents to be furnished by the bidder(s) in compliance to the requirement as per **Detailed Tender Call Notice (D.T.C.N.) and Information & Instruction to Bidders(I.I.B.)** will be prepared by him/them & furnished. The bidders shall prepare the documents & upload the scanned document to the portal in appropriate place. The bidders who participated in the on-line bidding can witness opening of the bid from any system logging on to the portal away from opening place. The bids can only be opened by the pre-designated officials after the opening time mentioned in the bid.
32. The value of the work tendered for is **Rs. 5,78,141 /- (Excluding GST)**
33. Bids are to be submitted online.
34. The bidder shall furnish bid security (Earnest Money Deposit) @ 1% of the amount put to bid and cost of bid document through online only. The scanned copy of the acknowledgement of online deposit of Earnest Money Deposit and cost of bid document must be uploaded along with the bid in designated place.

N.B:

- a) No Cheque / Bank draft/ Cash Payment will be accepted as E.M.D.
 - b) Adjustment of E.M.D. submitted previously with other bids shall not to be entertained
35. Bidders registered as “Engineer Contractors” desirous to avail exemption of E.M.D. for participating in bid shall have to upload an affidavit for not having availed this facility. In such case, the successful Engineer Contractor has to produce the original Registration Certificate for recording the fact of availing exemption of E.M.D. as per rules.
 36. The system shall reject submission of any bid through portal after closure of the receipt time. For all purpose the portal time displayed in the system shall be the time to be followed by the bidder.
 37. If a bidder submits more than one bid for a particular work through e- Procurement portal, the system shall consider only the last bid submitted through portal.
 38. During submission of bids through the e-Procurement Portal, the bidder shall only submit single copy of the document. He is required to check the documents uploaded with the requirement asked for in the bid. Only after satisfying that all the documents have been uploaded, he should activate submit button. ***His bids shall not be considered responsive and action as per relevant clause shall be taken if he does not provide the required documents or provided illegible document. Clarity of the documents may be ensured by taking out a sample printing. The bidders are only required to write the name of the work and authority who had issued the notice.***
 39. The Bid must be accompanied by the scanned copy of the Electronic Receipt of Bid security (E.M.D.) @ 1% of the amount put to Bid i.e. **Rs. 5,800/-** as per the terms & conditions laid down in OPWD and in no other form along with the Bid. Bids not accompanied with EMD as specified above shall be liable for rejection.
 40. The Bidder can seek clarification on the Bids as per mentioned NIT of Bids from the A.I.T. (Authority Inviting Tender). The A.I. T’s response will be forwarded through the e-mail ID of the enquirer.
 41. The work is to be completed in all respect **within 12 (Twelve) Calendar Months** from the date of issue of work order.
 42. The bid must be accompanied by the **Bid Security (E.M.D.) @ 1% of the amount put to bid in shape of N.S.C./ Post Office Savings Bank Account/Post Office Time Deposit Account/ Kisan Vikas Patra Bank Guarantee in favour of the Divisional Officer from any Nationalized Scheduled Bank in India counter guaranteed by its local Branch at Bhubaneswar/ e-Bank Guarantee executed on the National e-Governance Services Limited (NeSL) Digital Document Execution Portal/ Insurance Surety Bond issued by an Insurance Company authorized by the Insurance Regulatory and Development Authority of India (IRDAI) towards E.M.D/Initial Security Deposit/ any other security deposit from the contactor or supplier."**
 43. ~~The Bidders are required to furnish evidence of ownership of principal machineries / equipments in section-2 Annexure C & D (duly filled up).~~
 - I. ~~The bidder shall furnish ownership documents for those machineries which he is planning to deploy for the work including the sources with authenticated evidence in conformity with the ownership from whom the additional machineries shall be obtained as per Annexure ‘C’ & ‘D’. It will be sole responsibility of the bidder to provide /use the required machineries. No interruption in whatsoever may be the cause shall be entertained by the Department and no hindrance for the reasons of short availability of Machineries shall be tenable.~~
- ~~II. DELETED~~**
- III. ~~The bidder intending to hire / lease equipments / machineries are required to furnish proof of ownership from the company / person providing equipments / machineries on hire / lease deed should cover the entire period of work. In the event of non submission of above specified documents in proper shape, the bid document will be summarily rejected.~~
 44. A bidder or any of its constituent partners of whose contract for any work has been rescinded or who has abandoned any work in the last three years having the contracted work as in complete prior to the date of the

bid, shall be disqualified.

45. All charges towards quality control test will be borne by the bidder.
46. The security will be refunded after one year on completion of the work in all respect provided the final bill is passed and will not carry any interest. Any defect noticed during the period of one year after the actual date of completion shall be rectified by the contractor at his own cost. Failure to comply such rectification the cost involved to carry out the defective work shall be met from his dues available with Department. (Ref. works Deptt order No. 17823/WE dt. 11.10.2006. The e- procurement portal system shall generate the award of the contract letter and intimate the bidder in his e-mail after acceptance of the agreement.
47. All bids received will remain valid for 90 (Ninety) days from the last date of receipt of bids and validity of bids can also be extended if agreed to by the bids and the Department.
48. Bidder, whose bid is accepted must submit a programme of work immediately after issue of work order for approval of Engineer-in-charge.
49. The date of commencement of the work shall be as notified in work order.
50. The Plans, specifications and scope for the work can be seen from the Govt. website during the online bidding period.
51. The bidder shall carefully study the tentative drawing and specification applicable to the contract and documents which will form as part of the agreement to be entered into by the accepted bidders. The detailed standard specifications for Odisha and other relevant specification and drawings are available for sale. Complaints at a future date stating that the plans and specifications have not been seen by the bidders will not be entertained.
52. Every bidder is expected before quoting his rates to inspect the site of the proposed work. He should also inspect the quarries and locality of the work and satisfy himself about the quality and availability of materials including the medical aids, labour and food stuff etc. In every case the materials must comply with the relevant specifications. The bidder will be deemed to have satisfied himself that the rates quoted by him in the bid will be adequate to complete the work according to the specifications and conditions attached to and that he has taken into account all conditions, difficulties that may be encountered during its progress and to have quoted labour rates and materials, entry tax and other duties, including GSTIN, lead, lifts, delifts, loading and unloading and freight for materials and all other charges necessary for the completion of the work to the entire satisfaction of the Engineer-in- charge of the work and his authorized subordinates. Complaints at future date that the availability of materials, labour or any other factor have been misjudged cannot be entertained. It should be understood clearly that no claim whatsoever will be entertained thereafter on the plea of non-availability of proper quantity and quality of materials including food stuff or for any other.
53. Every bidder should quote a definite percentage rate for the work which will be included in the contract. Tenders containing indefinite terms such as estimated rates or schedules of rates or "item rates" will not be considered. During submission of bids through the e-Procurement Portal, an intelligent Bill of Quantity in Microsoft Excel format shall be made available to the bidder. The bidder shall fill in the percentage rates in figures and should not leave the cell blank. The total amount of the tenders shall be calculated by the system and shall be visible to the bidder.
54. Sample of stone, metal, chips and sand etc. to be used are to be collected and deposited quoting the name of quarry under dated initial of the bidder and A.E in charge in the office of the **SE, Quality Assurance Division, Bariniput, Jeypore** before procurement for testing and acceptance. The conveyance charges will be borne by the contractor.
55. The quoted **percentage rates** should be for finished items of work unless otherwise mentioned in the tender schedule.
56. The percentage rates should be written both in words and figures in up to two decimals and the units in words in case of discrepancy in rates between words and figures the rates written in words will prevail. The tender should show the grand total of the whole tender.
57. During submission of bids through the e-Procurement Portal, the bidder should submit the scanned copy of the documents in the designated locations of the bid. Submission of document shall be affected by using DSC of appropriate class and thus shall be in encrypted form.
58. The bid may not, at the discretion of the competent authority, be considered unless accompanied by scanned attested true copies of PAN card, GST Registration Certificate, Exemption of E.M.D in case of Engineering

contractor & Price Preference in case of SC/ST Contractor. The original certificates are also to be produced at the time of opening of the tender. Copies of PAN Card & GSTIN Clearance certificate given with other tender previously or with other tender on the same day will not be taken into consideration and affidavit towards authentication of documents will not be taken into consideration.

59. The bids containing extraneous condition not covered by the tender call notice are liable for rejection and quotations should be strictly in accordance with the tender call notice, any change in the wording will not be accepted. All the prescribed forms must be filled up in the proper order. Incomplete tender shall be summarily rejected.
60. During submission of bids through the e - procurement Portal, it is allowed to modify the bid. The bidder shall have to log in to the system and resubmit the documents as asked for by the system including the price bid. In doing so, the bids already submitted by the bidder will be removed automatically from the system and the latest bid only will be admitted. But the bidder should avoid modification of bid at the last moment to avoid system failure or malfunction of internet or traffic jam. If the bidder fails to submit his modified bids within the designated time of receipt, the bids already in the system shall be taken for evaluation. During submission of bids through the e- Procurement Portal, withdrawal of bid is allowed. The bidder has to click on the "withdraw" button and record the necessary justification for the same in the space provided. In addition to this, he has to write a letter addressed to the officer inviting the bid and up load the scanned document to portal in respective bid. The system shall not allow any withdrawal after expiry of the closure time of the bid.
61. Items of work not covered by the bid shall be paid at the current schedule of rates of the state and those not covered by the said schedule rates will be paid, on actual analysis approved by the competent authorities.
62. On no account the contract work should be sublet to anybody without the prior approval of the competent authority of the Department. In such an event the contract may be rescinded with penalty as will be deemed proper as per decision of the competent authority.
63. Letters etc. raising and lowering the rates or dealing with any point in connection with the tender will not be considered.
64. Schedule of quantity accompanies tender notice - It shall be definitely understood that the Government does not accept any responsibility for the correctness and completeness of this schedule and this schedule is liable for alternations or omissions, deductions or additions as set forth in the condition of contract and such omission, deductions, additions or alternations shall in no way invalidate the contract and no extra monetary compensation will be entertained.
65. The authority reserves the right to make such increase or decrease in the quantity of items of works mentioned in the schedule attached to the bid as may be considered necessary for the satisfactory completion of the contract work. All such increase or decrease shall in no way invalidate the contract rates. The contractor shall not be entitled for any compensation on this account, except extension of time were considered necessary.
66. The Bidder shall furnish, as part of his Bid, a Bid security in the amount as shown in Bid notice of the table of Invitation of Tender for this particular work. At the time of submission of Bids through the e -Procurement Portal, the Bidder shall scan all the written pages of the Bid security and up load to the system in designated place. The on-line Bidder shall have to deposit the 'Bid security' in original with the designated locations as and when required for verification during processing/evaluation of the tender. The officer inviting the Bid shall not be responsible for any postal delay and / or non-receipt due to any frivolous reasons. Non-submission of copy of Electronic Receipt of Bid security within the specified period shall debar the Bidder from participating in the on-line Bidding system and his portal registration shall be blocked. His name shall also be informed to the registering authority for cancellation of his registration.
67. All taxes, fees, royalties, cess payable under the local rule including GSTIN, Income tax, Entry tax etc. will be borne by the contractor.
68. The earnest money will be retained in the case of successful Bidder and will be dealt with as per the terms and conditions of the O.P.W.D code and will not carry any interest. The earnest money of the unsuccessful Bidder will be refunded on application after the Bid is finally accepted.
69. ~~Bidders desirous to hire machineries or equipments from outside the State are required to furnish 2% (Two percent) of the amount put to tender as bid security. Tender not accompanied with bid security and security for hired machineries as specified above shall be liable for rejection.~~

70. **The Department reserves the right of authority to reject any or all tenders received without assigning any reason whatsoever.**
71. That for the purpose of jurisdiction in the event of any dispute if any the contract would be deemed to have been entered into within the State of Odisha and it is agreed that neither party to the contract will be competent to bring a suit in regard to the matter by this contract at any place outside the state of Odisha.
72. The bidder whose bid is selected for acceptance and who has no fixed deposit with the Govt of Odisha, shall within a period of 07(seven) days/ before concluding agreement upon intimation being given to him of acceptance of his bid make an Initial Security Deposit (ISD) @ 2% of quoted negotiated contract value in shape of N.S.C./ Post Office Savings Bank Account/Post Office Time Deposit Account/ Kisan Vikas Patra Bank Guarantee in favour of the Divisional Officer from any Nationalized Scheduled Bank in India counter guaranteed by its local Branch at Bhubaneswar/ e-Bank Guarantee executed on the National e-Governance Services Limited (NeSL) Digital Document Execution Portal/ Insurance Surety Bond issued by an Insurance Company authorized by the Insurance Regulatory and Development Authority of India (IRDAI) duly pledged in favour of the Executive Engineer, Muran Dam Division, Khatiguda before concluding the agreement and in no other form shall be 2% of the value of the tendered amount and sign agreement in the P.W.D. P1 form for the fulfillment of the contract in the office of the **Executive Engineer, Muran Dam Division, Khatiguda**. During submission of bids through the e-Procurement Portal, the system shall generate the Award of Contract letter and intimate the bidders in his e-mail. The security deposit and the amount withheld according to the provision of P1 agreement shall be retained as security for the due fulfillment of this contract. Failure to enter in to the required agreement and to deposit the security as above shall entail forfeiture of the earnest money. No tender shall be finally accepted until the required amount of security money is deposited. The written agreement to be entered in to between the contractor and the Govt. shall be the foundation of the rights of both the contractor and the Govt. and the contract shall be deemed to be incomplete until the agreement has first been signed by the bidder and then by the proper officer authorized to enter into the contract on behalf of the Govt. The security will be refunded one year after completion of the work and payment of the final bill and will not carry any interest.
73. Under section-12 of contract labour act (Regulation and Abolition Act. 1970) the contractor who undertakes execution of work through labour, should produce valid license from licensing authority of labour department (Labour license).
74. The bidder shall be liable to fully indemnify the department of any compensation under Workmen Compensation Act VIII of 1923 on account of the workmen employed by the contractor and full amount of compensation paid will be recovered from the contractor.
75. Bidders are required to abide by the fair wages clause as introduced by Govt. of Odisha and will not pay less than the fair wages fixed by Govt; to the labourers engaged by him for the work.
76. In case of any complaint by the labourers working about the nonpayment of his wages.
77. As per latest minimum wages Act, the **Executive Engineer** will have the right to investigate and if the contractor is found to be in default, he may recover such amount from the contractor's dues and pay such amount to the labourer directly under intimation to the local Labour Officer of the govt. The decision of the **Executive Engineer** is final and binding on the bidder.
78. The bidder will have to submit to the **Executive Engineer, Muran Dam Division, Khatiguda** monthly return of labourer both skilled and unskilled employed by him on the work.
79. The bidder should keep himself in touch with the Engineer-in-charge for smooth execution of the work and arrange adequate labour depending on the workload and working space available. No claim for detention of labour on any account will be entertained.
80. No compensation will be paid by the department for any damage caused by rain, flood, cyclone, tide or by any other natural calamities during the execution of the work.
81. It should be understood clearly that no claim what-so-ever will be entertained in regard to extra items of work or extra quantity of any item besides estimated amount, unless written order is obtained from the Engineer-in-charge and rates settled before the extra items of work or extra quantity of any item of work is taken up.
82. The bidders shall have to abide by the C.P.W.D. safety code rules introduced by the Govt. of India, Ministry of Works, Housing and Supply in their standing order no.44150 dt. 25.11.1957 which can be seen in the office of the **Executive Engineer, Muran Dam Division, Khatiguda** on working day, during office hours.

83. The bidder shall bear various incidentals sundries and contingencies necessitated by the work in full within the following or similar category.

- a) Rent, Royalties and other charges of materials, entry tax, all other taxes including GST, ferry tolls, conveyance charges and other cost on account of land and building & temporary electric connection to worksite as well as construction of coffer dam, construction of service road, diversion road and its maintenance till completion of work required by the bidder for collection of materials, storage, housing of staff or other purpose of the work. No bidder will however be liable to pay for temporary occupation of land owned by Govt. at the site of the work.
- b) Labour camps or huts necessary to a suitable scale including conservancy and sanitary arrangements there in to the satisfaction of the local health authorities.
- c) Suitable water supply including pipe water supply wherever available for the staff and labour as well as for the work.
- d) Fees and duties levied by the Municipal or Water supply authorities.
- e) Suitable equipment and wearing apparatus for the labour engaged in risky operations and medical aid to the labourer engaged for the work.
- f) Suitable fencing, barriers, signals including paraffin and electric signals where necessary at work and approaches in order to protect public and employees from accident.
- g) Compensation including cost of any suit for injury to persons or property due to neglect of any major precautions also becomes payable due to operation of the workmen compensation Act.
- h) The bidder has to arrange adequate lighting arrangement for the work wherever necessary at his own cost.

84. All preliminary works such as vats, mixing platforms etc; are to be done by the bidder at his own cost. No payment will be made for bench marks, level pillars, profiles, benching and leveling the ground where required. The rates to be quoted should be for finishing items of work inclusive of carriage of all materials and incidental items of work.

85. After the work is finished all surplus materials, & debris should be removed 100 mtrs clear away from the site of the work. Preliminary work such as vats, mixing platforms etc. should be dismantled and all materials removed from the site and premises left neat and clean and this should be inclusive of the rates.

86. If any further necessary information is required, **Executive Engineer** will furnish such, but it must be clearly understood that the tender must be received in order and according to instruction.

87. The work will be commenced after land acquisition, forest & environment clearance, if required. In case of delay in acquisition of land, forest & environment clearance, no compensation will be admissible but extension of time will be allowed.

~~88. The department will have the right to supply at any time in the interest of the work any departmental material to be used in the work and the contractor shall use such materials at the stock issue rate fixed by the Department or market rate whichever is higher.~~

89. Empty cement gunny / HDPE bags shall be returned in good conditions at the department store failing which the cost of the same at the rate of ₹3.95 (Rupees three & paisa ninety-five) only per gunny and ₹4.00 (Rupees four) only per HDPE bag shall be recovered from the contractor. Empty tar / bitumen drums shall be returned in good condition at the departmental store failing which the cost at the rates of ₹142.59 (Rupees one hundred forty two & paisa fifty nine) only per drum and ₹255.33 (Rupees two hundred fifty-five & paisa thirty-three) only per emulsion drum shall be recovered from the contractor.

90. Over and above these conditions including the technical specifications, the terms, conditions, rules and regulations and specification laid down in Odisha Detailed Standard Specification code are also binding on the part of the contractor.

~~91. All intending bidders should furnish the following information in the proforma enclosed.~~

- ~~a) Particulars of each work now in hand (As per Agreement).~~
- ~~b) Performance of each work for last three years as on the date of submission of bids.~~
- ~~c) Approximate value of works remaining on the date of submission of tender.~~

d) ~~List of T & P.s, vehicles, machineries available with him.~~

In case of submission of bids through e-Procurement portal, the bidder shall upload the scanned copy /Copies of documents as required vide clauses of the DTCN & IIT. ~~The online bidder shall drop Original Bid security & Demand Draft towards cost of bid document in sealed envelope in the tender box (Marked for e-Tender.)~~ **The on-line Bidder shall have to produce the original documents in support of scanned copies & statements up-loaded in the portal to the Executive Engineer, Muran Dam Division, Khatiguda, as and when required for verification during processing/evaluation of the tender.**

92. No Relation Certificate:

The bidder shall have to furnish a certificate along with the bid to the effect that he is not related to any officer in the rank of an Asst. Engineer and above in the State P. W.D., or Asst. Secy. and above in the W.R. Department. If the fact of subsequently proved to be false the contract will be rescinded. The earnest money and the total security will be forfeited and shall be liable to make good the loss of damage resulting from such cancellation. The proforma for no relation certificate is contained in a separate sheet of D.T.C.N in **Annexure- 'C'**.

93. The bidder shall sign as a token of final acceptance of the plans, sections and agreements for the work prior to taking up the work for execution.
94. The bidder is to supply necessary labour and materials for the purpose of alignment laying whenever required at his own cost.
95. The bidder should arrange necessary tools and plants such as pumps, Road Rollers etc, required for the efficient execution of work at his own cost. The running charges of such plants and cost of consumables and conveyance are to be borne by the bidder.
96. In the event of delay in supply of design reasonable extension of time will be granted on the application of the bidder. But no claim for monetary compensation will be entertained under any circumstance.
97. Under no circumstances interest is payable for dues of the Contractor if any lying unpaid or payable for the work.
98. Conditional tenders will not be taken into consideration.
99. The EMD will be forfeited if the Bidder backs out from offer before acceptance of the Bid by the competent authority as concurred in by law Deptt. & Finance Deptt. in their UOR No. 848/L 31.5.97 & UOR No.202/WFD Dt.6.3.98 respectively. (Works Deptt. Memo No. 101/Clt.30.3.98) also the EMD will be forfeited if the Bidder fails to sign the agreement after acceptance and not willing to deposit the required ISD and Additional Performance Security (Incremental basis) for the unbalance tendered amount.
100. Dewatering from the foundation for bridges, culverts, building worksites etc; and watering for consolidation in roads embankments when and where necessary during execution will have to be done by the contractor and no extra payment will be made on that account. The term dewatering shall mean the execution or operation of the items due to standing water as well as due to percolation water.
101. Required amount from the gross amount of the bill will be deducted from the contractor's bill towards income tax & as amended from time to time.
102. The percentage rates quoted by the contractor shall be deemed to be exclusive of GST on all the materials that he will have to purchase for performance of this contract.
 - a) The percentage rates quoted by the contractor in the tender for works shall excluding GST that may be levied on turnover on works contract according to the Laws and Regulations as applicable from time to time & as amended from time to time.
 - b) GST on works contract as applicable as per norms of Government of Odisha, Finance Department.
 - c) GST will be paid extra as applicable.
103. The contractors are required to pay the royalty to Govt. as fixed from time to time and produce such

authenticated documents in support of their payment as royalty along with their bills failing which the amount of royalties of different materials as utilized by them in the work will be recovered from their bills.

~~104. The post work performance security at the rate of 5% will be deducted from each work bill which will be safely return only after guaranty/Warranty period. The Post work performance security @ 5% will be retained with the Executive engineer Muran Dam Division Khatiguda as an Interest free security for Two years after completion of the work, which is the duration of Guaranty/Warranty period of work. In case of defects if any noticed during the Guaranty / Warranty period the contractor has to rectify the same at his own cost within 15 days form the date of occurrence or otherwise. The entire amount of post work performance security @ 5% will be forfeited and the contractor has no right to claim for the same by any means.~~

105. Providing facilities to the Engineer Contractor:

- a) As per works Dept. No. FR11/2001/1 0003/00 BBSR 24.5.2001. 5% price preference allowed to the Engineer contractor in the tender rates has been withdrawn.
- b) Exemption of EMD to the Engineer contractor will be allowed for the fact to attending a work with exemption of EMD should be entered in the original Registration Certificate of the Engineer Contractor. [F.D. & LAW Deptt. UOR No.334 WE dt. 5.6.98 & No.449 L dt. 25.03.2000 respectively. This has been modified.

106. **Miscellaneous:**

- a) The department will have the right to inspect the scaffolding and centering made for the work and reject partly or fully such structures if found defective in their opinion.
 - b) Shuttering and centering shall be made with seasoned Sal wood planks the inside of which shall be lined with suitable sheeting and make leak proof and water tight or alternatively steel shuttering and centering may be used.
107. Bidders are also required to go through each clause of P.W.D. form P1 carefully in addition to the clause mentioned herein before tendering.

108. The bidder shall have to submit an affidavit about authentication of tender documents, while submitting tender.

109. All the forms and **Annexure/ schedules from 'A' to 'C', and Check list (Annexure- 'D')** attached to this DTCN must be filled in properly along with the authenticated documentary evidence required therein, failing which the bid shall be treated as 'Non-responsive' and be rejected.

110. If more than one bid is quoted (decimal up to two numbers will be taken for all practical purposes), either at the estimated cost put to tender or less than the estimated cost put to tender, the tender accepting Authority will finalize the tender through a transparent lottery system, where all the concerned bidders/their authorized representatives, the concerned SE/EE of the concerned Division and Divisional Accounts Officer (DAO) will remain present.

111. In pursuance to the Govt. of Odisha Works Dept. Office Memorandum No. 4559 dt: 05.04.2021, **Additional Performance Security** shall be obtained from the bidder when the bid amount is less than the estimated cost put to tender. In such an event, only the successful bidder who has quoted less bid price / rates than the estimated cost put to tender shall have to furnish the APS in the rates as noted below:

- Amended vide O.M. No.173 Dt.03.01.2026 & O.M. No.632 dtd.09.01.2026 of Works Dept., Govt. of Odisha to fix the following rate of Additional Performance Security (APS).

Sl. No.	Range of difference between the estimated cost put to tender and Bid amount	Additional performance Security to be deposited by the successful Bidder
1	Below 0.0 % but not below 10.00%	No additional Performance Security
2	Below 10.00% and not below 20.00%	The Additional Performance Guarantee/ Security percentage shall be incremented by 0.1% for every percentage of bid price below 10% of the project cost put to bid starting at 11% with the additional bid performance guarantee being 0.1% and this additional performance guarantee percentage shall be applied on the bid price.

3	Below 20%	The additional performance guarantee percentage shall be incremented by 0.2% for every percentage of bid price below 20% of the project cost put to bid in addition to 1% of the bid price and this additional performance guarantee percentage shall be applied on the bid price.
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- The additional performance guarantee percentage shall be rounded off to the next lower percentage based on whether the decimal point of the percentage of bid price is below 0.5% or next higher percentage based on whether the decimal point of the percentage of bid price is 0.5% or more.
- The additional performance security shall be treated as part of the performance security.
- Justification for abnormally low bids shall be scrutinized by the Departmental Technical committee and recommended to the competent authority of the Administrative Department for the approval of the Additional Performance Security (APS). An abnormally low bid is one in which the Bid price, in combination with other elements of the Bid, appears so low that it raises material concerns as to the capability of the Bidder to perform the contract at the offered price. Procuring Entity may, in such cases, seek written clarifications from the Bidder, including detailed price analyses of its Bid price in relation to scope, schedule, resource mobilization, allocation of risks and responsibilities, and any other requirements of the bid document. If, after evaluating the price analyses, the procuring entity determines that the Bidder has substantially failed to demonstrate its capability to deliver the contract at the offered price, the Procuring Entity may reject the Bid/Proposal. However, it would not be advisable to fix a normative percentage below the estimated cost, which would automatically be considered as an abnormally low bid.

Additional Performance Security shall be obtained from the successful bidder in shape of Term Deposit Receipt/ Bank guarantee from any Nationalized Bank, pledged in favour of The Executive Engineer, Muran Dam Division, Khatiguda within seven days of issue of letter of acceptance (LoA) by the Divisional Officer (By e-mail) to the successful bidder otherwise his/her bid shall be cancelled and the Earnest Money Deposit (Bid Security) shall be forfeited. Further proceeding for blacklisting shall be initiated against bidder Vide the Works Department, Govt of Odisha Office Memorandum No. 14459/W Dated 20.09.2018.

Note:- After evaluation of price bid, abnormally low bids have to submit the above-mentioned data specified in Clause VI within 15 days of receipt of letter by the Divisional Officer (By Mail) to the bidders, if fails to submit the mentioned document, the bid is liable for rejection.

SECTION – 2

INFORMATION AND INSTRUCTION TO TENDERERS (IIT)

1. Preparation of Bid Documents.

The intending bidder shall submit the bid duly filled in and signed in on-line through Govt. web-site. The forms attached with the documents are to be filled in completely. All the information called for should be furnished.

2. Method of submission of Bid Documents.

- 2.1 The bid documents duly filled in and signed by the intending bidder should be submitted in on-line through prescribed website only.
- 2.2 Deleted
- 2.3 If the intending bidder is an individual, the documents shall be signed by the individual above his full type written name and current address.
- 2.4 If the intending bidder is a proprietary firm, it shall be signed by the proprietor above his full name and with his current address.
- 2.5 If the intending bidder is a firm in partnership, it shall be signed by a partner holding the power of attorney for the firm in partnership in which case a certified copy of power of attorney shall accompany in the bid documents.
- 2.6 If the intending bidder is a limited company or Corporation, it shall be signed by a duly authorized person holding the power of attorney in which case certified copy of power of attorney shall accompany.
- 2.7 All witness and sureties shall be of person of status and probity and their full names, occupation and address shall be stated below their signatures.
- 2.8 The agency will install display board mentioning information about the work at worksite after drawl of the agreement at his own cost.

3. Opening of Bid Documents:

The bids (Both Technical & Financial) will be opened on Dt. 25.08.2026 at 11.00 AM in the office of the Executive Engineer, Muran Dam Division, Khatiguda. in the presence of bidders or their authorized representative, who wish to be present.

4. Qualifying Criteria:

- 4.1 To qualify for the tender the bidder must produce required **bid cost** as specified in the Detailed Notice Inviting Tender / Detailed Tender Call Notice.
- 4.2 Required bid security (**E.M.D.**) as specified in the Detailed Notice Inviting Tender/ Detailed Tender Call Notice should be furnished on-line by the bidders.
- 4.3. The intending bidder should furnish **valid contractor's registration certificate** of prescribed class and upload the scanned copy to the system in the designated place.
- 4.4 All intending bidders should furnish **valid Income Tax PAN Card** and upload the scanned copy to the system in the designated place.
- 4.5 The bidder shall furnish valid **GSTIN** and upload the scanned copy of the **GST Registration Certificate** to the system in the designated place.
Bidders from outside the state who intend to participate in the tender and the new entrants of the state who have not been registered under the **Goods & Service Tax Act** as they have not started any business in the state as yet, are allowed to participate in the tender without having any **GSTIN** subject to condition that they should submit undertakings in the form of an affidavit indicating therein that they are not registered under the **Goods & Service Tax Act** as they have not started any business in the state and they have no liability under the Act. But before award of the final contract, successful bidder will have to produce the **GSTIN** otherwise his tender shall not be considered.
- 4.6. The bidders are required to furnish an affidavit, at the time of submission of bids, about authentication

of bid documents with no adverse certificate in ***Annexure- 'A'*** (INFORMATION AND INSTRUCTION TO BIDDERS) and upload the scanned copy to the system in the designated place ***failing which the bids will summarily be rejected.***

4.7. A bidder or any of its constituent partners, of whose contract for any work has been rescinded or who has abandoned any work in the last three years having the contracted work as incomplete prior to the date of the bid, shall be disqualified. The information to this effect should be furnished in ***Annexure- 'B'*** (***INFORMATION REGARDING LITIGATION/ DEBARRING/ EXPELLING OF BIDDER OR ABANDONMENT OF WORK BY THE BIDDER***) (INFORMATION AND INSTRUCTION TO BIDDERS) and upload the scanned copy/copies to the system in the designated place ***in absence of which the bid will summarily be rejected.***

4.8. The bidder shall have to furnish an undertaking on ***Certificate of No Relationship*** along with the bid to the effect that he is not related to any officer in the rank of Assistant Engineer and above in the State P. W.D. or Assistant Secretary and above in the Department of Water Resources in the proforma contained in ***Annexure- 'C'*** (INFORMATION AND INSTRUCTION TO BIDDERS) and upload the scanned copy to the system in the designated place. If the fact is subsequently proved to be false, the contract will be rescinded. The total security deposit including I.S.D. will be forfeited and the bidder shall be liable to make good the loss of damage resulting from such cancellation. ***If the bidder fails to furnish this certificate, the bid shall be rejected.***

4.9. The instruction given at Sl. No. 11 of *DTCN*, clause No. 4 of *Information and instruction to Bidders* and the CERTIFICATE at para 49 of *Special Conditions of Contract* must be ensured by the bidder. She/he has to fill up the both under his/her signature and upload the scanned copy of the same in the portal.

5. Final decision-making authority:

The competent authority reserves the right to accept or reject or disqualify any of the tender or pre- qualification without assigning any reasons and its decision shall be final.

6. Further clarification:

The **Executive Engineer, Muran Dam Division, Khatiguda.** may be contacted during office hours on any working days for any further clarification.

7. Sample of all material:

The bidder shall supply sample of all materials fully before procurement for the work for testing and acceptance at his own cost as may be required by the concerned **Executive Engineer (as per SOR 2022 vide Works Department OM No.6785 /W Dated.20.04.2023.**

8. Overhead Charges include the following elements: -

- i. Site accommodation, setting up plant, access road, water supply, electricity and general site arrangements.
- ii. Office furniture, equipment and communications
- iii. Expenditure on
 - a. Corporate office of contractor
 - b. Site supervision
 - c. Documentation and "as built" drawings
- iv Mobilisation/de-mobilisation of resources
- v. Labour camps with minimum amenities and transportation to work sites
- vi. Light vehicles for site supervision including administrative and managerial requirements
- vii. Laboratory equipment and quality control including field and laboratory testing
- viii. Minor T&P and survey instruments and setting out works, including verification of line, dimensions, trial pits and bore holes, where required
- ix. Watch and ward
- x. Traffic management during construction
- xi. Expenditure on safeguarding environment

- xii. Sundries
- xiii. Financing Expenditure
- xiv. Work Insurance/compensation

9. For purpose of calculation of rates, **Contractor's profit @ 7.5 %** and **overhead charges @ 7.5%** to be adopted in Analysis of Rates of various items to work out estimated cost
10. From the commencement of the works to the completion of the same, they are to be under the contractor's charge. The contractor is to be held responsible to make good all injuries, damages and repairs occasioned or rendered necessary to the same by fire or other causes and they hold the Govt. of Odisha harmless for any claims for injuries to person or structural damage to property happening from any neglect, default, want of proper care or misconduct on the part of the contractor or any one in his employment during the execution of the work. Also, no claim shall be entertained for loss due to earth quake, flood, cyclone, epidemic, riot or any other calamity, whether natural or incidental. Damages so caused will have to be made good by the contractor at his own cost.
11. Where it will be found necessary by the Department, the Officer-in-Charge of the work shall issue an order book to the contractor to be kept at the site of the work with pages serially numbered. Orders regarding the work whenever necessary are to be entered in this book by the PWD Officers-in- Charge with their dated signatures and duly noted by the contractor or his authorized agents with their dated signatures. Orders entered in this book and noted by the contractor's agent shall be considered to have been duly given to the contractor for following the instructions of the Department.
The order book shall be the property of the Deptt. and shall not be removed from the site of Work without written permission of the Engineer-in-Charge.

GUIDELINES / PROCEDURES OF e-Procurement
Appendix-IX (A) of OPWD Code, Vol-II
Government of Odisha, Works Department
Office Memorandum
File No.07556900042013 (Pt-II)-7885 /W, Dated, 23.07.2013.

Sub: - Executive instructions regarding calling for and acceptance of tenders in e-Procurement.

This procedural requirement of e-procurement shall be made part of the Detailed Tender Call Notice or Instruction to bidders for all works/ tenders hoisted in the portal.

- 1) This office memorandum consists of the procedural requirement of e-Procurement and shall be made part of the “Detailed Tender Call Notice or Instruction to Bidder for all works” tenders hoisted in the portal.
- 2) The e-Procurement portal of the Government of Orissa is [https://tenderodisha.gov.in./](https://tenderodisha.gov.in/)
- 3) Use of valid Digital Signature Certificate of appropriate class (Class II or Class III) issued from a registered Certifying Authority (CA) as stipulated by Controller of Certifying Authorities (CCA), Government of India such as n-Code, Sify, TCS, MTNL, e-Mudhra etc; is mandatory for all users.
- 4) The DSC issued to the Department users is valid for the period of two years only. All the Department users are responsible to revalidate their DSC prior to expiry.
- 5) For all purpose, the server time displayed in the e-procurement portal shall be the time to be followed by all the users.
- 6) Government after careful consideration have decided to hoist all tenders costing 05 lakhs or above in the e-Procurement portal. This will be applicable across all Engineering Departments such as Works Department, Department of Water Resources, Rural Development and Housing & Urban Development Department. Government of Odisha also welcomes hoisting of tenders by any other departments, authority, corporations, local bodies etc. of the State with prior approval from Works Department, Works Department is the Nodal Department for the implementation of e-Procurement in the State.
- 7) The e-procurement shall be operated compliant to relevant provisions of OGFR / OPWD Code / Accounts Code / Government statutes including any amendments brought from time to time to suit to the requirement of the best national practice.
- 8) Registration in the e-procurement portal is without levy of any charges but Government reserves the right to levy any charges for such value-added services in future.
- 9) Contractors not registered with Government of Orissa can participate in the e- procurement after necessary enrollment in the portal but have to subsequently register themselves with the appropriate registering authority of the State Government before award of the work as per prevalent registration norms of the State.
- 10) For the role management “Department” is the Administrative Department. Organization or wing is the Chief Engineer or highest tender accepting authority or equivalent officer under the Administrative Department, Circle is the Addl. Chief Engineer or equivalent officer, Division is the Executive Engineer or equivalent officer and Sub-Division is the Assistant Executive Engineer or equivalent officer.
- 11) The e-procurement software assigns role for operation of the module for specific function. The terminologies used in the Portal and their respective functions in the software are as follows.
 - a. Application Administrator. (NIC and State Procurement Cell)
 - i. Master Management.
 - ii. Nodal Officer Creation.
 - iii. Report Generation.
 - iv. Transfer and blocking of Officers.
 - b. Nodal Officer (At organization level not below the Executive Engineer or equivalent rank)
 - i. Creation of Users.
 - ii. Role Assignment.
 - iii. Transfer and blocking of Officers.
 - c. Procurement Officer – Publisher (Officer having tender inviting power at any level).
 - i. Publishing of Tender.
 - ii. Publishing of Corrigendum / Addendum / Cancellation of Tender.
 - iii. Bid clarification.

- iv. Uploading of Pre-Bid Minutes.
- v. Report generation.
- d. Procurement Officer – Administrator. (Generally Sub-ordinate Officer to Officer inviting the tender).
 - i. Creation of tender.
 - ii. Creation of Corrigendum / Addendum / Cancellation of tender.
 - iii. Report generation.
- e. Procurement Officer – Opener (Generally Sub-ordinate Officer to Officer inviting the tender).
 - i. Opening of Bid.
- f. Procurement Officer – Evaluator (Generally Sub-ordinate Officer to Officer inviting the tender).
 - i. Evaluating Bid.
- g. Procurement Officer – Auditor (Procurement Officer – Publisher and / or Accounts Officer / Finance Officer).
 - i. To take up auditing.
- 12) The e-procurement shall be operated compliant to relevant provisions of OGFR / OPWD Code / Accounts Code / Government statutes including any amendments brought from time to time to suit to the requirement of the best national practice.
- 13) Registration in the e-procurement portal is without levy of any charges but Government reserves the right to levy any charges for such value-added services in future.
- 14) Contractors not registered with Government of Orissa can participate in the e- procurement after necessary enrollment in the portal but have to subsequently register themselves with the appropriate registering authority of the State Government before award of the work as per prevalent registration norms of the State.
- 15) For the role management “Department” is the Administrative Department. Organization or wing is the Chief Engineer or highest tender accepting authority or equivalent officer under the Administrative Department, Circle is the Addl. Chief Engineer or equivalent officer, Division is the Executive Engineer or equivalent officer and Sub-Division is the Assistant Executive Engineer or equivalent officer.
- 16) The e-procurement software assigns role for operation of the module for specific function. The terminologies used in the Portal and their respective functions in the software are as follows.
 - a. Application Administrator. (NIC and State Procurement Cell)
 - i. Master Management.
 - ii. Nodal Officer Creation.
 - iii. Report Generation.
 - iv. Transfer and blocking of Officers.
 - b. Nodal Officer (At organization level not below the Executive Engineer or equivalent rank)
 - i. Creation of Users.
 - ii. Role Assignment.
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 - c. Procurement Officer – Publisher (Officer having tender inviting power at any level).
 - i. Publishing of Tender.
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 - d. Procurement Officer – Administrator. (Generally Sub-ordinate Officer to Officer inviting the tender).
 - i. Creation of tender.
 - ii. Creation of Corrigendum / Addendum / Cancellation of tender.
 - iii. Report generation.
 - e. Procurement Officer – Opener (Generally Sub-ordinate Officer to Officer inviting the tender).
 - i. Opening of Bid.
 - f. Procurement Officer – Evaluator (Generally Sub-ordinate Officer to Officer inviting the tender).
 - iii. Evaluating Bid.
 - g. Procurement Officer – Auditor (Procurement Officer – Publisher and / or Accounts Officer / Finance Officer).
 - i. To take up auditing.

17) NOTICE INVITING BIDS (NIB) OR INVITATION FOR BID (IFB):

- a) The Notice Inviting Bids (NIB) and Bid documents etc., shall be in the Standard formats as applicable to conventional Bids and will be finalized / approved by the officers competent as in the case of conventional Bids
- b) The officers competent to publish NIB in case of conventional Bids will host the NIB in portal. Simultaneously, a notification should also be published in the newspapers as per existing rules preferably, in the following format, to effect economy: -

Government of Odisha e-Procurement Notice

1. e- Procurement Notice no.	:	EEMDD-0 3 (0 3) /2026-27, Dated: 07.08.2026
2. Bid Identification No.	:	EEMDD-0 3 (0 2 / 0 3) /2026-27
3.Name of the work	:	"Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."
4.Value of work	:	Rs. 5,78,141 /- (Excluding GST)
5.Period of completion	:	12 (Twelve) Calendar Months
6.Date & Time of availability of Bid document in the portal	:	From Dt. 14.08.2026, 11.00 AM. to Dt 24.08.2026 up to 5.00 PM
7.Last Date / Time for receipt of Bids in the portal	:	on Dt 24.08.2026 up-to 5.00 PM.
8.Name and address of the O.I. T	:	ER. TILOTTAMA MAJHI, EXECUTIVE ENGINEER, MURAN DAM DIVISION, KHATIGUDA, NABARANGPUR, ODISHA.

Further details can be seen from the e-Procurement portal [https://tenderodisha.gov.in./](https://tenderodisha.gov.in/)

- c) The tender documents published by the Tender Inviting Officer (Procurement Officer Publisher) in the website “<https://tendersorissa.gov.in>” will appear in the “Latest Active Tenders.” The Bidders / Guest Users can download the Bid documents only after the due date & time of sale. The publication of the tender will be for specific period of time till the last date of submission of bids as mentioned in the Notice Inviting Bid after which the same will be removed from the list of “**Latest Active tenders**”.

18) ISSUE OF ADDENDA / CORRIGENDA / CANCELLATION NOTICE:

- a. The Procurement Officer Publisher (Officer inviting tender) shall publish any addendum / corrigendum / cancellation of tender in the website [https://tenderodisha.gov.in.](https://tenderodisha.gov.in) / Notice board and through paper publication and such notice shall form part of the bidding documents.
- b. The System shall generate a mail to those bidders who have already uploaded their tenders and those bidders if they wish, can modify their tender. The Bidders are required to watch the website till last date and time of Bid submission for any addendum/ corrigendum/ cancellation thereof. Tender Inviting Authority is not responsible for communication failure of system generated mail.

19) **CREATION AND PUBLISHING OF BID:**

- a) All the volumes/documents shall be uploaded in the portal by the tender creating officer (Procurement Officer Administrator) and published by the Officer Inviting Tender (Procurement Officer Publisher) using their DSCs in appropriate format so that the document is not tampered with.
- b) The tender document comprises the notice inviting tender, bid document/ SBD, drawings in pdf format and the schedule of quantities / BoQ in .xls format to be uploaded by the Officer Inviting Tender.
- c) Procurement Officer Administrator creates tender by filling up the following forms:

i. BASIC DETAILS

ii. COVER CONTENT: The Procurement Officer Administrator should briefly describe the name and type of documents to be uploaded by the Bidder in the following format:

(a) For Single Cover/Package:

Sl. No.	Cover Type	Document Description	Type
1	Fee / Pre-equal / Technical /Finance	Electronic Receipt of Tender cost & EMD, GST, PAN, Contractor Registration Certificate.	pdf
		Affidavits, undertakings and any other required documents as per SBD/DTCN.	pdf
		BoQ	.xls
		Special condition if any specifically mentioned by Officer Inviting Tender	.pdf

iii. TENDER DOCUMENT: The Procurement Officer Administrator should upload the NIT in pdf format.

iv. WORK ITEM DETAILS.

v. FEE DETAILS: The Procurement Officer Administrator should mention the cost of tender paper and EMD amount as laid down in e-procurement Notice /SBD.

vi. CRITICAL DATES: The Procurement Officer Administrator should mention the critical dates of tender such as publishing date, document download start date & end date, seek clarification start date & end date (optional), Bid submission start date & closing date, Bid opening date as per e-procurement Notice /SBD.

vii. BID OPENER SELECTION: The Procurement Officer creator can select two / three / four Bid openers for a particular Bid. If required the Bid openers can also be selected within an organization from other procurement units (CCE(C) / Divisions).

viii. WORK ITEM DOCUMENTS: The Procurement Officer Administrator should upload the digitally signed tender document (SBD/e-procurement Notice) or any other addition document/drawings in .pdf format and Bill of Quantities in .xls format.

ix. PUBLISHING OF TENDER: The Procurement Officer Publisher shall publish the tender using his/her DSC after detail scrutiny of the fields created and documents uploaded by the Procurement Officer Administrator. Procurement Officer Publisher can publish tenders for multiple procurement units using multiple DSCs procured for each post separately. After being relieved from the additional charges he has to surrender the additional DSCs to the Nodal Officer of the concerned organization.

20) PARTICIPATION IN BID.

a. PORTAL REGISTRATION: The Contractor/Bidder intending to participate in the Bid is required to register in the portal using his/her active personal/official e-mail ID as his/her Login ID and attach his/her valid Digital Signature Certificate (DSC) to his/her unique Login ID. He/ She has to submit the relevant information as asked for about the firm/contractor. The portal registration of the Bidder/firm is to be authenticated by the State Procurement Cell after verification of original valid certificates / documents such as (i) PAN and (ii) Registration Certificate (RC) / Valid GST Certificate of the concerned Bidder. The time period of validity in the portal is at par with validity of RC / valid GST certificate. Any change of information by the Bidder is to be re-authenticated by the State Procurement Cell. After successful authentication Bidder can participate in the online Bidding process.

i. Bidders participating through Joint Venture shall declare the authorized signatory through Memorandum of Understanding duly registered and enroll in the portal in the name and style of the Joint Venture Company. It is mandatory that the DSC issued in the name of the authorized signatory is used in the portal.

ii. Any third party/company/person under a service contract for operation of e- procurement system in the State or

his/their subsidiaries or their parent companies shall be ineligible to participate in the procurement processes that are undertaken through the e- procurement system irrespective of who operates the system.

- b. **LOGGING TO THE PORTAL:** The Contractor/Bidder is required to type his/her Log in ID and password. The system will again ask to select the DSC and confirm it with the password of DSC as a second stage authentication. For each login, a user's DSC will be validated against its date of validity and also against the Certificate Revocation List (CRL) of respective CA stored in system database. The system checks the unique Login ID, password & DSC combination and authenticates the login process for use of portal.
- c. **DOWNLOADING OF BID:** The bidder can download the tender of his choice and save it in his system to undertake necessary preparatory work off-line and upload the completed tender at his convenience before the closing date and time of submission.
- d. **CLARIFICATION ON BID:** The bidder may ask question online in the e-procurement portal using his/her DSC; provided the questions are raised within the period of seeking clarification as mentioned in tender call notice/Bid. The Officer inviting the bid / Procurement Officer-Publisher will clarify queries related to the tender.
- e. **PREPARATION OF BID:**
 - i. The bids may consist of general arrangements drawings or typical or any other drawings relevant to the work for which bid has been invited. Bidder may down load these drawings and take out the print for detail study and preparation of his bid. Any other drawings and documents pertaining to the works available with the officer inviting the bid will be opened for inspection by the bidders.
 - ii. The Bidder shall go through the Bid carefully and list the documents those are asked for submission. He shall prepare all documents including cost of Bid Document, Bid Security, Declaration form, price bid etc; and store in the system.
- f. **PAYMENT OF EMD/BID SECURITY AND COST OF BID DOCUMENTS:**
 - i. The bidder shall furnish, as part of his Bid, a bid security for the amount mentioned under NIT/Contract Data. The bidder shall scan all the written/printed pages of the bid security and up load the same in portable document format (PDF) to the system in designated place of the technical BID. Furnishing scanned copy of such documents is mandatory otherwise his/her bid shall be declared as non-responsive and liable for rejection.
 - ii. The E.M.D. or Bid Security payable along with the bid is 1% of the estimated contract value (ECV) or as mentioned in the bid document. The validity period of the E.M.D. or Bid Security shall be mentioned in the bid document. Any bid not accompanied by an acceptable Bid Security and not secured as indicated in the bid document shall be rejected as non-responsive. The bid security shall be retained till such time the successful bidder furnishes Initial Security Deposit (I.S.D.) or Performance security acceptable to the Officer inviting the Bid. Failure of the successful Bidder to comply with the requirements shall constitute sufficient grounds for cancellation of the award and forfeiture of the Bid Security. The Bid security in the form of FD / BG shall be from a Nationalized Bank **valid for a period of 45 days beyond the validity of the bid**. Bid security in other form is acceptable if the bid documents provide for it.
 - i. The Electronic Receipt of Paper cost & EMD (Bid Security), shall be uploaded in Portable Document Format (PDF) along with the Bid.
 - ii. ~~The Fixed Deposit / Bank Guarantee or any other form as mentioned in detailed tender call notice in respect of Earnest Money Deposit / Bid Security and the Bank Draft in respect of cost of Bid are to be scanned and up loaded in portable document format (PDF) along with the bid.~~
 - iii. The tender accepting authority will verify the originals of all the scanned documents of the successful lowest Bidder only within 5 days of opening of the tender or as and when required during evaluation of tender. In the eventuality of failure on the part of the lowest successful Bidder to produce the original documents, he will be debarred in future from participating in tender for 03 years and will be black listed by the competent authority. In such a situation, successful L-2 Bidder will be required to produce his original documents for consideration of his tender at the negotiated rate equal to L1 Bidder.

~~The bidder shall provide the cost of bid and the Bid security in a sealed cover superscripting the name of the work for which the instruments are intended and the Officer inviting the Bid. He/She is not required to write his/her name on the cover. The original FD/BG/BD shall be physically produced before the Officer inviting the~~

~~Bid or the concerned Division/Circle/Chief Engineer before the specified period mentioned in the bid, which in no case shall be less than three days excluding the last date of submission and opening of bids (Technical cover opening in case of Double cover system). The bidder is also allowed to submit the original FD/BG/BD by Registered post/Speed post or any other delivery system before the last date & time of opening of tender.~~

- v. The Officers authorized by the Procurement Officer-Publisher (Officer Inviting Tender) shall transmit the sealed envelopes carefully to the Procurement Officer-Publisher prior to opening of the Bid. The Procurement Officer-Publisher shall provide signed receipt with date and time for having received the number of sealed envelopes.
- vi. The Procurement Officer-Publisher (Officer Inviting the Tender) or other concerned officers authorized to receive the original Bid security and Bid cost on behalf of the Procurement Officer-Publisher shall not be responsible for any postal delay and/or non-receipt of the original copy of the bid security on or before specified date & time. Non submission of bid security within the designated period shall debar the bidder from participating in the on-line bidding system and his portal registration shall be blocked. His name shall also be informed to the registering authority for cancellation of his registration as Contractor.
- vii. Contractor exempted from payment of E.M.D. will be able to participate in the tender directly by uploading documentary evidences towards his eligibility for such exemption.
- viii. Government of Orissa has been actively considering integrating of e-payment gateway in to the portal for payment of Cost of Bid and Bid Security/Earnest Money Deposit. The process of using e-payment gateway shall be issued separately after it is established.

21) SUBMISSION OF BID:

- a. The bidder shall carefully go through the tender and prepare the required documents. The Bid shall have a Technical Bid & a Financial Bid. The Technical Bid generally consists of cost of Bid documents, E.M.D/Bid Security, GSTIN., P.A.N, Affidavits. The Financial Bid shall consist of the Bill of Quantities (BoQ) and any other price related information/undertaking including rebates.
- b. The Protected Bill of Quantities (BOQ) uploaded by the Procurement Officer-Publisher for the Bid is the authentic BOQ. Any alteration, deletion, or manipulation in BOQ shall lead to cancellation of Bid.
Bidders are to submit only the original BoQ (in .xls format) uploaded by Procurement Officer Publisher (Officer Inviting Tender) after entering the relevant fields without any alteration / deletion / modification. Multiple BoQ submission by Bidder shall lead to cancellation of Bid. In case of item rate tender, Bidders shall fill in their rates other than zero value in the specified cells without keeping it blank. In the percentage rate tender the Bidder quoting zero percentage is valid and will be taken at par with the work value put to tender.
- c. The Bidder shall up load the scanned copy/copies of document in support of eligibility criteria and qualification information in prescribed format in Portable Document Format (PDF) to the portal in the designated locations of Technical Bid.
- d. The bidder shall write his name in the space provided in the specified location in the Protected Bill of Quantities (BoQ) published by the Officer Inviting Tender. The bidder shall type rates in figure only in the rate column of respective item(s) without leaving any blank cell in the rate column in case of Item rate tender & type percentage excess or less up to one decimal place only in case of percentage rate tender.
- e. The bidder shall log on to the portal with his/her DSC and move to the desired tender for uploading the documents in appropriate place one by one simultaneously checking the documents.
- i. Bids cannot be submitted after due date and time. The bids once submitted cannot be viewed, retrieved or corrected. The Bidder should ensure correctness of the bid prior to uploading and take print out of the system generated summary of submission to confirm successful uploading of bid. The bids cannot be opened even by the OIT or the Procurement Officer-Publisher/Opener before the due date and time of opening.
- ii. Each process in the e-procurement is time stamped and the system can detect the time of log in of each user including the Bidder.
- iii. The Bidder should ensure clarity/legibility of the document uploaded by him to the portal.
- iv. The system shall require all the mandatory forms and fields filled up by the contractor during the process of submission of the bid/tender.

- v. The bidder should check the system generated confirmation statement on the status of the submission.
- vi. The Bidder should upload sufficiently ahead of the bid closure time to avoid traffic rush and failure in the network.
- vii. The Tender Inviting Officer is not responsible for any failure, malfunction or breakdown of the electronic system used during the e-procurement process.
- viii. The Bidder is required to upload documents related to his eligibility criteria and qualification information and Bill of Quantities duly filled in. It is not necessary for the part of the Bidder to upload the drawings and other Bid documents (after signing) while uploading his bid. It is assumed that the bidder has referred all the drawings and documents uploaded by the Officer Inviting the Bid.
- ix. Seeking any revision of rates or backing out of the bid claiming for not having referred to any or all documents provided in the Bid by the Officer Inviting the Bid will be construed as plea to disrupt the bidding process and in such cases the bid security shall be forfeited.
- x. The bidder will not be able to submit his bid after expiry of the date and time of submission of Bid (server time). The date & time of bid submission shall remain unaltered even if the specified date for the submission of bids declared as a holiday for the Officer Inviting the Bid.
- f. **SIGNING OF BID:** The 'online bidder' shall digitally sign on all statements, documents, certificates uploaded by him, owning responsibility for their correctness/authenticity as per IT ACT 2000. If any of the information furnished by the bidder is found to be false/fabricated/bogus, his E.M.D./Bid Security shall stand forfeited and the bidder is liable to be blacklisted. and the clause No.15.6.4 is applicable.

22) SECURITY OF BID SUBMISSION:

- a. All bid uploaded by the Bidder to the portal will be encrypted.
- b. The encrypted Bid can only be decrypted/opened by the authorized openers on or after the due date and time.

23) RESUBMISSION AND WITHDRAWAL OF BIDS:

- a. Resubmission of bid by the bidders for any number of times before the final date and time of submission is allowed.
- b. Resubmission of bid shall require uploading of all documents including price bid afresh.
- c. If the bidder fails to submit his modified bid(s) within the pre-defined time of receipt, the system shall consider only the last bid submitted.
- d. The bidder should avoid submission of bid at the last moment to avoid system failure or malfunction of internet or traffic jam or power failure etc.
- e. The Bidder can withdraw his bid before the closure date and time of receipt of the bid by uploading scanned copy of a letter addressing to the Procurement Officer-Publisher (Officer Inviting Tender) citing reasons for withdrawal. The system shall not allow any withdrawal after expiry of the closure time of the bid.

24) OPENING OF THE BID:

- a. Bid opening date and time is specified during tender creation or can be extended through corrigendum. Bids cannot be opened before the specified date & time.
- b. All bid openers have to log on to the portal to decrypt the bid submitted by the bidders.
- c. The bidders & guest users can view the summary of opening of bids from any system. Contractors are not required to be present during the bid opening at the opening location if they so desire.
- d. In the event of the specified date of bid opening being declared a holiday for the Officer inviting the Bid, the bids will be opened at the appointed time on the next working day.
- e. In case bids are invited for more than one package, the order for opening of the "Bid" shall be that in which they appear in the "Invitation for Bid".

- f. ~~During bid opening, the covers containing original financial instruments towards Cost of bid and Bid Security in the form specified in the DTCN/ITB valid for the period stated in the Bid, received after last date of receipt of bid and before opening of the bids shall be opened and declared. The Procurement Officer Opener shall continue opening of other documents if he is satisfied about the appropriateness of the cost of Bid and the Bid Security.~~
- g. Combined bid security for more than one work is not acceptable.
- h. The electronically submitted bids may be permitted to be opened by the predefined Bid opening officer from their new location if they are transferred after the issue of Notice Inviting Bid and before bid opening. Further action on bid documents shall be taken by the new incumbent of the post.
- i. In case of non-responsive tender, the officer inviting tender should complete the e- Procurement process by uploading the official letter for cancelled / re-tender.
- j. **~~The Opening Officer will systematically check the scanned demand draft towards cost of the bid document and the scanned document of Bid security with that of the original submitted, if found in order they will continue opening of all other documents in the system providing under Technical Bid.~~**

25) EVALUATION OF BIDS:

- a) All the opened bids shall be downloaded and printed for taking up evaluation. The Procurement Officer-Openers shall sign on each page of the documents downloaded and furnish a certificate that the documents as available in the portal containing 125 nos. of pages for the tender have been downloaded.
- b) **The Bidder may be asked in writing / online (in their registered e-Mail IDs) to clarify on the uploaded documents provided in the Technical Bid, if necessary, with respect to any doubts or illegible documents. The Officer Inviting Tender may ask for any other document of historical nature during Technical Evaluation of the tender. Provided in all such cases, furnishing of any document in no way alters the Bidder's Price Bid. Non-submission of legible documents may render the Bid non-responsive. The authority inviting Bid may reserve the right to accept any additional document.**
- c) Officer-Evaluators; will evaluate Bid and finalize list of responsive Bidders.
- d) The Procurement Officer-Evaluators shall take up evaluation of bids with respect to the qualification information and other information furnished subject to confirmation of the bid security by the issuing institutions.
- e) After receipt of confirmation of the bid security, the bidder may be asked in writing to clarify on the documents provided in the Technical Bid, if necessary, with respect to any doubts or illegible documents. The Officer Inviting Tender may ask for any other document of historical nature during technical evaluation of the tender. Provided in all such cases, furnishing of any document in no way alters the Bidder's price bid. Non-submission of legible documents may render the bid non-responsive.
- f) The bidders will respond in not more than 7 days of issue of the clarification letter, failing which the bid of the bidder will be evaluated on its own merit.
- g) Technical evaluation of all bids shall be carried out as per information furnished by Bidders. But evaluation of bids does not exonerate bidders from checking their original documents at later date. If the bidder is found to have misled the evaluation through wrong information, action as per relevant clause of DTCN/ITB shall be taken against the bidder/contractor.
- h) The Procurement Officer-Evaluators will evaluate bids and finalize list of responsive bidders.
- i) The financial bids of the technically responsive bidders shall be opened on the due date of opening. The Procurement Officer-Openers shall log on to the system in sequence and open the financial bids.
- j) The Financial Bid will be opened on the notified date & time in the presence of bidders or their authorized representative who wish to be present.
- k) At the time of opening of 'Financial Bid', bidders whose technical bids were found responsive will be opened.
- l) The responsive bidders' name, bid prices, item wise rates, total amount of each item in case of *Item Rate Tender* and percentage above or less in case of *Percentage Rate Tenders* will be announced.
- m) Procurement Officer-Openers shall sign on each page of the downloaded BOQ and the Comparative Statement

and furnish a certificate to that respect.

- n) Bidder can witness principal activities and view the documents/summary reports for that particular work by logging on to the portal with his DSC from anywhere.
- o) System provides an option to Procurement Officer Publisher for reconsidering the rejected Bid with the approval of concerned Chief Construction Engineer(C)/ Head of Department.

26) NEGOTIATION OF BIDS:

- a) For examination, evaluation and comparison of bids, the officer inviting the bid may, at his discretion, ask the lowest bidder for clarification of his rates including reduction of rate on negotiation and breakdown of unit rates.

27) NOTIFICATION OF AWARD AND SIGNING OF AGREEMENT:

- a) The Employer/Engineer-in-Charge shall notify acceptance of the work prior to expiry of the validity period by cable, telex or facsimile or e-mail confirmed by registered letter. This Letter of Acceptance will state the sum that the Engineer-in-Charge will pay the contractor in consideration of the execution & completion of the works by the contractor as prescribed by the contract & the amount of Performance Security and Additional Performance Security required to be furnished.

The issue of the letter of acceptance shall be treated as closure of the Bid process and commencement of the contract.

- b) The Contractor after furnishing the required acceptable performance security & additional performance security. "Letter to Proceed" or "Work Order" shall be issued by the Engineer-in-Charge with copy thereof to the Procurement Officer-Publisher. The Procurement Officer- Publisher shall up load the summary and declare the process as complete.
- c) If the L-1 Bidder does not turn up for agreement after finalization of the tender, then he shall be debarred from participation in Bidding for three years and action will be taken to blacklist the contractor. Besides the consortium / JV / firm where such an agency / firm already happens to be or is going to be a partner/member/proprietor, he/they shall neither be allowed for participation in Bidding for three years nor his/their application will be considered for registration and action will be initiated to blacklist him / them. In that case, the L-2 Bidder, if fulfils other required criteria, would be called for drawing agreement for execution of work subject to condition that the L-2 Bidder negotiates at par with the rate quoted by the L-1 Bidder, otherwise the tender will be cancelled.

23. **BLOCKING OF PORTAL REGISTRATION:**

- a) If the Registration Certificate of the Contractor is cancelled / suspended by the registering authority/ blacklisted by the competent authority his portal registration shall be blocked automatically on receipt information to that effect.
- b) The portal registration blocked in the ground mentioned in the above Para-23.1 shall be unblocked automatically in receipt of revocation order of cancellation / suspension / blacklisting from the concerned authority.
- c) The Officer Inviting Tender shall make due inquiry and issue show cause notice to the concerned contractor who in turn shall furnish his reply, if any, within a fortnight from the date of issue of show cause notice. Thereafter the Officer Inviting Tender is required to issue an intimation to the defaulting Bidder about his unsatisfactory reply and recommend to the Chief Manager (Tech.) for blocking of portal registration within 10 days of intimation to the defaulting Bidder regarding his unsatisfactory reply with intimation to the Registering Authority and concerned Chief Construction Engineer(C) Engineer/ Heads of Office if any of the following provisions are violated.
- d) Fails to furnish original Technical / Financial (Tender Paper Cost, EMD/Bid Security) instruments before the designated officer within the stipulated date and time.
- e) Backs out from the Bid on any day after the last date of receipt of tender till expiry of the Bid validity period.
- f) Fails to execute the agreement within the stipulated date.
- g) If any of the information furnished by the Bidder is found to be false / fabricated / bogus. Accordingly, the Officer Inviting Tender shall recommend to the Chief Manager (Tech.), State Procurement Cell, Odisha for blocking of portal registration of Bidder and simultaneously action shall also be initiated by OFFICER INVITING

TENDER for blacklisting as per Appendix – XXXIV of OPWD Code, Volume-II.

24. GUIDELINES FOR UNBLOCKING OF PORTAL REGISTRATION:

a) UNBLOCKING OF PORTAL REGISTRATION:

Unblocking of portal registration of a contractor shall be done by a Committee consisting of the following members.

EIC (Civil)-cum-CPO,	-	Chairman
Engineer-in-Chief (WR)	-	Member
Concerned Chief Construction Engineer(C)	-	Member
Deputy General Manager (Finance),	-	Member
Officer Inviting Tender	-	Member
Chief Manager (Technical), SPC	-	Convener

b) The Chief Manager (Tech), State Procurement Cell will be the convener and he will maintain all records for this purpose. The Committee shall meet not less than once in a month if required & shall consider the recommendation of the officer inviting tender for unblocking of portal registration. The quorum of the meeting will be four.

c) The minimum period of blocking of Portal Registration shall in no case be less than 90 days. After blocking of Portal Registration, the Contractor whose Portal Registration has been blocked may file application to the concerned officer inviting tender showing sufficient ground for unblocking of his portal registration along with a Treasury Challan showing deposit of Rs.10,000/- (Rupees ten thousand) only (non-refundable) under the head of accounts '0059-Public Works' as processing fees. The officer inviting tender shall forward the application filed by the contractor to the Chief Manager (Tech), State Procurement Cell.

d) On receipt of recommendation from the concerned Chief Construction Engineer (Civil) along with the copy of challan as mentioned above, the Chief Manager (Tech) being the member Convener of the Committee shall place in the case before the Committee for examination and taking a decision in this regard. After examination the Committee may recommend for unblocking of the portal registration of said contractor if the Committee is satisfied that the fault committed by the Contractor is either unintentional or done for the first time.

e) After scrutiny by the State Procurement Cell if it is found that the portal registration of a contractor has been blocked for the 2nd time the Chief Manager (Tech), SPC may not consider his case to be placed before the Committee and may advise the concerned officer inviting tender to issue show cause notice to the contractor asking him to explain as to why his portal registration shall not remain blocked. On receipt of show cause reply from the contractor the officer inviting tender shall examine the same & if considered proper he may report to the Chief Manager (Tech), SPC along with his views furnishing the copy of the show cause reply for placement of the same before the Committee for taking a decision in respect of blocking/ unblocking. If the Committee found that the contractor is in habit of committing such fault again and again intentionally the committee may advise the concerned officer inviting tender to initiate proceeding for blacklisting as per the existing rule.

I. These amendments shall take effect from the date of issue of the order.

II. This amendment is an addition to the existing provision and will be placed below Appendix-IX to OPWD Code, Vol-II.

III. Accordingly, Officer Memorandum No.1027 dt.24.01.2009 stands modified.

This has been concurred in by the Finance Department vide their U.O.R. No.3-WF-I Dt.04.01.2013.

Government of Odisha
Works Department
Office Memorandum
File no. 07556900042013 (pt-IV)- 12366, dated. 08.11.2013

Sub: - Amendment of Codal / Contractual provisions.

After careful consideration Government have been pleased to make amendment to contractual and Codal provisions for increasing the efficiency and transparency of Department dealing with infrastructure development of the State as per Annexure-I, II, III, IV, V, VI & VII.

- 1) These amendments shall take effect from the date of issue of the order.
- 2) Accordingly, relevant existing Codal / contractual provision stand modified with effect from the date of issue of this O.M.
- 3) This has been concurred in by Finance Department in their UOR No. 157-WF-I dt. 17.5.2012.

ANNEXURE-I

i) Amendment to Para -3.4.16 (a) (vii) of O.P.W.D. Code, Vol-1 by substitution:

Note – (vii) – For the purpose of estimate, the approved quarry lead is to be provided judiciously. Engineers in charge would be responsible for ensuring the quality of the materials supplied. The contractors would, however, be responsible for procurement of materials from authorized sources and voluntarily disclose the source of procurement for the purpose of billing. Besides, the bidder would be required to submit the details of quarry for procurement while submitting the bids.

ANNEXURE-II

ii) Amendment to Para-3.5.14 Note-I of O.P.W.D. Code, Vol-I by inclusion:

Note-I- If L-1 bidder does not turn up for agreement after finalization of the tender, then he shall be debarred from participation in bidding for three years and action will be taken to blacklist the contractor. In that case, the L-2 bidder, if fulfils, other required criteria would be called for drawing agreement for execution of work subject to the condition that L-2 bidder negotiates at par with the rate quoted by the L-1 bidder otherwise the tender will be cancelled. In case a contractor is black listed, it will be widely publicized and intimated to all departments of Government and also to Government of India agencies working in the state.

ANNEXURE-III

iii) Amendment to Appendix-IX, Clause 36 of O.P.W.D. Code, Vol-II by inclusion:

Clause No. 36 If the rate quoted by any bidder is less by 15% or more than the estimated cost put to tender, then such bid shall be rejected and the tender shall be finalised basing on merits of rest of bids. But, if more than one bid is quoted (decimal up to two numbers will be taken for all practical purpose) either at the estimated cost put to tender or less than the estimated cost put to tender, the tender will be finalised through a transparent lottery system, where such bidders/their authorised representatives, Superintending/Executive Engineer of the concerned division & DAO will remain present.

ANNEXURE-IV

iv) (A) Amendment to Para-3.5.5 (V) Note-II of O.P.W.D. Code, Vol-I by substitution/ modification:-

Note (II) Additional Performance Security shall be obtained from the bidder when the bid amount is less by 5% or more than estimated cost put to tender. In such an event, only the successful bidder who has quoted 5% or more less bid price/rates than the estimated cost put to tender shall have to furnish the *Additional Performance Security (APS)* in shape of Term Deposit Receipt pledged in favour of the **Executive Engineer, Muran Dam Division, Khatiguda / Bank Guarantee in favour of the Executive Engineer, Muran Dam Division, Khatiguda from any Nationalized / Scheduled Bank in India counter guaranteed by its local branch at Bhubaneswar** within seven days of issue of Letter of Acceptance (LOA) by e-mail to the successful bidder, otherwise the bid of the successful bidder shall be cancelled and the Earnest Money Deposit/ Bid Security shall be forfeited. Further, proceeding for blacklisting shall be initiated against the bidder.

Sl. No.	Range of difference between the estimated cost put to tender & bid amount	<i>Additional Performance Security (APS) to be deposited by the successful bidder</i>
1.	From 5% & above but below 10%	50% of difference between estimated cost put to tender and bid amount
2.	From 10% & above but up to 14.99%	150% of difference between estimated cost put to tender and bid amount

(B) Amendment to Para-3.5.5 (V) Note-III of O.P.W.D. Code, Vol-I by inclusion/ modification:

Note-III- For availing incentive clause in any project which is completed before the stipulated date of completion, subject to other stipulations it is mandatory on the part of the concerned Superintending Engineer to report the actual date of completion of the project as soon as possible through fax or e-mail so that the report is received within 7 (seven) days of such completion by the concerned Additional Chief Engineer, Chief Engineer & the Administrative Department.

The incentive for timely completion should be on a graduated scale of 1 (one) percent to 5 (five) percent of the contract value. Assessment of incentives may be worked out for earlier completion of work in all respect in the following scale:

Before 30% of contract period = 5% of Contract Value.

Before 20 to 30% of contract period = 4% of Contract Value.

Before 10 to 20% of contract period = 3% of Contract Value.

Before 5 to 10% of contract period = 2% of Contract Value.

Before 5% of contract period = 1% of Contract Value.

ANNEXURE-V

v) Amendment to Para-3.2.8 Note-II of O.P.W.D. Code, Vol-I by inclusion:

Note-II- In case of tender accepted below schedule of rate, the tender amount excluding centages shall be treated as sanctioned amount and allotment will be limited to that extent. Any deviation in scope of work affecting the agreement amount in such an agreement will be governed by the relevant provisions of O.P.W.D. Code.

ANNEXURE-VI

vi) Amendment to Appendix – XXX (Bills) Clause-21 of O.P.W.D. Code, Vol-II & to the Clause-6 of P1 contract:

Bills –Clause-21- For works above value ₹5.00 lakh in civil works and work value above ₹1.00 lakh in electrical/P.H. Works the J.Es & A.Es will be required to submit bill for each ongoing work on 20th or next working day of every month to the concerned E.E. The E.E. on receipt of the bill will take steps for payment of the same by 30th or the next working day during the month. The E.E. in charge of the Division will furnish a certificate to the Chief Engineer with copy to the concerned S.E. that the bills for all ongoing months have been paid failing action will be initiated against the erring officer.

ANNEXURE-VII

vii) Amendment to Para-3.5.18 Note-VIII of O.P.W.D. Code, Vol-I

Note-VIII- Before acceptance of tender, the successful bidder will be required to submit a work programme and milestone basing on the financial achievement so as to complete the work within the stipulated time and in case of failure on the part of the agency to achieve the milestone liquidated damage will be imposed.

Accordingly, relevant existing codal/ contractual provision stands modified with this office memorandum.

WORK PROGRAMME

Name of the Work: "Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."

1st Month

2nd Month

3rd Month

4th Month

5th Month

6th Month

7th Month

8th Month

9th Month

10th Month

11th Month

12th Month

SECTION – 3

GENERAL RULES & DIRECTIONS (FORM P1)

ODISHA PUBLIC WORKS DEPARTMENT

PERCENTAGE RATE TENDER AND CONTRACT FOR WORKS

GENERAL RULES & DIRECTIONS FOR THE GUIDANCE OF CONTRACTORS

1. The work proposed for execution will be notified in a form of e-Procurement Notice through the Govt. web-site <http://tendersodisha.gov.in>

This notice will state the work to be carried out, the items and approximate quantities thereof as well as the date of submitting and opening tenders also the amount of earnest money to be deposited and the amount of the security deposit to be deposited by the successful tenderer and the percentage if any to be deducted from bills. Copies of the specifications, designs, drawings and any other documents required in connection with the submission of tender signed for the purpose of identification by the **Sub-Divisional Officer / Divisional Officer** shall also be kept open for inspection by the contractor at the office of the **Sub-Divisional Officer / Divisional Officer** during office hours.

2. In the event of the tender being submitted by a firm it must be signed separately by each member thereof, or in the event of the absence of any partner, it must be signed on his behalf by a person holding a power of attorney authorizing him to do so.
3. Receipts for payment made on accounts of works, when executed by a firm must also be signed by the several partners, except where the contractors are described in their tender as a firm in which case the receipts must be signed in the name of the firm by one of the partners, or by some other person having authority to give effectual receipts for the firm.
4. The memorandum of work tendered for and the memorandum of materials to be supplied by the Public Works Department and their issue rates shall be filled in and completed in the office of the **Sub-Divisional Officer / Executive Engineer** before the tender form is issued. If a form is issued to an intending tenderer without having been so filled in and completed, he shall request the office to have this done before he completes and delivers his tender.
5. The amount of earnest money to be deposited will be **1% of the** estimated cost.
6. Any person who submits a tender shall fill up the usual printed form stating at what percentage he is willing to undertake the work. Incomplete tender and percentage rate he willing to undertake the work specified in the said form of invitation to tender or which contains any other conditions of any sort, or omit to note the time within which the work can be finished or which are not accompanied by the required earnest money will be liable to rejection. No single tender shall include more than one work. But contractors who wish to tender for two or more works shall submit a separate tender for each work. Tender shall bear the name of the work to which they refer should be written outside the envelope.
7. The Engineer or his duly authorized assistant will open the tenders in the presence of any intending contractors who may be present at the time and will enter the amounts of the several tenders in a comparative statement in a suitable form.
8. The Authority inviting the tender shall have the right of rejecting all or any of the tenders.
9. In the event of a tender being selected for acceptance the Engineer who opened the tenders will, if he is competent to accept the tender, inform the tenderer of the selected tender who shall there upon sign copies of the

specification and other documents with the tender. The tenderer of the selected tender shall also deposit the required amount of the security money within the prescribed time. If the tenderer fails to deposit the required amount of the security money within the prescribed time the Engineer may reject the tender.

If the Engineer is not competent to accept the tender himself, he will inform the tenderer of the tender which he decides to recommended for acceptance. Such tender shall thereupon sign forthwith copies of the specification and other documents mentioned in rules 1 and 4 and shall deposit the required amount of the security money within the prescribed time. The tender with the specification and other documents signed by the tenderer will then be forwarded for acceptance to the Engineer who is competent to accept the same. If the said Engineer rejects the tender the security money deposited shall be refunded to the tenderer.

10. When a tender is selected for acceptance, the tenderer shall deposit the required amount of the security money. No tender shall be finally accepted until the required amount of the security money has been deposited.

11. The amount of security money to be deposited by the tenderer whose tender is selected for acceptance shall be 2% percent of the estimated value of the work and towards this amount the earnest money already deposited by him shall be credited. At least half of this security inclusive of the earnest money shall be deposited the tenderer within such time as may be notified to him in writing by the officer opening the tender, failing which tender shall be liable to rejection. Any balance of the security money outstanding after completion of the contract with the tenderer may be made up by deduction of 5% of the amount of each payment to be made to his under clause 7 of the condition of contract for work done under the contract. Taxes as per provisions of Government shall be deducted from the bills of tenderer.

12. When tender has been selected for acceptance and the required amount of the security money has been deposited the Engineer shall scrutinize all pages of the form of item, Rate Tendered and Contract for works to see that the form has been properly filled up and signed by the contractor and the signature witnessed. He shall then, if he is competent to accept the tender, sign the acceptance of the tenders or if he is not so competent to, shall send the form for signature of the acceptance of the officer competent to accept it.

13. All tenderers are required to submit a list of works, which are in hand at the time of submitting their tenders. The list of works are required to be submitted in the proforma by the **Executive Engineer** under whom he has executed the work in order to judge their past performance (**vide Works Department Circular No.15443 dt.01.08.2005.**)

14. The earnest money deposited is liable to be forfeited to Govt. if the tenderer backs out from the offer before acceptance of the tender by the competent authority.

15. T.D.S (Tax Deducted at Source) towards GST will be deducted at the rate prescribed in the Odisha Goods and Service Tax (Amendment) ordinance 2017 & as amended from time to time.

16. ~~A separate and specific Bank Account may be opened to keep the security deposits deducted from the running bills in any Nationalized Bank only in the name of concerned Executive Engineer / FA & CAO, but not in personal name.~~

SECTION-4

TECHNICAL SPECIFICATION

1.0. GENERAL SPECIFICATION

The enclosed drawing in the bid document gives broad dimensions and outline of the works to be executed through this contract. These drawings may however be revised/ modified from time to time and supplementary additional drawing may also be issued as per necessity. During the course of execution there may be changes in dimension, specifications and shape of components. These changes in the drawing can be done without in any way deviating the terms of the contract and the contractor is to execute the work as per revised drawings and specifications at the same rate as agreed upon for the work awarded under the original contract. The contractor shall do no work without proper drawings. He shall check all drawings and specifications carefully and advise the Engineer-in-charge if any error and omission are discovered where upon the Superintending Engineer will prepare revised additional drawings and specifications and may be required to suit the stage of the work.

Where the drawings are not consistent with the text of the specifications, the text shall govern. The rates shall be for finished items of works as per description in the schedule of quantities and according to drawings, specification and conditions of the contract. The rates quoted shall be for execution of finished items of work & the specifications of which confirm to the details furnished in the Agreement and provisions in Bureau of Indian Standards and shall include all general and incidental charges which will not be paid separately. Such general and incidental charges are listed in succeeding Para for the convenience of the tenderers but are not exhaustive. Omission of any such items here in but required for delivering finished items of work, shall not be plea, that such items are not covered by the rates quoted.

Formation and maintenance of haul roads including river and drainage crossings within the work site. The existing approaches and haul roads, if any, under the control of the Department may be made use of but improvement, if required, shall be done by the contractor at his own cost.

Labour and material required for the construction of reference points, bench marks, pillars, diversions, signboards, road signals etc. for setting out works shall be at contractor's cost. Scaffolding and gangways as and when required for the work will be done by the contractor at his own cost. No additional payment in this regard, will be entertained. The rate includes all leads, lifts & delifts.

Form work complete includes cost of materials, labour, maintenance, erection dismantling and removal.

Construction of coffer dam, dewatering of any water that may accumulate in the areas required for carrying out the items under schedule of quantities includes the initial dewatering of the pond formed after the formation of coffer dam or any type of cross bund and all seepage that may accumulate in the area before or during construction.

Protection of the components of work during the rainy season & khariff irrigation supply shall be the responsibility of the contractor. The responsibility for the safety of the structure rests, entirely on the contractor and any damages that may occur, has to be made good by the contractor at his own cost.

The sequence of construction adopted by the contractor shall have to be approved by the Engineer-in-Charge.

The contractor has to make his own design for coffer dam or any type of cross bund required during course of execution. All materials for the coffer dam or cross bund shall be arranged by the contractor at his cost. The contractor shall maintain the coffer dam/cross bund till completion of the work.

QUALITY CONTROL:

Before collecting materials required for execution of the respective items of work as laid down in the schedule of quantities and in the detailed specifications described hereafter in the subsequent sections, the contractor shall ensure that samples of materials proposed to be used are first approved by the Engineer-in-Charge. When directed the samples of materials proposed to be used should be furnished to the Departmental laboratory i.e. Quality Assurance Division, Bariniput, Jeypore

All such testing charges shall be borne by the contractor. The contractor will provide necessary assistance if required for collection of samples.

The contractor is liable to pay for any test which is not included in the agreement but required in the opinion of the Engineer-in-Charge during execution of the work for which no additional payment will be made to the contractor.

On the basis of satisfactory test results confirming to technical specification, collection of materials shall be started in the field. The testing of materials shall be checked in the field Laboratory by the Junior Engineer/ Assistant Engineer of the Department as well as staff of A.R.O / Superintending Engineer of Quality Assurance Division, Bariniput, Jeypore. If the field test result is found unsatisfactory, the materials shall be rejected and action taken to remove the same from work site by the contractor at his own cost. In no case the defective materials shall be used in the work.

On receipt of notice from the Engineer-in-charge and on observation of Superintending Engineer of Quality Assurance Division, Bariniput, Jeypore the contractor will rectify the defect in stipulated period at his own cost. If the defects are not rectified in the stipulated period, the Engineer-in-charge shall assess the cost, get the defect rectified and recover the same from the dues of the contractor.

A quarry chart indicating possible source of materials may be seen in the office of the No claim for carriages of water whatsoever will be entertained.

Decision regarding usefulness of excavated materials rests fully on the Engineer-in-Charge. However, he may take advice of Quality Control Organisation or higher authorities if required.

SETTING OUT OF WORK

Temporary bench marks shall be fixed at every 0.5 Km interval connecting permanent benchmarks available near major structure site. The Contractor shall establish additional reference Bench Marks as may be needed at his own cost for facilitation the setting out and taking levels for measurement of work, with the approval of the Engineer-in-charge. The Bench Mark shall be marked on a concrete pillar 30cm. (L) x30cm.(b)x75cm.(d) which shall be embedded 55 cm into firm ground and projecting 20cm.above the ground. The Bench Mark pillar shall be constructed in plain cement concrete of M-10. The pillar shall be well protected from being disturbed. The RL of bench mark shall be conspicuously carved and painted on the pillar.

Before starting any work and during execution (if required), the contractor shall erect reference Bench Marks, reference lines and check profiles at convenient locations as per the direction of the Engineer-in-Charge. The center line of the canal/embankment and the reference line for all alignments for demarcation purpose shall be laid by dug-belling on the ground.

Centre line of the canal/embankment shall be marked at 30M.intervals. Profiles of canal/ embankment in filling and in moderate cutting shall be marked at 50M.intervals in straight reaches and at 25M. Intervals in curves.

To ensure correctness of execution, the edges of cutting, the outer toe lines of canal/embankment in filling should be marked by fixing pillars or pegs at suitable intervals or by dug belling.

The check profiles shall be located 15meter apart or longer as directed by the Engineer-in Charge to serve as a guide for execution on all slopes and steps to the elevations. All important levels and all reference points with respect to bench marks and reference lines shall be fixed and co-related by the contractor as per directions of the Engineer-in-Charges.

The zones of full cutting section, full filling section, partial cutting and filling sections shall be separated by conspicuous demarcation in the field. The curves in canal/embankment alignment shall be marked on the ground by fixing pegs at very closer intervals and joining the peg-point by dug-belling to a suitable depth. The locations of different structures indicated in construction drawing shall also be clearly marked on the ground along with the alignment of the canal/embankment. The control structure locations of off-taking canals shall also be clearly demarcated, so that unnecessary excavation or filling at these locations can be avoided. The spoil dumping zones shall clearly be demarcated in the field, these zones should be at last 2m. beyond the location of catch water drains.

To ensure accuracy in execution of cutting, the canal embankment, spoil banks and the structures, their layout shall be given in an appropriate manner with pegs, suitably placed.

CLEARING AND GRUBBING

The portion of the right-of –way where required for construction the work under these specifications shall be cleared of all tree, bushes, rubbish and other objectionable matter. Trees designated by the Engineer-in-charge shall not be cut and shall be protected from injury. Such cleared material shall be disposed of as described in sub-paragraph “C”. The clearing operation shall be in accordance with clauses 4.1, 4.1.1., 4.2 and 4.3. of I.S 4701-1982 Indian Code of Practice for earth work in canals.

The area described or shown on the relevant site plan shall be cleared of all obstructions, loose stones and of all kinds of rubbish. All brushwood shall be cleared and the roots grubbed up. No trees shall be cut down and removed without the instructions of the Engineer-in-Charge.

The products of the clearing shall be stacked in such place and manner as may be ordered by the Engineer-in-charge and the ground shall be left in a perfectly clean condition. All products of the clearing shall be the property of Government and shall be disposed of as per the direction of Engineer-in-charge. All holes or hollows, whether originally existing or produced by digging up roots shall be carefully filled up with earth and levelled off, as directed.

The disposal of cleared and grubbed material shall be in accordance with clause 4.1.1 of I.S. 4701-1982 code of practice for earthwork on canals. All waste materials to be burnt shall be piled neatly in suitable condition shall be burnt completely to ashes. Piling of waste materials for burning shall be done at such a location and in such a manner as would not cause any fire risk. Necessary precaution shall be taken to prevent spreading of fires to areas beyond the limits of cleared areas.

For the clearance of light jungles, heavy jungle with or without uprooting etc., payment will be made as provided for in the tender documents. Separate payment will not be made for clearing of site and grubbing including disposal of the cleared and grubbed material required under the above para unless and otherwise specified in the contract document. The contractor shall include the cost thereof in the price bid in the bill of quantities of the contract for the relevant finished item of work for which clearing and grubbing as mentioned in the above Para are required. No payment towards removal of small stones and boulders of size less than 0.014 cubic meter will be made, and the rate quoted for excavation will be considered to include this item. However, benching will be paid as separate item, per 1(one) running meter of bench at the rate provided for in the tender documents.

USE OF WATER

The Contractor shall procure and apply water all the items of works at his own cost as the same has been included in the price bid in the bill of quantities of the items of work for which the water is used.

DAMAGES BY MONSOON OR FLOOD / CYCLONE

Damages due to rain or flood or have to be made good by the Contractor till the work is handed over to the department. The responsibility for making well to the damages rests with the Contractor. No extra cost is payable for such operations and the Contractor shall, therefore, have to take all necessary precautions to protect the work done during the construction period.

COMMENCEMENT OF WORK

Before commencement of work, initial levels to indicate existing ground levels shall be taken at 15m./30m Intervals longitudinally along the canal/embankment alignment. The level points transversely along the cross sections shall be maximum at 5m. Intervals in flat ground and 1.5- 2M. in undulating terrain. The cross sections shall be extended beyond the limits of work to a suitable distance and minimum 5 M. beyond the toe lines of slopes on both the sides. The intervals stipulated shall be made closer depending on the topography or stipulation made by the Engineer-in-Charge.

All initial levels shall be recorded in ink in the level books issued by the Engineer-in-Charge and shall be signed by the Junior Engineer/Assistant Engineer when he records the levels. The Assistant Engineers and Superintending Engineer shall exercise checks strictly in accordance with the codal provisions.

Actual construction work shall not be allowed to start unless the above formalities are fulfilled. If the work is awarded to any agency, the level shall be recorded in the presence of the contractor or his authorized agent. The contractor or his authorized agent shall sign each page of the level book/ field book in token of acceptance. These cross sections shall form the basis of all future measurements and payments. Each dimension shall be measured to the nearest 0.01m. Areas shall be computed to nearest 0.01sqm., volume shall be computed to nearest 0.01 cubic m..

All lead in manual means will mean lead up to 225 m. All lift will mean lift up to 7.5 M.

2.0 EARTH WORK

2.1.1 RECONSTRUCTION / REHABILITATION OF EMBANKMENT

The contractors shall execute the work to the lines, grade and section as per drawing and in accordance with the specification and relevant clause / clauses of relevant Bureau of Indian Standard codes unless otherwise specified. Construction of all approaches and haul roads and their maintenance shall be the responsibility of the contractor. The contractor shall ensure good workmanship and quality and shall ensure besides other aspects fulfilment of the following specific requirements to the satisfaction on the Engineer-in-Charge.

To work is to be executed as per design, drawing and specifications and direction of the Engineer-in-charge.

2.1.2 BORROW AREA

Earth shall be used from borrow areas located at a distance of not less than 10h or 30m., whichever is greater, from the toe of the embankment where 'h' is the height of embankment.

Borrow areas shall be stripped of top soil and cleared of stumps, roots, bushes, rubbish and other objectionable materials.

Soils of approved quality, to the satisfaction of the Engineer-in-Charge shall be used which shall be free from muck, rubbish, silt and cobbles of size larger than 75 mm.

Watering of borrow area shall be done wherever necessary after taking moisture content test. Borrowing of earth is the responsibility of the contractor at his own cost and risk.

2.1.3 PLACEMENT (EARTHWORK)

- Contractor shall reconstruct/rehabilitate the embankment to the section and grade level as per drawing supplied to him to full satisfaction of the Engineer-in-Charge.
- All trees, bushes, roots and other vegetation from the base of the embankment shall be removed.
- The base of the portion of the embankment to be rehabilitated shall be stripped to a depth of 20 cm and roots and other vegetation shall be removed. All holes/hollows produced by digging shall be carefully filled up with earth and well rammed.
- The longitudinal slope of the existing damaged embankment shall be cut to the slope not steeper than 1:4 and the surface so prepared shall be scarified and made loose for a depth of 15 cm before laying of soil. Watering of scarified surface shall be done. The damaged side slopes of the bank shall be benched in convenient steps of depth not more than 30cm for proper bonding of the freshly laid soil with the old embankment.
- The earth fill shall be laid in layers of 15 cm.(canals) to 25 cm (other embankments) in depth in such a way that cobbles, gravels not exceeding 7.5 cm. are well distributed throughout the materials and not nested in any position within or under the embankment. Clods shall be broken to 7.5 cm.
- Under no circumstances the embankment shall be widened by material dumped from the top of the existing embankment.

- Adequate quantity of watering is to be done at the junction of the freshly laid soil with the old embankment for proper bonding.
- If initial moisture content in the soil is less than the optimum moisture content, then water shall be sprinkled over the freshly laid layer before compaction.
- Extra earth used for compaction of slopes should be used in the upper layer of embankments. Compaction shall be done with vibratory roller and plate compactor.
- Choice of equipment shall be governed by the site conditions, nature of job/space etc. and it shall be got approved from the Engineer-in-Charge.

2.2 EMBANKMENT

The thickness of compacted layers shall be restricted to 15cm and shall be compacted so as to achieve dry density of at least 95% under optimum moisture content.

Where road is proposed to be constructed over the embankment the top 0.5m of the embankment shall be considered as the sub grade for the road and shall be compacted to 97% of proctor density.

Soil samples shall be taken from each compacted layer to ascertain the degree of compaction. Also moisture content is to be measured from each layer by taking samples. A tolerance of moisture content to the extent of +1% of O.M.C. shall be permitted.

2.2.1 EARTH WORK FOR WIDENING EXISTING EMBANKMENT

When an existing embankment and / or sub grade is to be widened and its slopes are steeper than 1 vertical to 4 horizontal, continuous horizontal benches, each at least 300mm wide shall be cut into the old slope for ensuring adequate bond with the fresh embankment / sub grade material to be added. The materials obtained from cutting of benches could be utilized in the widening of the embankment / sub grade. However, when the existing slope against which the fresh material is to be placed is flatter than 1 vertical to 4 horizontal, the slope surface may only be ploughed or scarified instead of resorting to benching.

Where the width of the widened portions is insufficient to permit the use of conventional rollers, compaction shall be carried out with the help of small vibratory rollers / plate compactors / power rammers or any other appropriate equipment approved by the Engineer. End dumping of materials from trucks for widening operations shall be avoided except in difficult circumstances when the extra width is too narrow to permit the movement of any other types of hauling equipment.

2.2.2 SETTLEMENT ALLOWANCE

Earthwork on the embankment shall be compacted mechanically using vibratory roller. In the mechanically compacted earth fill compacted to 95% of proctor density, no settlement allowance shall be provided.

2.2.3 MEASUREMENT AND PAYMENT

The unit price should include arrangement of borrow area, cost of excavation, loading, transportation, unloading at site, breaking clods, spreading to proper thickness including watering for compaction where necessary.

The unit price shall also include stripping of borrow area, preparation and maintenance of haul road, dressing of side slopes with all other general and incidental operations connected with the work.

The payment shall be made on volumetric basis for the quantities of excavation/filling to the required extent. The cross sections shall be taken initially before commencement of work. On Completion of excavation final cross sections shall be taken at the same points longitudinally and transversely. This cross section as quantities between initial and final cross section shall be marked on the initial cross section shall be worked out as per design section and paid accordingly. Running bill shall only be paid for finished sections of embankment.

2.3 EXCAVATION FOR STRUCTURES

2.3.1 GENERAL

Excavation for the foundation of structures shall be to the elevation shown in the drawings or as directed by the Engineer-in-Charge. In so far as practicable the materials removed in excavation for structures shall be used for back filling.

2.3.2 FOUNDATIONS FOR STRUCTURES

All trenches in soil, other than rock or hard compact soil more than 1.5m deep, into which men enter, shall be securely shored and strutted and timbered.

All trenches in soil, soft or fissured rock or hard soil exceeding 2m. in depth, into which men enter, shall be securely shored and timbered.

Notwithstanding anything said above, it shall be understood that the need for shoring shall receive careful and frequent consideration even in trenches of less than 1.5m or 2m. in depth (as the case may be). When there is doubt as to the safety of the work without shoring, no further excavation or other work shall be continued until adequate shoring is provided.

Where the sides of trenches are sloped but not within 1.5m. of the bottom, the vertical sides shall be shored and the shoring shall extend at least 30cm. above the vertical sides. When open spaced sheathing is used, toe board shall be provided to prevent materials rolling down the slope and falling into the part of the trench with vertical walls.

Shoring and timbering shall be carried along with the opening of a trench but when conditions permit protection

work, such as sheet piling may be done before the excavation commences.

All loose stones, projecting clumps of earth, pockets of materials which might come down on the workers in the trench or any condition which is a hazard, shall be either removed or the excavated sides adequately braced and the trench suitably guarded. On steep slopes, workmen shall not be permitted to work one above the other.

The contractor shall prepare the foundations at structure sites by methods which will provide firm foundation for the structures. The bottom and side slopes of common excavation upon or against which the structure is to be placed shall be finished to the prescribed dimensions and the surfaces, so prepared shall be moistened and tamped with suitable tools to form firm foundation upon or against which the structure is to be placed. The contractor shall prepare the foundation of the structures as shown on respective drawings. The horizontal foundation material beneath the required excavation shall be moistened if required and compacted in place.

If the Engineer considers it necessary to consolidate the foundation strata by grouting cement slurry, then drilling and grouting or any other foundation treatment shall be done by the contractor as directed by the Engineer and the payment will be as per the general contract document in respect of extra items. Density of the compacted foundation materials and the testing thereof shall be in accordance with relevant I.S. specification.

Separate payment will not be made to the contractor for moistening and compacting the foundation of structures. The contractor shall include cost thereof in the prices bid per cubic meter of the item of the bill of quantities for preparation of foundation.

When unsuitable material is encountered in the foundation for structure the Engineer-in-Charge will direct additional excavation to remove the unsuitable materials. The additional excavation shall be refilled as follows. In excavation in soils, the over excavation shall be filled in by selected bedding material and mechanically compacted by suitable compactors. In excavation in rock it shall be filled by cement concrete M-7.5 No. separate payment for excavation, backfill will be made.

Should remains of old buildings and structures are met with, the material shall be removed with wedges and levers. Blasting shall not be allowed, without the permission in writing, of the Engineer.

If bad ground or loose soil is met with, the contractor shall be responsible for reporting the fact to the Engineer who shall issue such orders as may be necessary. For extra excavation concrete and masonry arising from bed ground, the contractor shall be paid treating this as additional quantity as per the contract rate of contract documents.

All excavated earth, which is unfit or surplus to requirements for filling in shall be spread as instructed by the Engineer at the contractor's expense.

2.3.3 OVER EXCAVATION

If at any point in common excavation the foundation materials are excavated beyond the lines required to receive the structure, or if at any point in common excavation the natural foundation material is disturbed or loosened during the excavation process, it shall be suitably and mechanically compacted in place or where directed, it shall be removed and replaced as follows. In excavation in rock, it shall be filled by cement concrete M-7.5. Any and all excess excavation or over excavation performed by the contractor for any purpose or reasons except for additional excavation as may be prescribed by the Engineer-in-Charge and whether or not due to the fault of the contractor shall be at the expense of the contractor. Filling for such excess excavation or over excavation shall be at the expense of the contractor.

2.3.4 DISPOSAL OF MATERIALS

All suitable materials removed in excavation or as much thereof as may be needed as directed by the Engineer shall be used in the construction of embankments, and for selected bedding materials or for backfill around structure. If there is an excess of material in the excavation, it shall be used to strengthen the embankment on either side of the Flood protective embankment, deposited in low areas as directed by the Engineer. The disposal of the excavated material shall be in accordance with clauses 8.1 and 8.2 of BIS 4701.

2.3.5 MEASUREMENT AND PAYMENT

Foundation for structure will be measured for payment, for the approved section, of foundation and level. The contractor will have to make his own arrangements for shoring, strutting provisions of adequate slopes for the sides to prevent slips etc. and no separate charge will be paid for any incidental charges arising either during excavation of foundation or construction of the structure.

The quantity for payment of excavation in soil and rock shall be arrived at by taking pre levels and finished levels at respective strata. Block levels will be taken at one meter or less intervals, the levels shall be plotted on a graph sheet and average levels arrived at for the purpose of determining the quantity of excavation. The contractor's signature in token of his acceptance shall be recorded in the cross section sheets. Final payment shall be based on levels only.

Payment for excavation for structures shall be made at the unit price per cubic meter bid. The rate for excavation for structures shall include the cost of all labour and materials for coffer dam and other temporary construction, cost of all pumping and dewatering, cost of all other work necessary to maintain the excavation in good order during construction, of removing such temporary construction where required and shall include the cost of disposal of the excavated material.

3.0 RIP RAP & LAUNCHING APRON

3.1.1 GENERAL

The rip rap may be hand placed or dumped by machines. The thickness of the rip rap shall be measured normal to the slope of the embankment.

3.1.2 QUALITY OF RIP RAP STONE

Rip Rap and spall material shall be controlled in quarry for quality, gradation and size. Rip Rap and spalls obtained from rock excavation shall be checked for quality, gradation and size before lifting.

The stone for Rip Rap should be dense, resistant to abrasion and is free from cracks, seams, shale partings, conglomerate bonds, calcareous materials and other defects that would tend to increase their susceptibility to destruction by the action of water and weather.

The finished Rip Rap should present a reasonably uniform surface free of loose stones.

3.1.3 TEST FOR STONE

Soundness - The rock fragments shall be tested for its soundness as per IS-2386-Part-II.

Abrasion - The rock fragments shall be tested for its abrasion as per IS-2386-Part IV.

Water absorption test – As per IS-2386.

THICKNESS OF RIP RAP / LAUNCHING APRON

In no case the minimum thickness of hand placed Rip Rap/ Launching apron and dumped rip rap shall be less than 30 cm and 45cm respectively.

PLACEMENT OF RIP RAP / LAUNCHING APRON

Hand placed Rip Rap

The hand placed rip rap shall consist of one man stone (40 to 45 Kg.) laid on edge starting at the bottom. The stone shall be laid compactly with staggered joints and so matched & interlocked that, they shall be keyed together with minimum of joint space. Then rock fragments and spalls shall be driven by a hammer into interstices to wedge the rip rap in place.

The hand placed rip rap shall preferably be laid in one course and the layer thickness is same at the stone size. If two layers of stones are used the header stone extending through both layers and spaced at about 1.5m. shall be used. In two layers placing the tops layer stones shall be larger.

Dumped Rip Rap / Launching Aprons

The dumped rip rap/ Launching apron shall consist of boulders or blasted rock fragments. It shall be dumped mechanically on the filter layer either over upstream face from embankment level during raising of embankment or after the embankment has been completed.

MEASUREMENT AND PAYMENT

Thickness of riprap shall be measured at a number of locations and the payment shall be made towards the average thickness arrived out of the measurements. Payment for rip-rap shall be made at the applicable unit price per cubic meter in the bill of quantities for rip rap which unit price shall include the cost of procuring or finishing, hauling and placing the rock for rip rap including the rock spalls.

CRATES

Crates shall be of size 100cm X 100cm X 100cm made out of galvanized iron wire of 10-SWG and stitching with 20 SWG wire tying together with all sides filled with hard stones of not less than 50kg in weight or, 30 cm size blocky in shape rather than elongated and more nearly cubical.

MEASUREMENT AND PAYMENT

Measurement of Crates shall be made in number. The quantity of hard stone will be measured in volume after deducting minimum 1/6th Voids. Payment for crates will be made in numbers and hard stones as cubic meter after deduction of voids at the applicable unit price per cubic meter in the bill of quantities.

ROUGH STONE DRY PACKING

DESCRIPTION OF ITEMS

Rough stone dry packing in aprons and revetments with approved quality of hard granite stones of 30 cm size and above to required shape with all leads, lifts and delifts including cost, carriage, taxes, royalty etc. of stone, labour for preparation of surface for packing, dewatering if required and all other incidental charges etc. complete as per drawing, specifications and direction of the Engineer-in- Charge.

GENERAL:

The pitching materials shall consist of the most durable rock fragments of approved quality selected for the purpose. Stone shall be used from the surplus usable excavated rubble or from the approved quarries, if required and shall be subjected to thorough inspection and approval by the Engineer. The quality of individual stones shall be dense, sound and resistant to abrasion and shall be free from cracks, seams, shale partings, conglomerate, bands and other defects that would tend to increase unduly their susceptibility to destruction by water and weathering action. The shape of individual stones shall be angular. Stone having thickness less than 50% of their maximum dimensions shall not be used for pitching.

The compacted embankment, the slope of which is to be protected with stone pitching, shall be trimmed to the lines and slopes as prescribed on the drawings or as directed by the Engineer from time to time. The earth obtained from this trimming shall be laid on top of the embankment if required or as directed by the Engineer.

Pitching shall be hand placed on upstream slope of the canal embankment. The thickness of pitching shall be as

indicated on the drawings. The thickness shall be measured normal to the slope of the embankment. Launching apron shall be hand placed in horizontal layers and upstream and downstream of the structures and its thickness shall be as indicated on the drawings.

Before laying the pitching/ launching apron on level ground or on sides of the banks, the receiving surface shall be trimmed to the required slopes and profiles put by means of lines and plates at regular intervals. Depressions shall be filled up and thoroughly compacted. Pitching on inverted filter, if any, shall be started from the end and built in courses upwards. Stones shall be placed by derrick or by hand and so placed that the largest dimensions are perpendicular to the face of the slope. The larger stones shall be placed in the bottom course and for use as headers for subsequent courses.

All interstices between adjacent stones shall be filled with spalls of proper sizes and wedged in with hammer to ensure tight packing.

TEST FOR STONES

Soundness - The rock fragments shall be tested for its soundness as per IS-2386-Part-II.

Abrasion - The rock fragments shall be tested for its abrasion as per IS-2386-Part IV.

Water absorption test – As per IS-2386.

MEASUREMENT AND PAYMENT

Measurement for payment will be made on the basis of volumetric measurement of finished stone packing. The unit price per cubic meter in the bill of quantities is inclusive of trimming the earth to required profile, slopes and grade and/ or preparing level at suitable intervals as directed, to have uniform base .

4.0 CONCRETE WORKS

4.1 GENERAL CONCRETE REQUIREMENTS

4.1.1 Composition

General:- Concrete shall be composed of cement, sand, coarse aggregate, water admixtures (if any) as specified and all well mixed in batching plant by weight or by concrete mixture by volume and brought to the proper consistency. Batching plant shall conform to I.S. Code No. 4925- 1968.

For works in which water tightness is required the specification in IS 3370-1965

Mixing

Concrete shall be mixed in a mechanical mixer and shall be as dense as possible, plastic enough to consolidate well and stiff enough to stay in place on the slopes.

Mixing shall be continued until there is a uniform mixing of the materials and the concrete is uniform in colour and consistency. The time of mixing shall be as shown in Table 1 of IS 457-1957 reproduced below.

Capacity Of mixer	Minimum Time of Mixing	
	Natural Aggregates	Manufactured Aggregates
All Mixer	2 minutes	2.5 minutes

B. Nominal maximum size of Aggregates

For sizes of aggregates IS 383-1970 shall apply. The coarse aggregate to be used in concrete shall be as large as practicable, consistent with required strength, spacing of reinforcement and embedded items, and placement thickness. The size of the coarse aggregates to be used will be determined by the Engineer-in-Charge and may vary incrementally according to the conditions encountered in each concrete placement. Nominal maximum size of aggregate for concrete in structures and canal lining shall be as indicated in the relevant drawings appended to the contract documents. Smaller coarse aggregate than specified shall be used where in the opinion of the Engineer-in-Charge that proper placement of concrete is impracticable with the size of the aggregate specified in the drawings.

C. Mix proportions

The proportions of various ingredients to be used in the concrete for different items of the work are given in the bill of quantities. In proportioning concrete; the quantity of both cement and aggregate should be determined by volume. Water shall be either measured by volume in calibrate tanks or weighed. Batching plant shall conform IS 4925-1968. (Indian Standard Specification for batching and mixing plant). All measuring equipment shall be maintained in a clean serviceable condition and their accuracy periodically checked. Adjustments shall be made as directed to obtain concrete having suitable workability, impermeability, density, strength and durability without the use of excessive cement. The acceptance or rejection of concrete shall be as per the acceptance criteria laid down in Clause 15 of IS 456-1978.

The net water cement ratio exclusive of water absorbed by the aggregate shall be sufficiently low to provide adequate durability in concrete. The water cement ratio or various grades of concrete shall be as determined and ordered by the Engineer-in-Charge.

Admixtures of pozzolanas, if ordered, shall conform to the requirements specified in I.S. 9103-1979 (Indian Standard Specification for admixture for concrete).

D. Consistencies:

- i. The slump of concrete at the placement shall be as follows

No.	Place conditions	Degree of workability	Value of workability
	Concreting of the light	Medium	25mm to 75mm slump
	Concreting of heavily reinforced sections without vibration		75mm to 125mm slump for 20mm aggregate

- ii. For plain concrete work, slump requirements mentioned in Item 1 above are applicable.
 iii. Lining with slip-form machine 60 to 70 mm, slump and 50 mm slump for concrete paver finisher.

If the specified slump is exceeded at the placement, the concrete is unacceptable. The Engineer-in-Charge reserves the right to require lesser slump whenever concrete of such lesser slump can be consolidated readily into place by means of vibration specified by the Engineer-in-Charge. The use of an equipment which will not readily handle and place concrete of the specified slump will not be permitted.

To maintain concrete at proper consistency, the amount of water and sand batched for concrete shall be adjusted to compensate for any variation in the moisture content or grading of the aggregates as they enter the mixer. Addition of water to compensate for stiffening of the concrete mixing but before placing will not be permitted. Uniformity in concrete consistency from batch to batch will be required.

4.1.2 Concrete quality control measures and concrete quality assurance test programme Concrete quality control measures

- The contractor shall be responsible for providing quality concrete to ensure compliance of the contract requirements.
- Making and curing concrete test specimens in the field : will conform to I.S. 516-1959.
- Capping cylindrical concrete specimens will confirm to IS 516-1959.
- Compressive strength of concrete specimens will conform to IS 516-1959.

Sampling procedure and frequency

- A random sampling procedure shall be adopted to ensue that each concrete batch has a reasonable chance of being tested i.e.the sampling should be spread over the entire period of concreting and should cover all mixing units.
- Frequency**

The minimum frequency of sampling of concrete of each grade shall be in accordance with the following:

Quantity of concrete in cum	Number of samples
01 to 05	1
6 to 15	2
16 to 30	3
31 to 50	4
51 to above for each additional 50 cum or part thereof.	4 plus one additional sample

Note : Atleast one sample shall be taken during each shift.

TEST FACILITIES

The contractor shall furnish free of cost samples of all ingredients of concrete for testing. He should also supply free of cost, the samples of all the ingredients of concrete used in the work for the test to be conducted by the Engineer-in-Charge or any officer nominated by him.

Contractor to furnish drawings and data

Not less than 30 days prior to start of installation of the contractors plant and equipment for processing, handling, transporting, storing and proportioning concrete, the contractor shall submit drawings and data to the Engineer-in Charge for approval, showing the arrangement of plant etc. The drawing and data shall provide a description in sufficient details for an adequate review of the facilities and equipment the contractor proposes to provide at site of work.

4.1.3. Cement

a. General

Cement shall conform to clause 4 of IS 456-1978 of the purposes of specifications. Cement used shall be any of the following with the prior approval of the Engineer-in-Charge.

- i. Ordinary or low heat Portland cement conforming to IS 269-1976.
- ii. Rapid hardening Portland cement conforming to IS 8041-1978.
- iii. Portland slag cement conforming to IS 455-1976.
- iv. Portland pozzolana cement conforming to IS 1489-1976.
- v. High strength ordinary Portland cement conforming to IS 8112-1976.
- vi. Hydrophobic cement conforming to IS 8043-1978.

The contractor shall make his own arrangements for the procurement of cement to required specifications required [for the works. Transportation from time place of supplying to the batching plant shall be in weather tight rail cars, trucks, conveyors and there means which will protect the cement completely from exposure to moisture. Immediately upon receipt at the job site, bulk cement shall be stored in dry, weather tight, properly ventilated bins until the cement is batched. They shall be emptied and cleared by the contractor when so directed by the Engineer- in-Charge. However, the intervals between required cleaning will normally be not less than 6 months. Each shipment of bagged cement shall be stored separately so that it may readily be distinguished from other shipment and shall be stored in a dry enclosed area protected from moisture. Storage of materials shall be as described in I.S. 4082-1977 (I.S. recommendation on stacking and storage of construction materials at site). To prevent under again of bagged cement after delivery, the contractor shall use bags of cement in the chronological order in which they were delivered to the job site. All storage facilities shall be subject to approval of the Engineer-in- Charge.

Water

The water used in making and curing of concrete, mortar and grout shall be free from objectionable quantities of silt, organic matter, injurious amounts of oils, acids, salts and other impurities etc. as per I.S. specification No. 456-1978. The Engineer-in-Charge will determine whether or not such quantities of impurities are objectionable. Such determination will unusually be made by comparison of compressive strength, water requirement, time of set and other properties of concrete made with distilled or very clean water and concrete made with the water proposed for use. Permissible limits for solids when tested in accordance with I.S. 3025-1964 shall be as tabulated below.

1	Organic	Maximum permissible limit 200 mg/ltr
2	Inorganic	300 mg/ltr
3	Sulphate (as SO ₄)	500 mg/ltr
4	Chlorides (as Cl)	2000 mg/ltr for plain concrete work and 1000 mg/ltr for RCC work
5	Suspended matter	2000 mg/ltr

The PH value of water shall generally be not less than 6.

If any water to be used in concrete, mortar, or grout is suspected by the Engineer-in-Charge of exceeding the permissible limits for solids, samples of water shall be obtained and tested by the Engineer-in-Charge in accordance with I.S. 3025-1964.

Sand (Fine Aggregate)

A. General

The term sand is used to designate aggregate most of which passed 4.75 mm I.S. sieve and contains only so much coarser material as permitted in Clause 4.3 of I.S. 383-1970. Sand shall be predominately natural sand which may be supplemented with crushed sand to make up deficiencies in the natural sand grading. All sand shall be furnished by the contractor from any approved sources specified in the contract. Sand as delivered to the batching plant, shall frequently as possible, the frequency for a given job being determined by the Engineer-in-Charge according to weather conditions (I.S. 456-1978). Sand as delivered to the batching plant shall have an uniform and stable moisture content. Determination of moisture content shall be made as frequently as possible, the frequency for a given job being determined by the Engineer-in-Charge according to weather conditions. (I.S. 456-1978).

B. Quality

The sand shall consist of clean, dense durable uncoated rock fragments, as per I.S. 383-1979. Sand may be rejected if it fails to meet any of the following quality requirements.

Organic impurities in sand

Colour no darker than the specified standard in clause 6.2.2 of I.S. 2386 Part II 1963 (Indian Standard method of test for aggregates for concrete part II estimation of deleterious materials and organic impurities). Sand shall be screened before use. If sand brought to site is not clean it must be washed clean in water. Fine draft sand or sea sand or sand containing saline impurities shall on no account to be used. Sodium sulphate test for soundness. The sand to be used shall pass a sodium or magnesium sulphate accelerated test as specified in I.S. 2386 (Part V) 1963 for limiting loss on weight.

Specific gravity

The sand to be used shall have minimum specific gravity of 2.6.

Deleterious substances

The amount of deleterious substances in sand shall not exceed the maximum permissible limits prescribed in table 1 clause 3.2.1 of IS 383-1970 (Indian Standard Specification for coarse and fine aggregates from natural source for concrete) when tested in accordance with I.S. 2386-1963.

C. Grading

The sand as batched shall be well graded and when tested by means of standard sieves shall confirm to the limits given in Table 4 of I.S. 383-1970 and shall be described as fine aggregates, grading zones I, II, III and IV. Sand complying with the requirements of any of the four grading zones is suitable for concrete. But sand conforming to the requirements of grading zone - IV shall not be used for reinforced cement concrete work.

Coarse aggregate

a. General

For the purposes of these specifications, the term 'Coarse Aggregate' designed clean well graded aggregate most of which is retained on 4.75 mm I.S. Sieve and containing only so much finer material as permitted for various types described under Clause 2.2 of I.S. 383-1970. Coarse aggregate for concrete shall consist of uncrushed stone, or crushed stone and partially uncrushed and crushed stone.

Coarse aggregate for concrete shall be furnished by the contractor from the approved quarries specified in the contract documents. The contractor shall, unless otherwise specified in the tender notice and subsequently on this basis in the contract, be responsible for payment of seigniorages, quarry fees etc. on all materials. Coarse aggregate as delivered to the batching plant shall generally have uniform and stable moisture content. In case of variations, clause 9.2.3 of I.S. 456-1978 shall govern during batching.

b. Quality

The coarse aggregate shall consist of naturally occurring (crushed or uncrushed) stones, and shall be hard, strong, durable, clear and free from veins and adherent coating and free from injurious amounts of disintegrated pieces, alkali, vegetable matter and other deleterious materials. Coarse aggregate will be rejected if it fails to meet any of the following requirements.

1. Los-Angles Abrasion Test

The abrasion value of Aggregates when tested in accordance with the method specified in I.S. 2386 (Part IV) using Los-Angles machine shall not exceed 30% for Aggregates to be used in concrete for wearing surface and 50% for aggregate to be used in other concrete.

2. Aggregate crushing strength test

Aggregate crushing value, when determined in accordance with I.S. 2386 (Part IV) 1963 shall not exceed 45% for aggregate used for concrete other than wearing surface and 30% for wearing surfaces. As an alternative to the crushing strength test, aggregate impact value shall be found out with the method specified in I.S. 2386 (Part IV) 1963. The aggregate impact value shall not exceed 45% by weight for aggregates used for concrete for other than wearing surfaces, and 30% by weight for concrete for wearing surfaces such as runways, roads and pavements.

3. Soundness test

The coarse aggregate to be used for all concrete works shall pass a sodium or magnesium sulphate accelerated soundness test specified in I.S. 2386 (part V) 1963 and the average loss of weight after 5 cycles shall not exceed the limits specified in clause 3.6 of I.S. 383-1970.

4. Specific gravity

The coarse aggregate shall have specific gravity of 2.60 minimum.

5. Deleterious material

The maximum quantity of deleterious materials in coarse aggregates shall not exceed the limits specified in Table 1 of I.S. 383-1970 when tested in accordance with I.S. 2386-1963.

MIXING

a. General

The concrete ingredients shall be thoroughly mixed in mechanical mixers designed to positively insure uniform distribution of all the component materials through out the concrete at the end of the mixing period. Mixing shall be done as per Clause of I.S. 456-1978. The mixer should comply with I.S. 1791-1985 (I.S. Specifications for batch type concrete mixer)

The concrete as discharge from the mixer, shall be uniform in composition and consistency from batch to batch. Workability shall be checked at frequent intervals as per I.S. 1199-1959. Mixers shall be examined regularly by the Engineer-in-Charge or his authorised Engineer for changes in condition due to accumulation of hardened concrete or mortar or to wear of blades. The mixing shall be continued until there is a uniform in colour and consistency and to the satisfaction of the Engineer-in-Charge. If there is segregation after unloading the concrete should be remixed.

Any mixer that at any time produces unsatisfactory mix, shall not be used until repaired. If repair attempts are unsuccessful, a defective mixer shall be replaced. Batch capacity shall be at least 10% of but not in excess of the rated capacity of the mixer unless otherwise authorised by the Engineer-in-Charge.

b. Central mixers

Water shall be admitted prior to and during charging of the mixer with all other concrete ingredients. After all materials are in the mixer, each batch shall be mixed for not less than the time specified by the Engineer-in-Charge. The minimum mixing time shall be 2 minutes. The minimum mixing time specified is based on average mixer performance. The Engineer-in-

Charge will adjust the minimum mixing time as required by the observations of the mix delivered from mixer. Excessive over mixing which require addition of water to maintain the required concrete consistency shall not be permitted.

In addition to I.S. 1791-1985 the mixing equipment shall conform to the following further requirements. Plant configuration shall be such that the mixing of each mixer can be observed from a safe location which can be easily reached from the control station. Provisions shall be made so that the operator can observe the concrete in the receiving hopper or bucket as it is being dumped from the mixers. Each mixer shall be controlled with a timing device which will indicate the mixing period and assure compliance of the required period of mixing. The batch plant shall be equipped with an interlocking mechanism which will prevent concrete batches from entering mixers which are not empty.

Temperature of concrete

Fresh structural concrete and fresh canal lining concrete shall be placed at temperature of between 150C to 300C. During hot or cold weather, the concreting should be done as per the procedure set in I.S. 7861- (Part- 1) 1975 or I.S. 7861 (Part II). The temperature will be determined by placing a thermometer in the concrete immediately after sampling at the site of placement. The temperature of concrete at the batch plant shall be adjusted to assure that the specified concrete temperature is attained at the placement. In case of concrete in hot weather condition, the contractor shall employ effective means such as precooling of aggregates and mixing water and placing at nights, as necessary to maintain the temperature of the concrete as it is placed at the specified limit. The methods of pre-cooling shall be subject to approval by the Engineer-in-Charge. The contractor shall not be entitled for any additional compensation due to the foregoing requirements.

Forms

a. General

Form shall be used wherever necessary, to confine the concrete and shaping it to the required lines. If a type of form does not consistently perform in an acceptable manner, as determined by the Engineer-in-Charge, the type of form shall be changed and method of erection shall be modified by the Contractor subject to approval of the Engineer-in-Charge.

Plumb and string lines shall be installed before, and maintained during concrete placement. Such lines shall be used by the Contractor's personnel and by the Engineer-in-Charge and shall be sufficient number and properly installed as determined by the Engineer-in-Charge. During concrete placement, the contractor shall continuously monitor plumb and string line form positions and immediately correct deficiencies. Forms shall have sufficient strength to withstand the pressure resulting from placement and vibration of the concrete and shall be maintained rigidly in position. Where form vibrators are to be used, forms shall be sufficiently rigid to effectively transmit energy from the form vibrators to the concrete, while not damaging or altering the positions of forms. Forms shall be sufficiently tight to prevent loss of mortar from the concrete. Chamfer strips shall be placed to produce bevelled edges on permanently exposed concrete surfaces. Interior angle of intersecting concrete surfaces and edges of construction joints shall not be bevelled except where indicated on the drawings.

Suitable struts or stiffener or ties shall be used for the form work wherever necessary. All supports shall be braced and cross braced into two directions. All splices and braces shall be secured by bolting unless specially intended otherwise. All struts shall be firmly supported against settlement and slipping, by suitable means as directed. All supports shall be cut square at both ends and firmly supported against settlement and slipping. When the form work is supported on soils, sleepers etc., shall be used to properly disperse the loads. In case, the supports rest on already completed beam or slab; suitable props shall be provided under the latter.

b. The form work shall be of well seasoned timber or steel. When timber forms are used, they shall be lined with M/S sheet or other suitable smooth faced non-absorbent materials as specified. Supports may be of timber or steel. Suitable wedges in Paris to facilitate adjustment and subsequent releasing of forms shall be provided preferably at the upper end of the supports. The details of the proposed form work and supports shall be submitted to the Engineer-in-Charge and got approved before erection.

c. In case of columns, retaining walls or deep vertical component, the height of the column shall facilitate placement and compaction of concrete and suitable arrangement may be made for securing the forms to the already poured concrete for placing the subsequent lifts. No steel ties or wires used for securing this form work shall be left exposed on the face for the finished work.

d. Suitable inserts for block outs for electrical and other service fixtures where necessary shall be provided in the required locations as specified.

e. Cleaning and oiling of Forms : At the time the concrete is placed in forms, the surfaces of the forms shall be free from encrustations of mortar, grout or other foreign material. Before concrete is placed the surface of the forms shall be oiled with a commercial form oil.

f. Removal of Forms

The stripping of form work shall conform to clause 10.3 of IS 456-1978. The contractor shall be liable for damage and injury caused by removing forms before the concrete has gained sufficient strength. Forms on upper sloping faces of concrete such as forms on the water sides of warped transitions shall be removed as soon as the concrete has attained sufficient stiffness to prevent sagging. Any needed repairs or treatment required on such slopping surfaces shall be

performed at once and be followed immediately by the permitted curing. To avoid increasing appearance in concrete that might result from swelling of forms, wood forms for wall openings shall be loosened as soon as the loosening can be accomplished, without damages to the concrete. Forms for the opening shall be constructed as to facilitate such loosening. Forms shall be removed with care so as to avoid injury to concrete and any concrete so damaged shall be repaired in accordance with paragraph 6.2.21.

g. Cost

The cost of furnishing all materials and performing all work for constructing forms, including any necessary treatment or coating of forms is included in the item of concreting made at the unit price of bid thereof in the bill of quantities.

Tolerances for concrete constructions

a. General

Tolerances are defined as allowable variations from specified lines, grades, and dimensions and as the allowable magnitude of the surface irregularities. Allowable variations from specified lines, grades and dimensions are listed as given under sub-paragraph (b) below. The intent of this paragraph is to establish tolerances that are consistent with modern construction practice that is governed by the effect that permissible variations may have upon a structure. The Government reserves the right to diminish the tolerances set forth herein if such tolerances impair the structural action, operational function or architectural appearance of a structure or position thereof. Concrete shall be within all stated tolerances even though more than one tolerance may be specified for a particular concrete structure. Provided that the specified variation for one element of the structure shall not apply when it will permit another element of the structure to exceed its allowable variation. Where tolerances are not specified for particular structure, tolerance shall be those specified for a similar work. As an exception to clause 2 of the general provisions, specific tolerances shown herein in connection with any dimension shall govern. The contractor shall be responsible for finishing the concrete forms within the limits necessary to insure that the completed work will be within the tolerance limits specified. The defective work where the tolerance limit is exceeded shall be remedied in accordance with the sub-paragraphs b and c.

b. Variations from specified lines, grades and dimension

Hardened concrete structure shall be checked by the contractor and will be subject to such inspection and measurement as needed to determine that the structures are within the tolerance specified in the table below.

Variation is defined as the distance between the actual position of the structure or any element of the structure and the specified position in plan for the structure or the particular element. Plus or minus variation shown as (+) indicate a permitted actual position up or down and in or out from the specified position in plan. Variations not designated as plus or minus indicate the maximum deviation permitted between designated successive points on the completed element of construction.

c. Concrete surface irregularities

a. General

Bulges, depressions and offsets are defined as concrete surface irregularities. Concrete surface irregularities are classified as 'abrupt' or 'gradual' and are measured relative to the actual concrete surface.

b. Abrupt surface irregularities

Abrupt surface irregularities are defined herein as offsets such as those caused by misplaced or loose forms, loose knots in form lumber, or other similar forming faults. Abrupt surface irregularities are measured using a straight edge held firmly against the concrete surface over the irregularity and the magnitude of the offset is determined by direct measurement.

c. Gradual surface irregularities

Gradual surface irregularities are defined herein as bulges and depressions resulting in gradual changes on the concrete surface. Gradual surface irregularities are measured using a suitable template conforming to the design profile of the concrete surface being examined. The magnitude of the gradual surface irregularities is defined herein as measures of the rate of change in slopes of the concrete surface.

The surface irregularities shall not exceed 6 mm for bottom slab and 12 mm for side slopes when tested with a straight edge of 1.5 metre in length.

The magnitude of gradual surface irregularities on concrete shall be checked by the contractor to ensure that the surfaces are within the specified tolerances. The Engineer-in-Charge will also make such checks of hardened concrete surfaces as determined necessary to insure compliance with such specifications.

d. Repair of hardened concrete not within specified tolerances

Hardened concrete which is not within specified tolerances shall be repaired to bring it within those tolerances. Such repair shall be in accordance with paragraph 6.2.21 and shall be accomplished in a manner approved by the Engineer-in-Charge. Concrete repair to bring concrete within the tolerances shall be done only after consultation with a representative of Engineer-in-Charge regarding the method of repair. The Engineer-in-Charge shall be notified as to the time when repair will be performed.

Concrete shall be finished in a manner which will result in concrete surface with a uniform appearance. The fins and any rough projections can then be rubbed down and the whole surface brought to an even finish by rubbing with a wooden float using a mortar of one part cement by two parts of coarse sand as an abrasive, the mortar at the same time filling the voids. A neat cement work shall then be applied to give a smooth surface. If the concrete has set hard the fins and rough projections,

if any, shall be removed by using carborundum brick or a paved girding machine by chipping, before finishing off with the smoothing wash. If the work of chipping is not done with care or if the surface exposed after removal of the forms can not be satisfactorily dealt with in this manner due to bad work or for other reasons, a coat of cement plaster of 1:2 of thickness as ordered by the Engineer-in-Charge shall be applied. No extra payment will be given for finishing concrete surface as instructed above in this clause.

e. Prevention of repeated failure to meet tolerances

When concrete placements result in hardened concrete that does not meet the specified tolerances, the contractor shall submit to the Engineer-in-Charge an outline of all prevention actions such as modification to form modified procedure for setting screeds, and different finishing techniques to be implemented by the contractor to avoid repeated failure.

The Engineer-in-Charge reserves the right to delay concrete placement until the contractor implements such preventive actions which are approved by the Engineer-in-Charge.

REINFORCING BARS

a. General

The contractor shall make his own arrangement for procurement of tor steel of required specification for the work from Steel Authority of India Ltd. (A Govt. of India Undertaking) only. Transportation from the place of supply to work site and all incidental charges will borne by the contractor.

Reinforcing bars shall be placed in the concrete as shown in the drawings or as directed. For concrete canal lining the reinforcement rods as provided for in the drawing shall be placed. For anchoring the concrete canal lining to the hard rock provision of anchor rods is made in the drawing and contractor shall place these anchor rods to the spacing and depth shown in the drawings.

b. Materials

Unless shown otherwise on the drawings the reinforcement to be used shall be high yield strength deformed bars of grade FE 415 conforming to I.S 1786-1985 specification for high yield strength deformed steel bars and wire for concrete reinforcement.

c. Placing

Reinforcement shall be bent and fixed in accordance with the procedure specified in I.S. 2502- 1963 (code of practice for bending and fixing of bars for concrete reinforcement). All reinforcement shall be placed and maintained in the position shown in the drawings. Unless otherwise prescribed, placement dimensions shall be to the centre line of the bars. Reinforcement will be inspected for compliance with requirement as to size, shape, length, splicing, position and amount after it has been placed, but before being embedded with concrete.

Before reinforcement is embedded in concrete the surface of the bars shall be cleaned of heavy flaky rust, loose scale, dirt grease or other foreign substances which is in the opinion of the Engineer-in-Charge are objectionable. Heavy flaky rust that can be removed by firm rubbing with burlap or equivalent treatment is considered objectionable.

As specified in clause 11.3 of I.S. 456-1978 unless otherwise specified by the Engineer-in-Charge, reinforcement shall be placed with the following tolerances.

a. For effective depth 200 mm or less

b. For effective depth more than 200 mm = + 15 mm

The cover in no case be reduced by more than one third of specified cover or 5 mm whichever is less.

Reinforcement shall be securely held in position so that it will not be displaced during the placing of the concrete and special care shall be exercised to prevent any disturbances of the reinforcement in concrete that has already been placed. Welding of bars shall be done as directed by the Engineer-in-Charge and in conformity with the requirements of clause 11.4 of IS 456-1978. Chairs, hangers, spacers and other supports for reinforcement shall be of concrete, metal or other approved material. Concrete cover shall be as shown on the drawings.

d. Reinforcement drawings

The Engineer-in-Charge will supply drawings of reinforcement details and bar bending schedules for adoption.

e. Measurement and payment

Measurement for payment of reinforcement bars will be based on the weight of the bars placed in the concrete in accordance with the drawings supplied by the Engineer-in-Charge when conformance with these specifications drawings has been determined at the time of embedment. Except as otherwise provided below payment for finishing and placing reinforcing bars will be made at the unit price bid in the bill of quantities for furnishing and placing reinforcement bars which unit price shall include the cost of reinforcing bars, attaching wire and of cutting, bending, cleaning securing and maintaining in position reinforcing bars as shown on the drawings. The total weight of bars placed as reinforcement in concrete shall be arrived at by adding the products of lengths of each size and mass per metre (vide Table 1 and para 6.2.1 of IS 1786-1985) of that size of rod.

Dowels

The dowels shall be same HYSD bars of grade Fe 415 confirming to IS 1786-1985 as used for reinforcement. Details of dowels shall be as shown on the drawings or as directed by the Engineer-in-Charge.

Dowels shall be placed in the concrete where shown on the drawings or where directed and will be inspected for compliance

with requirements as to size shape, length, position and amount after they have been placed but before being covered by concrete.

Before the dowels are embedded in concrete, the surfaces of dowels be cleaned of all dirt, grease or other foreign substances which in the opinion of Engineer-in-Charge are objectionable.

The dowels shall be accurately placed and secured in position so that they will not be displaced during the placing of the concrete.

Measurement for payment of dowels will be made only on the weight of the dowels placed in the concrete in accordance with the drawings or as directed. Payment for furnishing and placing of dowels will be made at the unit price bid in the bill of quantities for furnishing and placing of reinforcing bars which unit price shall include the cost of furnishing all the materials and for placing the dowels as required.

Preparation for placing

a. General

No concrete shall be placed until all form work installation of items to be embedded and preparation of surface involved in the placement have been approved.

The contractor shall supply concrete placement check-out cards (placement register) satisfactory to the Engineer-in-Charge and shall provide a water tight container for such cards at the convenient location near each individual concrete placement site. The cards shall list all the various work items for example 'cleanup' and 'embedded items' required prior to placement of concrete. After each work item for an individual placement has been completed that item on the cards shall be signed by contractor or his representative signifying completion of the required work. Engineer authorised by the Engineer-in-Charge will inspect the work during and after completion of each phase of the preparation and if the work is satisfactory will sign the check-out card (placement register). Approval of preparation for placement will not be complete until the contractor or his representative and above authorised Engineer have approved by signature all applicable, items for the placement.

All surfaces of forms and embedded materials shall be free from curing compound, dried mortar from previous placement and other foreign substance before the adjacent or surrounding concrete placement is begun.

Prior to beginning concrete placement the contractor shall make ready a sufficient number of properly operating vibrators and operators and shall have readily available additional vibrators to replace defective one during the progress of the placement. The Engineer's representative at the placement may delay the start of the concrete placement until the number of working vibrators available is acceptable.

b. Foundation surfaces

All surfaces upon on against which concrete is to be placed shall be free from frost, ice, water, mud and debris.

1. Rock surface shall be free from oil, objectionable coatings, and loose semi-detached and unsound fragments. Immediately prior to placement of concrete, surfaces of rock shall be washed with an air water jet and shall be brought to uniform surface dry condition.

2. Earth foundation surfaces shall be wet to a depth of 15 cm. or to impermeable material whichever is less before concrete placement.

c. Construction joints

Construction joints are defined as concrete surfaces upon or against which concrete to be placed and to which new concrete is to adhere but which have become so rigid that the new concrete cannot be incorporated integral with that previously placed. The provision of construction joints shall conform to clauses 12.4.1 and 12.4.2 of I.S. 456-1978.

When the work has to be resumed on a surface which has hardened such surface shall be roughened. It shall then be swept clean thoroughly wetted. For vertical joints near cement slurry shall be applied on the surface before it is dry. For horizontal joints the surface shall be covered with a layer of mortar about 10 to 15 mm thick composed of cement and sand in the same ratio as the cement and sand in concrete mix. This layer of cement slurry or mortar shall be freshly mixed and applied immediately before placing of the concrete. Where the concrete has not fully hardened all laitance shall be removed by scrubbing the wet surface with wire or bristle brushes, care being taken to avoid dislodgement of particles or aggregate. The surface shall be thoroughly wetted and all free water removed. The surface shall then be coated with near cement slurry. On this surface, a layer of concrete not exceeding 150 mm in thickness shall first be placed and shall be well rammed against old work, particular attention being paid to corners and close spots and work thereafter shall proceed in the normal way.

d. Contraction joints

Contraction joints are to be provided for volumetric shrinkage of monolithic concrete and or movement between monolithic unit at established joints, thus preventing formation of objectionable shrinkage cracks elsewhere in concrete. Prior to application of wax based curing compound to contraction joints, the surface of all joints shall be cleaned thoroughly of accretion of concrete or other foreign material by scrapping, chipping or other means approved by the Engineer-in-Charge. Water stops, reinforcing bars and other embedded items shall be free of curing compound when adjoining concrete is placed.

Placing

a. General

The contractor shall notify the Engineer-in-Charge before batching begins for placement of concrete. Placing shall be performed only on the presence of an authorised Engineer's representative. Placement shall not begin until after preparations are complete and the concrete placement check out card has been signed by the contractor or his representative and the authorised representative of the Engineer-in-Charge substantiating completion of all preparation for that placement.

All surface upon or against which concrete is to be placed shall be prepared in accordance with paragraph 5.2.16.

Re-tampering of concrete will not be permitted. Any concrete which has become so stiff that proper placing cannot be assured, shall be wasted.

Concrete shall not be placed in standing water except with written permission of the Engineer-in-Charge and the method of placing shall be subject to approval. Concrete shall not be placed in running water and shall not be subjected to running water until after the concrete has hardened.

Concrete shall be deposited as nearly as practical in its final position and shall not be allowed to flow in such a manner that the lateral movement will cause segregation of the coarse aggregate from the concrete mass methods and equipment employed in depositing concrete in forms shall minimize clusters of coarse aggregates, clusters that occur shall be scattered before the concrete is vibrated.

Forms shall be constantly monitored and their position adjusted as necessary during concrete placement in accordance with paragraph 5.2.12 and 5.2.13.

All concrete except canal lining shall be placed in approximately horizontal layers. The depth of layers shall not exceed 15 cm. The Engineer-in-Charge reserves the right to require lesser depths of layers where concrete cannot otherwise be placed and consolidated in accordance with the requirements of these specifications. All construction joints which intersect exposed concrete surface shall be made straight and level to plumb except as shown otherwise on the drawings.

The placing of concrete shall be in accordance with Clause 12.2 of I.S. 456-1978. If concrete is placed monolithically around openings having vertical dimensions greater than 60 cm or if concrete in decks, floors slabs, or other similar parts of structures is placed monolithically with supporting concrete, the following requirements shall be strictly observed.

1. Concrete shall be placed up to the top of the formed opening at which point further placement will be delayed to accommodate settlement of fresh concrete. If levels are specified beneath nearly horizontal structural members such as decks floor slabs, beams and girders or the levels being between the nearly horizontal members and the vertical supporting concrete below, concrete shall be placed to the bottom of the levels before delay of placement.
2. The last 60 cm or more of concrete placed below horizontal members or levels shall be placed with a 50 mm or less slumps and shall be thoroughly consolidated.

In placing concrete on uniformed slopes so steep as to make internal vibration of the concrete impractical without footing, the concrete shall be placed ahead of non-vibrating slip form screened extending approximately 0.75 meters back from its leading edge. Concrete ahead of the slip form screened shall be consolidated by internal vibrations so as to ensure complete filling under the slip form.

A cold joint is an unplanned joint resulting when a concrete surface hardens before the next batch is placed against it, cold joints would be allowed only in the event of equipment breakdown or other unavoidable prolonged interruption of continuous placing. If such unavoidable delays in placing occur which make it appear that unconsolidated concrete may harden to the extent that later vibration will not fully consolidate it, the contractor shall immediately consolidate such concrete to a stable and uniform slope. If delay of placement is then short enough to permit penetration of the underlying concrete placement shall resume with particular care being taken to thoroughly penetrate and revibrate the concrete surface placed before the delay. If concrete cannot be penetrated with vibrator, the cold joint shall be then treated as a construction joint.

Care shall be taken to prevent cold joints when placing concrete in any part of the work. The concrete placing rate shall ensure concrete is placed while the previously placed adjacent concrete is plastic so that the concrete can be made monolithic by normal use of vibrators / tamping. Concrete shall not be placed in rain sufficiently heavy or prolonged to wash mortar from concrete. A cold joint may necessarily result from prolonged heavy rainfall.

The contractor shall not be entitled to any additional payment, over the unit price bid in the schedule for concrete by reason of any limitation in the placing of concrete required under the provisions of this paragraph.

c. Compaction

The compaction of concrete shall conform to clause 12.3 of IS 456-1978.

Concrete shall be consolidated by vibrators/tampers. The vibrations shall be sufficient to remove all undesirable air voids from the concrete, including the air voids trapped against the forms. After consolidation, the concrete shall be free of rock pockets and honey comb areas and shall be closed snugly against all surface of forms and embedded materials. All concrete shall be properly consolidated before it hardens.

Except as herein after provided, consolidation of all concrete shall be by immersion type vibrators. Immersion type vibrators shall be operated in nearly vertical position and the vibrating head shall penetrate and re-vibrate the concrete in the upper portion of the underlying layer. Care shall be exercised to avoid contact of the vibrating head with embedded items and with formed surfaces which will alter be exposed to view. Concrete shall not be placed upon either plastic concrete until the previously placed concrete has been thoroughly consolidated.

Form vibrators shall be used in conjunction with slip form lining machines to consolidated concrete in canal linings. such vibrators shall be arranged for effective uniform consolidation of the concrete. The Engineer-in-Charge or his representative may remove samples of the hardened concerns for testing and examination and the contractor shall repair, at no cost to the Government, concrete from which such samples are removed. Immersion type vibrators shall be operated at speeds of at least 7000 revolutions per minute

Finishes and finishing

The requirements for finishing of concrete surface shall be as specified in this paragraph, paragraph 5.2.12 and 5.2.13 or as otherwise indicated on the drawings. The contractor shall notify the Engineer-in-Charge before finishing concrete. Unless inspection is waived, in each specific case, finishing of concrete shall be performed only when a Engineer's representative is present. Concrete surface will be tested by the Engineer-in-Charge in accordance with paragraph 5.2.13 where necessary to determine whether the concrete surface is within the specified tolerances. Finished concrete which is not within the specified tolerances shall be repaired in accordance with paragraph 5.2.21.

Interior surface shall be slopes for drainage were shown on the drawings or as directed. Surfaces which will be exposed to the weather and which would normally be level shall be sloped for drainage.

Floating may be performed by use of hand or power-driven equipment. Floating shall be started as soon as the screened surface has stiffened sufficiently and shall be the minimum necessary to produce a surface that is free from screened marks and is uniform in texture. Joints and edges shall be tooled where shown on the drawing or as directed.

After the surface of road way slabs of concrete bridges, have been wood floated, the surfaces shall be given a broom finish. The finish shall be applied when the water sheet has practically disappeared. The broom shall be drawn transversely across the pavement with adjacent strokes slightly overlapping. The brooming shall be completed before the concrete is in such condition that the surface will be torn or unduly roughened by the operation. The finished surfaces shall have a uniform appearance and shall be free of corrugations exceeding 1.5 millimetres in depth. Broom shall be of a quality, size and construction and be so operated as to produce a surface finish satisfactory to the Engineer-in-Charge.

The finishing in lining shall be in accordance with Clause 5.7 of IS 3873-1978. The finished surface shall be equivalent in evenness, smoothness and free from rock pockets and surface voids to that obtainable by effective use of a long-handled steel trowel. Where the surface produced by a lining machine meets the specified requirements no further finishing operations will be required.

The top portion of the side slopes of the canal lining extending 1-1/2 meter vertical below the top of the lining shall receive a non-kid, longitudinal brisk finish as approved by the Engineer-in- Charge.

Protection

The contractor shall protect all concrete against damage until final acceptance by the Engineer-in- Charge.

The contractor shall provide protection to prevent erosion to fresh concrete whenever precipitation either periodic or sustaining is imminent or occurring.

When precipitation appears imminent, the contractor shall immediately make ready at the placement site all materials which may be required for protection of fresh concrete. The Engineer- in-Charge may delay placement of concrete until adequate provisions for protection against weather are made.

All fresh concrete surfaces shall be protected from contamination and from foot traffic until the concrete has hardened. Hardened concrete surfaces which have to receive finish shall be protected against damage from foot traffic and the construction activity by covering with protective mats, plywood or by other effective means. Method of protection shall be subject to approval by the Engineer-in-Charge.

Curing

a. General

The contractor shall furnish all materials and perform all work required for curing concrete. All concrete including bed and sides of canal lining shall be cured by water curing.

The precast slab for canal lining shall be cured by keeping them immersed in water for seven days and by sprinkling water for another 21 days with straw canvass, hessian or similar materials cover over slab.

The uniformed top surfaces of bridges decks shall be cured for 28 days with a damp sand cover or curing mat cover. The sand or curing mats shall not be kept so wet as to allow water to drain from them strain other concrete. The sand or curing mats shall be removed after the expire of the curing period.

All concrete surfaces shall be treated as specified to prevent loss of moisture from the concrete until the required curing period elapsed or until immediately prior to placement of other concrete or back fill against that surface. Only sufficient time to prepare construction joint surfaces and to bring them to a surface dry condition shall be allowed between

discontinuance of curing and placement of adjacent concrete.

Forms shall be removed within 24 hours after the concrete has hardened sufficiently confirming to clause 10.3 of I.S. 456-1978 to prevent structural collapse or other damage by careful form removal and prior to curing minor surface repair shall be completed within 2 hours after form removal and shall be immediately followed by the initiation of curing by the applicable method specified herein. Concrete surfaces shall be kept continuously moist after form removal until initiation of curing.

Repair of concrete

Concrete shall be repaired in accordance with clause 5.7 of I.S. 3873-1978. Imperfections and irregularities on concrete surface shall be corrected in accordance with paragraph 5.3.13 and clause 5.7 of IS 3873-1978.

Types of repair

All repair shall be made with concrete. Repairs to concrete surfaces and addition where required shall be made by cutting regular opening into the concrete and placing fresh concrete to the required lines. The chipped openings shall be reinforced and chipped and trowelled to the surface of the openings. The mortar shall be placed in layers not more than 20 mm in thickness after being completed and each layer shall be compacted thoroughly. All exposed concrete surfaces shall be cleaned of impurities lumps of mortar or grout and unsightly stains.

Cost

The cost of furnishing all materials and performing all work required in the repair of concrete shall be borne by the contractor.

Measurement & Payment of concrete

Measurement for payment of concrete including centring and shuttering required to be placed directly upon or against surface of excavation will be made to the liens for which payment for excavation is made.

Measurement for payment of concrete in canal lining shall be made to the liens shown on the drawing. The unit of measurement will be in cubic metre of concreting shown in the drawing. Measurement for payment of all other concrete will be made to the neat lines of structures, unless otherwise specifically shown on the drawings prescribed in the specification. The unit measurement will be cubic meter. In measuring concrete for payment the volume of all opening, fixtures embedded pipes and metal work, each of which is larger than 0.1 square meter in cross section will be deducted.

Payment for concrete including centring and shuttering in the various parts the works shall be made at the applicable unit price in the bill of quantities, which unit price shall include the cost of furnishing all materials and performing all works required for the concrete construction, except that payment for furnishing and placing reinforcement bars and form work shall be made at the respective unit price's bid therefore in the schedule.

5.0 STONE MASONRY

5.1. GENERAL

The stone of the required quality shall be obtained from the quarries in the lead charge appended to the bill of quantities. The common types of natural stones which are generally used are granite and other igneous rocks and shall be free from defect like decay, cavities, cracks, flaws, sand holes, softheads, veins, patches of soft or loose materials or any other deleterious materials like Iron Oxide organic impurities, etc. they should be free from rounded work or weathered surface or skin coating which prevents the adherence of mortar. All stones used shall be clean of uniform colour and texture, strong, hard and durable.

The stone shall be sound, and shall have abrasion shall have determined in accordance with I.S 1121-1974. The strengths shall be as detailed below in Table. 4(a)

Table-(A)

Sl.No	Type of stone	Minimum Crushing strength
1	Granite & other igneous rocks	100kgs/sq.Cm
2	Laterite	30kgs/sq.Cm

The [percentage pf water absorption shall not exceed 5% by weight as determined in accordance with I.S1121 – 1974.

Sample of the stones collected from the stone stacks by the contractor shall be tested for the standards specified above and other relevant Indian standards and stone stacks not conforming to the standards will be rejected and their cost shall be borne by the contractor. The contractor shall obtain these stone from the approved portion of the approved quarries only.

LATERITE STONE FOR MASONRY WORK

The stone shall be best procurable and free from any admixture of white earth. It shall be dug out from the quarry as sufficient time in advance, to harden well, before being placed in the work. The least thickness of stone shall be 17.5 Cms and other dimensions shall be as laid down in the relevant drawing or specification or as direction by the Engineer. The stones shall be laid as headers and structures alternatively breaking joints by at least 7.5 Cms

RR STONE FOR MASONRY WORK

GENERAL

Stone masonry in general shall conform to the requirements of I.S. 1597 code of practice for construction of stone masonry (part-I) 1967 and I.S.1129- 1970 for rubble stone masonry. I.S. 1597 (part-II) 1967 Ashlar Masonry, IS.1129-1972 specification for dressing natural building stones.

In the absence of further definition cut stone masonry, shall be executed with a fine dressing for the face. By fine-tooled dressing or fine dressing is meant the finest surface which can be given to stone with a chisel and without rubbing. The approval of the quarries by the Engineer shall not be construed as constituting approval of all or any of the stones collected from the deposits and the contractor will be held responsible for suitability of the stone used in the work.

5.1.4 SAND FOR MASONRY

Sand shall generally conform to specifications given paragraph 4.2.6 except the sand for mortar shall confirm to the grading as given in clause 7 of I.S 2116-1980 as detailed below, in table.

Grading of sand for use in Masonry

I.S Sieve Designation	Percentage passing by Mass
4.75mm	95to100
2.36mm	95to 100
1.18 mm	90 to 100
600 micron	80 to 100
300 micron	20 to 65
150 micron	0 to 50

Sand whose grading falls outside the specified limits due to excess or deficiency of coarse or fine particulars may be processed to comply with the standard by screenings through suitably sized sieves and/or blending with quantities of suitable sized sand particular.

If the sand brought to site is not clean, it must be washed clean in water. Fine dirt sand or sea sand containing saline impurities shall on no account be used.

5.1.5. CEMENT

The specifications and conditions specified for procuring cement in paragraph 4.2.5 shall be applicable here also.

5.1.6. WATER

The specifications and conditions specified for procuring water in paragraph 4.2.5 shall be applicable here also.

5.1.7. MORTAR

5.1.8. PREPARATION OF MORTAR.

Unless otherwise specified the cement mortar used in masonry work shall be cement mortar mix. 1:4 (one cement four sand by volume). Mixing shall be done thoroughly preferably in a mechanical mixer. In such case the cement and sand in the specified proportion shall be mixed by thoroughly in the mixer operating manually or by power. Water shall then be poured gradually and wet mixing continued at least for 2 minutes. Water shall not be moiré than that requires for bringing the mortar to the required working consistency of 90 to 130 millimetres as required in clause 9.1.1 of IS. 2250-1981. the mix shall be cleaned and free from injurious kind of soil, acid, alkali, organic matters or deleterious substances.

5.1.9. TIME OF USE OFF CEMENT MORTAR

Cement mortar shall be used as soon as possible after mixing before it has begun to set, within 30 minutes after the water is added the dry mixture.

Mortar used for more than 30 minutes should not be used and shall to remove from the site or work. The cost of such wasted mortar shall be borne by contractor. The use of retempered mortar will not be permitted to be used for the memory.

5.1.10. TESTS OF MORTAR

Mortar test tubes shall be cast for the mortar used on the work and shall be tested in accordance with Appendix- A of I.S. 2250-1965 of practice for preparation and use of Masonry mortar. Such cubes shall develop a compressive strength of at least 50-kgs/square centimeter for mortar mix 1:5 and 75-kg/square centimeter for mortar mix 1:4. Mortar not conforming to the specifications will be rejected and the cost of such wasted shall be borne by contractor.5.1.11.

5.1.11. MEASUREMENT AND PAYMENT

Cement mortar shall not be measured and paid separately and its cost including cost of materials, mixing, transporting and placing shall be included in the unit price per cubic meter and therefore in the bill of quantities of the contract for the relevant finished item of work for which cement mortar mix mentioned in the above paragraph is required.

5.2. DISMANTLING OF THE DAMAGED STRUCTURES OR STRUCTURE TO BE REHABILITATED.

Structures defined in the schedule for rehabilitation shall be dismantled down to ground level or bottom of foundation or the iron works etc which are specified shall being up to below as may be specified in the schedule of item. All materials obtained from dismantling shall be property of the Government. The stone obtained during dismantling shall

be separated out and staked or stored properly as directed by Engineer and should be taken that the accounted for.

Special care shall be taken that the materials are not damaged in the process of dismantling. The value of materials broken or damaged shall be recovered from the contractor. When dismantling is done for a portion of the structure, remaining part of the structure, remaining part of the structure should not be damaged, If damaged, the dismantling and reconstruction. shall be done at the cost of the contractor.

All serviceable materials shall be removed and stacked or disposed of as specified.

For dismantling of structure blasting operation shall not be resorted to.

6.0. ROAD WORK

6.1. SPECIFICATION FOR I.R.C. GR. I & GR. III MATERIALS:

6.1.1. DESCRIPTION:

This work shall consists of clean crushed cross aggregate mechanically inter locked by rolling and voids there of filled with binding materials with the assistance of water laid on a prepared subbase. It shall be constructed in accordance with specification and in conformity with the lines, grade and cross section shown on the drawings or as directed by Engineer.

6.1.2. MATERIALS:

Coarse aggregates

I.R.C	Gr. I metal (90mm to 40mm)
I.R.C	Gr. II metal (50mm to 25mm)
I.R.C	Gr. III metal (50mm to 25mm)

The coarse aggregates shall be crushed or broken of hard granite metal of above size durable and generally free from flat, elongated, soft, gritty disintegrated particles and other objectionable materials and conforming to most grading and after physical requirement. Binding materials: The admixture of sand and moorum /query dust in accordance with 2.20 shall be used as binding materials.

6.1.3. CONSTRUCTION OPERATION:

Preparation of sub grade:

The sub-base to receive the I.R.C. Gr. I and Gr.III metalling coarse shall be prepared to the required grade and camber and cleaned of all dust, any ruts of soft fielding places that have appeared due to improper drainage service under traffic or other reasons shall be corrected and rolled in this firm.

Where the Gr.I and Gr. III metals to be laid on existing un surfaced load, the surface shall be scarified and reshaped to the required grade and camber as necessary. Weak shall be strengthened, corrugation removed and depressions and pot holes made with suitable materials before spreading the coarse aggregates.

Where the existing road surface is black topped 50mm x 50mm. Borrows shall be cut in the existing surfaces at 1 M intervals to the center line of carriage way before proceeding with the laying coarse aggregate in all cases, the foundation shall be kept well drained during the construction operation.

Provision of lateral confinement of aggregator:

Before start of laying I.R.C.. Gr.I/III metalling necessary arrangement shall be made for all the central confinement of aggregates one method is to be construct side shoulder in advance to thickness corresponding to the compacted layers. After should are ready ,their inside edge may be trimmed vertical and the included are cleaned of all special materials there by setting the stage for spread of coarse aggregates.

Spreading Coarse aggregates:

The coarse aggregates shall be spread uniformly and evenly upon the prepares base in required quantities from premeasured stack along the side of the road. In no case shall these be dumped in heaps directly on the area where are to be laid not shall their hauling over partly complete base be permitted. The aggregates shall be spread to proper profiled by using templates placed across the road about 6 meter approximately where possible approves mechanical device shall be used to spread the aggregate uniformly so as to minimize the need of

Manipulation by hand.

The Gr.I and Gr.III shall normally be constructed in layers of not more than 75 mm compacted thicknesses. Each layer shall be passed by depth blocks, no segregation of large and fine particles shall be allowed in the coarse aggregates as spreading shall be uniform gradation with no pockets of fine materials. .

ROLLING:

After the laying coarse aggregate, these shall be compacted to full width by rolling with either three wheel power roller of 10 tones capacity or an equivalent vibratory roller. The weight of the roller shall depend on the type of the coarse aggregates. The rolling shall begin from edge with roller running forwarded and backward until the edges have been compacted, the roller shall then progress gradually from the edges towards the centre parallel to the centre line of the road, uniformly lapping each proceeding rear wheel track by one half width. Rolling shall be discontinued when the aggregates are partially

compact with sufficient voids space in them to permit application of screening compaction shall be continued until the aggregate are thoroughly keyed or interlocked with no creeping of stones ahead of the roller. Slight sprinkling of water may be done during rolling of necessary.

On super elevated portion of the road, rolling shall commence from the lower edge and progress gradually towards the upper edge of the payment.

Rolling shall not be one when the sub-grade is soft or yielding or when it causes a wave like trotline in the base coarse or sub-grade. If irregularities develop during rolling which exceeds 1 mm tested with a 3 meter strength edge the surface shall be laid and aggregates added or removed as required before rolling again so as to achieve a uniform surface conforming to the desired cross section and grade. The surface shall also be checked transversely by template for chamber, and any irregularities corrected in the manner described above. In no case shall the use of screening to make up depressions be permitted.

APPLICATION OF SCREENING:

After coarse aggregates have been rolled a above screening (the admixture of sand and moorum / query dust in accordance with 2.20) to fill the interstices shall be applied gradually over the surface rolling shall be done when the screening are being spreaded so that the jarring affect of roller cause them to settle into the voids of the coarse aggregates. The screening shall not be dumped in piles but applied uniformly in successive thin layers either by the spreading motion for hand shovels, mechanical spreaders.

The screening shall be applied at a slow rate in three or one applications as necessary, This shall be accompanied by rolling and brooming. Either mechanical broom/hand brooms or both may be used. In no case shall the screening be applied as fast and thick as to form cakes or bridges on the surface making the filling roller on the coarse aggregates. The spreading rolling and brooming of screening shall be taken up on sections which can be completed within one day operation .Dap and wet screening shall not be used in any circumstances.

SPRINKLING AND GROUTING:

After application of screening, the surface shall be copiously sprinkled with water, swept and rolled. Hand brooms shall be used to swept the wet screening into the voids and to distribute them evenly. The sprinkling sweeping and rolling operations shall be continued and additional operation shall be continued and additional screening applied where necessary until the coarse aggregates are will bound and firmly set a grout has been formed of screenings. Care shall be taken that the base or sub-grade does not get damaged due to adoption of excessive quantities water during the construction.

SETTING AND DRYING:

After final compaction of the coarse, the road shall be allowed to cure overnight, next morning the hungry spots shall be filled with screening materials lightly sprinkled with water if necessary and rolled, no traffic shall be allowed till the macadam sets. In case of Gr.I and GR.III metal base coarse to be provided with bituminous surfacing the latter shall be laid only after the Gr.I and Gr.III metalling coarse is completely dry & before allowing any traffic on it .

PLY OF CONSTRUCTION TRAFFIC:

In general construction traffic may ply over completed portions of the Gr.II or Gr.III metalling provided vehicles move over its full width avoiding any rutting or uneven compaction. However the Engineer shall have full authority to stop the passage of construction traffic when in his opinion this is leading to excessive damage.

RECTIFICATION OF DEFECTING CONSTRUCTION:

Where the surface irregularities of the Gr.I or Gr.III metal exceeds or where the coarse is otherwise defective due to sub-grade soil mixing with the aggregates, the layer to its full thickness shall be scarified over the affected area, reshaped with added material or removed and replaced with fresh materials as applicable and recompacted. The area treated in the aforesaid manner shall not be less than 10m². In no case, shall depressions be filled up with screening or binding materials.

6.2. SURFACE DRESSING:

6.2.1. Description:

This work shall consists of the application of one coat or two coats of surface dressing each coat consisting of a layer of bituminous binder spread of a base prepared previously, followed by a cover of stone chipping properly rolled to form a wearing coarse to the requirement of these specification.

6.2.2. MATERIALS:

1.Binder: The binder shall be straight run bitumen of a suitable grade appropriate to the region, traffic, rainfall and other environmental conditions as directed by the Engineer.

2.Stone Chipping: The stone chipping shall consist crushed stone. They shall be clear, strong, durable of fairly cubical shape and free from disintegrated pieces, organic or other deleterious matters and adherent coating. The size of materials used or this work shall be 12 mm.

3.Quantities of materials: The quantities of materials used for this work shall be 18.00Kg/1 .0m².

6.2.3.CONSTRUCTION OPERATION

Weather and seasonal limitation:

The work of laying shall not be taken up during rainy or foggy weather or when the base coarse is dump or wet or during

dust storm.

Preparation of base:

The base on which the surface dressing is to be laid shall be scraped, cleaned, free from dust and foreign materials and shall be prepared, shaped and condition to the specified lines, grade and cross section. Where the existing surface shows signs of flatting up this shall be testified.

Application of Binders

Bitumen shall be heated to 163 C to 177 C and sprayed on the dry surface in uniform manner preferably with the help of self propelled mechanical sprayers having self heating arrangement and bitumen pressure pump and spray nozzle are capable of spraying bitumen uniformly.

Application of Stone Chipping:

Immediately after the application of binder, stone chippings. in a dry and cleaned state shall be spread uniformly on the surface, by means of a self-propelled or towed mechanical grit-spreader capable of spraying -uniformly SQ as to cover the surface completely. If necessary, the surface shall be boomed to ensure uniform spread of chippings.

6.2.4. ROLLINGS:

Immediately after the application of the cover materials, the entire surface shall be rolled with a 8 to 10 ton smooth wheeled steel roller suitable vibratory roller. Rolling shall commence at the edges and progress towards the centre except in super elevated portions where it shall proceed from the inner edge to the outer. Each pass of the roller shall uniformly overlap not less than 1/3rd of the track made in the preceding pass .While rolling is in progress additional chippings shall be spread by hand necessary quantities required to make up irregularities. Rolling shall continue until all aggregate particles are firmly bedded in the binder and present an uniform closed surface.

Opening to traffic shall not be 'permitted to run on any newly surface dressed area until the following day.

6.3. PREMIX CARPET:

6.3.1. DESCRIPTION:

This work shall consists of laying and compacting carpet of 25 mm. thickness in angle coarse composed of suitable small sizes aggregates prepared with a bituminous binder on a previously . prepared base, in accordance with the requirement of this specifications to serve as a wearing coarse.

6.3.2. MATERIALS:

Binder	Same as surface dressing
Aggregates	Same as surface dressing

Quantities of materials

Stone chips	20mm to 12 mm	
	06 mm to 12 mm	
Binder for premix		

6.3.3. CONSTRUCTION OPERATION:

Weather and seasonal limitation: The work of laying shall not be taken up during rainy or foggy weather or when the base coarse is dump or wet or during dust storm.

Preparation of base:

The underlying, base on which the bituminous carpet is to be laid shall be prepared, shaped and conditioned to the specified lines, grade and cross section.

Tack coat:

Description: This work shall consist of application of low viscosity liquid bituminous materials to an existing road surface preparation to another bituminous construction over it.

Materials: The binder used for tack coat shall be bitumen of a suitable grade appropriate to the region, traffic, rainfall and other environmental condition as directed by the Engineer.

6.3.4. CONSTRUCTION OPERATION:

Preparation of base: The surface on which the tack coat is to be applied shall be cleaned of dust and any extraneous materials before the application of materials.

Application of Binder: Binder shall be heated to the temperature to the grade to bitumen used and approved by the Engineer and sprayed on the base @5Kg.l10m2. The rate of spread is in terms of straight run bitumen.

The binder shall be applied uniformly with the aid of either self-propelled or towed bitumen pressure sprayer with self-heading arrangement and spraying nozzles arrangement capable of spraying bitumen at specified rates and temperature so as to provide a uniformly.

Preparation of Premix:

Mixers of approved type shall be employed to the mixer for mixing the' aggregates with the bituminous binder. The

binder shall be heated to the temperature appropriate to the grade of bitumen approved by the Engineer in suitable design avoiding local over heating a continuous supply. The aggregates shall be dry and suitable heated to a temperature as directed by Engineer before these are placed in the mixer. After about 15 seconds of dry mixing, the heated binder shall be distributed over the aggregates at the rate specified.

The mixing of binder with chipping shall be continued until the chippings are thoroughly coated with the binder. The mix shall be immediately transported from the mixer to the point of use in suitable vehicles or wheel borrows. The vehicles employed for transport shall be clean and the mix being transported covered in transit if so directed by the Engineer-in-Charge.

SPREADING AND ROLLING:

The premixed materials shall be spread on the road surface with racks to the required thickness and cross fall (camber) on distributed evenly with the help of a drag spread without any undue loss of time. The cross fall shall be checked by means of camber boards. As soon as sufficient length of bituminous materials has been laid, rolling shall commence with 8 to 10 ton power rollers, preferably of smooth wheel type, or other approved equipment. Rolling shall begin" at the edges and progress towards the center longitudinally, except that on the super elevated portions it shall progress from the lower upper edge parallel to the center line of the pavement.

When the roller has passed over the whole area- one, any high spots on depressions which become apparent shall be corrected by removing or adding premixed materials. Rolling shall then be continued until the entire surface eliminated. In each pass of the roller, Preceding track shall be over lapped uniformly by at least 1/311I width. The roller wheel shall be kept damp to prevent the premix from adhering to the wheels and being picked up. In no case shall fuel lubricating oil be used for this purpose. Excess use of water for this purpose shall also be avoided. Rollers shall not stand on newly laid materials while there is a risk that it will be deformed thereby.

6.4. SEAL COAT:

6.4.1. Description: This work shall consist of application of a seal coat for sealing the voids in a bituminous surface laid to the specified levels, grade and cross fall (camber).

6.4.2. MATERIALS:

- i. Binder: The quantity of binder to be utilized, in terms of straight run bitumen shall be 6.8 Kg per
- ii. Aggregate: Stone chipping shall consist of angular fragments of clean hard, tough and durable rock or uniform quality throughout. The size of aggregate shall be 6 mm. The quantity used for premixing shall be 0.06 m3 for 10 m2 area.

6.4.3 CONSTRUCTION OPERATION:

- i. Preparation of base: The seal coat shall be applied immediately after the laying of bituminous coarse which" is required to be sealed. Before application of seal coat materials, the surface shall be cleaned free of any dust or other extraneous matter.
- ii. Construction: Mixer of approved type shall be employed for mixing" the aggregate with the bituminous binder. The binder shall be heated in boilers of suitable design to a temperature appropriate to a grade of bitumen approved by the Engineer. Also the aggregate shall be dry and suitably heated to a temperature directed by the Engineer before the same are placed in the mixer.

Mixing of binder with aggregates to the specified proportion shall be continued with the latter are thoroughly coated with the former. The mix shall be immediately transported from the mixing plan to the point of use and spread uniformly on the bituminous surface to be seated. As soon as sufficient length has been covered with the premixed materials, the surface shall be rolled with 6 to 9 ton smooth wheeled power roller. Rolling shall be continued till the premixed materials completely seals the voids in the bituminous coarse and a smooth uniform surface in obtained.

6.5. BLINDING THE ROAD SURFACE:

Blinding the road surface after the seal coat processing is over then the traffic is to be allowed.

CONDITIONS OF CONTRACT

Clause-1: All compensation or other sums of money payable by the contractor to Government under the terms of this contract may be deducted from or paid by, the sale of a sufficient part of his security deposit of from the interest arising there from, or from any sums which may be due or may become due to the contractor by Government on any account whatsoever and in the event of his security deposit being reduced by reason of any such deduction or sale as aforesaid, the contractor shall within ten days thereafter make good in cash or Government securities endorsed as aforesaid any sum or sums which may have been deducted from or raised by, sale or the security deposit or any part thereof.

Compensation for delay.

Clause 2(a): The time allowed for carrying out the work as entered in the tender shall be strictly observed by the contractor and shall be reckoned from the date on which the written order to commence work is given to the contractor. The work shall throughout the stipulated period of the contract, be carried on with all due diligence (time being deemed to be of essence of the contract on the part of the contractor) and the contractor shall pay, as compensation, an amount equal to 1/2 percent on the amount of the estimated cost, if the whole work as shown by the tender for everyday that the work remains un-commenced, or unfinished after the proper dates (The work should not be

considered finished until such date as the Executive Engineer, Khatiguda shall certify as the date on which the work is finished after necessary rectification of defects as pointed out by the Executive Engineer Khatiguda or his authorized agents, are fully complied with by the contractor to the Executive Engineer's satisfaction). And further, to ensure good progress during the execution of the work the contractor shall be bound, in all cases in which the time allowed for any work exceeds one month, to complete one-fourth of the whole of the work before one fourth of the whole time allowed under the contract has elapsed, one half of the work, before one half of such time has elapsed, and three fourth of work before three fourths of such time has elapsed, in the events of the contractor failing to comply with the conditions, he shall be liable to pay as compensation an amount equal to one-third percent on the said estimated cost of the whole work for everyday that the due quantity of work remains incomplete. Provided always that the entire amount of compensation to be paid under the provisions of this clause shall not exceed 10 percent of the estimated cost of the work as shown in the tender.

(b) If there are possibilities of exceeding this compensation amount as mentioned in clause (a) 10% of the estimated cost, or in any case in which under any clause or clauses of this contract the contractor shall have rendered himself liable to pay compensation amounting to the whole of his security deposit in the hands of Government (whether paid in full at a time or deducted by installments) the **Executive Engineer**, on behalf of the Governor of Odisha, shall have power to adopt any of the following courses, as he may deem best suited to the interest of the Government.

Action when whole security deposit is forfeited.

i) To rescind the contract (of which rescission notice in writing to the contractor under the hands of the **Executive Engineer**, shall be conclusive evidence) 20% of the value of left over work will be realized from the contractor as penalty.

ii) Security deposit of the contractor shall be refunded only one year after the date of completion of the work provided the final bill has been paid and defects, if any rectified.

Clause - 3: In any case in which any of the powers conferred upon the Executive Engineer, by clause 2 thereof, shall have become exercisable and the same shall not be exercised, the non-exercise thereof shall not constitute a waiver of any of the conditions here of and such powers shall notwithstanding be exercisable in the event of any future case of default by the contractor of which by any clause or clauses hereof he is declared liable to pay compensation amounting to the whole of his security deposit, and the liability of the contractor for past and future compensation shall remain unaffected, in the event of the **Executive Engineer** putting in force the powers vested on him under the preceding clause may be, if he so desires, take possession of all or any tools, plants, materials and stores, in or upon the works, or the site thereof or belonging to the Contractor, or procured by him and intended to be used for the execution of the work or any part thereof, paying or allowing for the same in the account at the contract rates, or in case of these not being applicable, at current market rates to be certified by the **Executive Engineer** whose certificate thereof shall be final, otherwise the **Executive Engineer** may be noticed in writing to the contractor or his clerk of

Contractor remains liable to repay compensation if action not taken under clause -5.

the works, foreman or other authorized agent required him to remove such tools, plants, materials, or stores from the premises (within a time to be specified in such notice) and in the event of the contractor failing to comply with any such requisition, the **Executive Engineer** may remove them at the contractor's expense or sell them by auction or private sale on account of the contractor and at his risk in all respects, and the certificate of the **Executive Engineer** as to the expense of any such removal and the amount of the proceeds and expense of any such sale shall be final and conclusive against the contractor.

Power to take possession of or require removal of or sell contractor's plants.

Clause - 4 : If the contractor shall desire an extension of the time for completion of the work, on the ground of his having been unavoidably hindered in its execution or any other ground, he shall apply in writing to the Executive Engineer, within 30 days of the date of the hindrance on account of which he desires such extension as aforesaid and, the Executive Engineer, shall, if in his opinion (which shall be final) reasonable grounds be shown therefore, authorize such extension of time, if any, as may in his opinion be necessary or proper. The **Executive Engineer** shall at the same time inform the contractor whether he claims compensation for delay. In case where the sanction of higher authority to grant

Extension time

extension of time is necessary; the **Executive Engineer** will send his recommendation to higher authority. If the order of the competent authority is not received within 60 days from the date of receipt of recommendation of the Executive Engineer, the **Addl. Chief Engineer** shall grant extension of time under intimation to the concerned authorities so that the contract shall remain in force, but while communicating this extension of time he must inform the contractor that extension is granted without prejudice to Government's right to levy compensation under relevant clause of the Agreement.

Clause - 5 - On completion of the work, the contractor shall be furnished with a certificate by the **Executive Engineer** (hereinafter called the Engineer-in-charge) of such completion, but no such certificate be given nor shall the work be considered to be completed until the contractor shall have removed from the area of the premises (to be distinctly marked by the **Executive Engineer** in the site plan) on which the work shall be executed all scaffolding surplus materials and rubbish, and cleared off the dirt from all wood-work, doors, windows, walls, floors or other parts of any building in upon or about which the work is to be executed, or of which he may have had possession for the purpose of the execution thereof, nor until the work shall have been measured by the Officer of the Department of Water Resources in accordance with the rules of the department whose measurements shall be binding and conclusive against the contractor, if the contractor shall fail to comply with the requirements of this clause as to removal of scaffolding surplus materials and rubbish and cleaning off dirt on or before the date fixed for the completion of the work, the Engineer-in-charge may at the expense of the contractor remove such scaffoldings surplus materials and rubbish and dispose of the same as he thinks fit and clean off such dirt as aforesaid and the contractor shall forthwith pay the amount of all expenses incurred and shall have no claim in respect of any such scaffolding or surplus materials; as aforesaid except for any sum actually realized by the sale thereof.

Final certificate

Sub-Clause to Clause - 5: If in the opinion of the Engineer-in-charge which shall be final and binding on the contractor occupation or utilization of a portion of the work completed is no way interferes with the progress of the rest of the work the same may be occupied or utilized by on behalf of the Government under the written order of the Engineer-in-Charge. This will not impede the right of the Engineer-in-charge to get the defects if any rectified by the contractor at his (Contractors) own cost within one year from the date of completion of the whole work provided that the contractor will not be allowed any concession either in the shape of extension of stipulated period or any other monetary compensation on account of such occupation or use.

Clause - 6: A bill shall be submitted by the contractor each month on or before the date fixed by the Engineer-in-charge for all works executed in the previous month and the Engineer-in-Charge or his subordinate shall take the requisite measurement for the purpose of having the same verified and the claim as far as admissible, adjusted, if possible, before the expiry of ten days from the presentation of the bill. If the contractor does not submit the bill within the time fixed as aforesaid, the Engineer-in-charge or his subordinate shall measure up the said work in the presence of the contractor whose countersignature to the measurement list will be sufficient warrant, and the Engineer-in-charge or his subordinate shall prepare a bill from such list which shall be binding on the contractor in all respects. Provided that, if any balance of the 10% security is outstanding from each such payment shall be deducted so much, not

Payment on intermediate certificate be regarded as advances and bill to be submitted monthly

exceeding 5% as may be necessary to make up the balance of the security. All such intermediate payments to the contractor shall be regarded as payments by way of advance against the final payment only and not as payments for work actually done and completed and shall not preclude the requiring of bad, unsound and imperfect or unskillful work to be removed and taken away and reconstructed or re-erected, or be considered as an admission of the due performance to the contract or any part thereof in any respect, or the accrual of any claim nor shall it conclude, determine, or effect in any way the powers of the Engineer-in-charge under these conditions or any of them as to the final settlement or adjustment of the accounts or otherwise, or in any other way vary or effect the contract.

Clause - 7 The final bill shall be prepared by the officers of the Department of Water Resources in accordance with the rules of the Department in the presence of the contractor within one month of the date fixed for completion of the work

Clause - 8: If the specification or estimate of the work provides for the use of any special description of materials to be supplied from the Engineer-in-Charge's store, or if it is required that the contractor

shall use certain stores to be provided by the Engineer-in-Charge under the conditions of this contract (such materials and stores and the prices to be charged therefore as hereinafter mentioned being so far as practicable for the convenience of the contractor, but not so as in any way to control the meaning or effect of this contract are specified in the schedule or memorandum hereto annexed) the contractor shall be supplied with such materials and stores noted in the annexed schedule as are required from time to time to be used by him for the purposes of the contract only, and the value of the full quantity of materials and stores so supplied at the rates specified in the said schedule may be set off or deducted from any sums then, due or thereafter to become due to the contractor under the contract or otherwise, or against or from the security deposit, or the proceeds of sale thereof if the same is held in Government securities, the same or a sufficient portion thereof being in this case sold for the purpose. All materials supplied to the contractor shall remain the absolute property of Government and shall not on any account be removed from the site of the work and shall at all times be open to inspection by the Engineer-in-Charge. Any such materials unused and in perfectly good condition at the time of the completion or determination of the contract shall be returned to the Engineer-in-Charge's store, at the prevailing market rate or at the issue rate whichever is less if by a notice in writing under his hand he shall so require, but the contractor shall not be entitled to return any such materials unless with such consent, and shall have no claim for compensation on account of any such materials so supplied to him as aforesaid being unused by him, or for any wastage in or damage to any such materials.

Stores supplied by
Government.

Clause - 8(a): "If a contractor removes any materials or stock so supplied to him from the site of the work in contravention of the provision of this clause with a view to dispose of the same dishonestly, he shall, in addition to any other liability, civil or criminal arising out of this contract be liable to pay a penalty equivalent to five times the price of the said materials or stock, according to the stipulated rate. The penalty so imposed shall be recoverable from any sum that be then or at any time thereafter may become due to the contractor, or from his security deposit, or the proceeds of sale thereof".

Clause - 8(b): Owing to difficulty in obtaining certain materials in the open market the Government have undertaken to supply materials specified in the schedule hereto annexed. There may be delay in obtaining materials by the Department and the contractor is therefore required to keep himself in touch with the day to day position regarding the supply of materials from the Engineer-in-Charge and to so adjust the progress of the work that their labour may not remain idle nor may there be any other claim due to or arising from delay in obtaining the materials. It should be clearly understood that no monetary claim whatsoever shall be entertained by the Government on account of delay in supplying materials. However, extension of time for completion of work can be granted on timely application by the contractor vide also Clause-4. Work to be executed in accordance with specification, drawing and orders.

Clause –9: The contractor shall execute the whole and every part of the work in the most substantial and workmanlike manner, and both as regards materials and otherwise in every respect in strict accordance with the specifications. The contractor shall also confirm exactly, fully and faithfully to the designs, drawings and instructions in writing relating to the work signed by the Engineer-in-Charge and lodged in his office, and to which the contractor shall be entitled to have access at such office, for the purpose of inspection during office hour and the contractor shall, if he so requires, be entitled at his own expenses to make or cause to be made copies of the specification, and of all such designs, drawings and instructions as aforesaid.

Works to be executed in accordance with specification, drawing and orders etc.

Clause -10: The Engineer-in-Charge shall have power to make any alterations in or additions to the original specifications, drawings, designs and instructions that may appear to him necessary and advisable during the progress of work and the contractor shall be bound to carry out the work in accordance with any instructions which may be given to him in writing signed by the Engineer-in-Charge and such alteration shall not invalidate the contract and any additional work which the contractor may be directed to do in the manner above specified as part of the work shall be carried out by the contractor on the same conditions in all respects on which he agreed to do the main work, and at the same rates as are specified in the tender for the main work. The time for the completion of the work shall be extended in the proportion that the additional work differs to the original contract work and the certificate of the Engineer-in-Charge shall be conclusive as to, such proportion. And if the additional work includes any class of work, for which no rate is specified in this contract, then such class of work shall be carried out at the rates entered in the sanctioned schedule of rates of the locality during the period when the work is being carried on and if such last mentioned class of work is not entered in the schedule of rates of the district, then the contractor shall within seven days of the date of his receipt of the order to carry out the work inform the Engineer-in-Charge of the rate which it is his intention to charge for such class of work, and if the Engineer-in-Charge does not agree to this rate he shall by notice in writing be at liberty to cancel his order to carry out such class of work and arrange to carry it out in such manner as he may consider advisable.

Do not invalidate contracts.

No deviations from the specification stipulated in the contract nor additional items of work shall ordinarily be carried out by the contractor, nor shall any altered, additional or substituted work be carried out by him, unless the rates of the substituted, altered or additional items have been approved and fixed in writing by the Engineer-in-Charge. The contractor shall be bound to submit his claim for any additional work done during any month on or before the 15th day of the following month accompanied by a copy of the order in writing of the Engineer-in Charge for the additional work and that the contractor shall not be entitled to any payment in respect of such additional work if he fails to submit his claim within, he aforesaid period.

contract nor additional items of work shall ordinarily be carried out by the contractor, nor shall any altered, additional or substituted work be carried out by him, unless the rates of the substituted, altered or additional items have been approved and fixed in writing by the Engineer-in-Charge. The contractor shall be bound to submit his claim for any additional work done during any month on or before the 15th day of the following month accompanied by a copy of the order in writing of the Engineer-in Charge for the additional work and that the contractor shall not be entitled to any payment in respect of such additional work if he fails to submit his claim within, he aforesaid period.

Extension of time in consequence of alteration.

Rates of work not in estimate or schedule of rates of the District.

Provided always that if the contractor shall commence work or incur any expenditure in regard thereof before the rates shall have been determined as lastly herein before mentioned, in such case he shall only be entitled to be paid in respect of the work carried out or expenditure incurred by him prior to the date of the determination of the rates as aforesaid according to such rates as shall be fixed by the Engineer-in-Charge. In the event of a dispute, the decision of the Executive Engineer of the Circle will be final.

Clause - 11: If at any time after the commencement of the work the Governor of Odisha shall for any reason whatsoever not required the whole thereof as specified in the tender to be carried out the Engineer-in-Charge shall give notice in writing of the fact to the contractor who shall have no claim to any payment or compensation whatsoever on account of any profit or advantage which he might have derived from the execution of the work in full but which he did not derive in consequence of the full amount of the work not having been carried out neither shall he have any claim for compensation by reason of any alterations having been made in the original specification, drawings, designs and instruction which shall involve any curtailment of the work as originally contemplated.

No compensation for alteration in or restriction of work to be carried out.

Clause -12: If it shall appear to the Engineer-in-charge or his sub-ordinate-in-charge of the work, that any work has been executed with unsound, imperfect or unskillful workmanship or with materials of any inferior description, or that any materials or articles provided by him for the execution of the work are unsound or of a quality inferior to that contracted for or otherwise not in accordance with the contract, the contractor, shall on demand in writing from the Engineer-in-Charge specifying the work, materials or articles complained of notwithstanding that the same may have been inadvertently passed certified and paid for, forthwith rectify or remove and reconstruct the work so specified in whole or in part, as the case may require or as the case may be, remove the materials or articles so specified and provide other proper and suitable materials or articles at his own proper charge and cost, and in the event of his failing to do so within a period to be specified by the Engineer-in-charge in his demand aforesaid, then the contractor shall be liable to pay compensation at the rate of one percent on the amount of the estimate for every day not exceeding ten days, while his failure to do so shall continue and in the case of any such failure the Engineer - in -charge may rectify or remove, and re-execute the work or remove and replace with others, the materials or articles complained of as the case may be at the risk and expense in all respects of the contractor. Work to be open for inspection. Contractor or responsible agents to be present.

Action and compensation payable in case of bad work.

Clause - 13: All works under or in course of execution or executed in pursuance of the contract shall at all times be opened to the inspection and supervision of the Engineer - in-charge and his subordinates and the contractor shall at all times during the usual working hours, and at all other times at which reasonable notice of the intention of the Engineer -in-charge or his subordinates to visit the works shall have been given to the contractor either himself be present to receive orders and instruction, or have a responsible agent duly accredited in writing present for that purposes. Orders given to the contractor's agent shall be considered to have the same force as if they had been given to the contractor himself.

Work to be open for inspection.

Contractor or responsible agents to be present.

Clause -14: The contractor shall give not less than five days notice in writing to Engineer-in-charge or his subordinate -in charge of the work before covering up or otherwise placing beyond the reach of measurement of any work in order that the same may be measured and correct dimensions thereof be taken before the same is so covered up or placed beyond the reach of measurement and shall not cover up or place beyond the reach of measurement, any work without the consent in writing of the Engineer in charge or his subordinate - in charge of the work and if any work shall be covered up or placed beyond the reach of measurement without such notice having been given or consent obtained the same shall be uncovered at the contractor's expense, or in default thereof no payment or allowance shall be made for such work or the materials with which the same was executed.

Notice to be given before work is covered up.

Clause -15: If the contractor or his work people, or servants shall break, deface injure or destroy any part of a building in which they may be working or any building, road, fence, enclosure or grass land or cultivated ground continuous to the premises on which the work or any part of it is being executed or if any damage shall happen to the work while in progress due to any cause what so ever or any imperfection became apparent in it within one year from the date of final certificate of its completion shall have been given by the Engineer-in Charge, as aforesaid the contractor shall make the same good at his own expenses or in default the Engineer-in-Charge may cause the same to be made good by other workmen and deduct the expenses (of which the certificate of the Engineer-in-Charge shall be final) from any sums that may be then, or at any time thereafter may become due to the contractor, or from his security deposit or the proceeds of sale thereof, or of a sufficient portion thereof and the contractor shall be liable to pay any part of the expenses not so recovered by the Engineer-in-charge.

Contractor is liable for damages to the work and for imperfection within one year of final certificate.

Clause -16: The contractor shall supply at his own cost all materials (except such special materials, if any as may in accordance with the contract be supplied from the Engineer -in -charge's store), Plant, tools, appliances, Implements, ladders, cordage, tackle scaffolding and temporary works requisite or open for the proper execution of the work whether original, altered or substituted, and whether included in the specification or other documents forming part of the contract referred to in these conditions or not to which may be necessary for the purpose of satisfying or complying with the requirement of the Engineer-in Charge as to any matter as to which under this conditions he is entitled to be satisfied which he is entitled to require together with carriage therefore to and from the work. The contractor shall also supply without charge the requisite number of persons with the means and materials necessary for the purpose of setting out works and counting, weighing and assisting in the measurement of examination at any time and from time to time of the work or the materials. Failing him so doing the same may be provided by the Engineer-in-Charge at the expense of the contractor and the expenses may be adjusted from any money due to the contractor under the contract or from his security deposit or the proceeds of sale thereof or of a sufficient portion thereof. The contractor shall also provide all necessary fencing and lights required to protect the public from accident and shall be bound to bear the expenses of defense of every suit, action or other proceedings at law that may be brought any person for injury sustained owing to neglect of the above precautions, and to pay damages and cost which may be awarded in any such suit, action or proceedings to any such person or which may with the consent of the contractor be paid to compromise any claim by any such person

Contractor to supply plants, ladders, scaffolding etc; and is also liable for damages arising from non-provision of lights, fencing etc.

Clause -17: No female labourer shall be employed within the limits of a cantonment.

The contractor shall not employ for the purpose of this contract any person who is below the age of twelve years, and shall pay to each labourer for the work done by such labourer, wages not less than the wages paid for similar work in the neighborhood.

The Executive Engineer shall have the right to enquire into and decide any complaint alleging that

Clause -18(b): Super/Special class contractor shall employ under him one Graduate Engineer and two Diploma Holders belonging to the state of Orissa. Likewise, "A" class contractor shall employ under him one Graduate Engineer or two Diploma Holders belonging to the State of Orissa. Such class of contractors executing civil works, electrical works etc., shall employ under them the technical staff as specified above belonging to the respective disciplines for supervision of their works. The employment of Graduate Engineers and Diploma Holders under the contract shall be full time and continuous and they should not be superannuated, retired, dismissed or removed personnel from any state govt. or central govt. service / public sector undertakings / private companies and firms or be ineligible for appointment to govt. service. The contractor shall pay them monthly emoluments which shall not be less than the emoluments of the personnel of equivalent qualification employed under the State Govt. of Orissa. The Chief Engineer (Roads), Orissa may however assist the contractor with names of such unemployed Graduate Engineers or Diploma Holders if such help is sought for by the contractor. The names of such engineering personnel appointed by the contractor should be intimated to the tender receiving authority along with the tender as to who would be supervising the work. Each bill of the special class or "A" class contractor shall be accompanied by an employment roll of the engineering personnel together with a certificate of the Graduate Engineers or Diploma Holders so employed by the s to the effect that the work executed as per the bill has been supervised by him / them.

Clause - 19: The contract shall not be assigned or sublet without the written approval of the Executive Engineer and if the contractor shall assign or sublet his contract or attempt to do so or become insolvent or commence any insolvency, proceedings or make any composition with his creditor or attempt to do so or if any bribe, gratuity, gift, loan, perquisite reward, or advantage, pecuniary or otherwise, shall either directly or indirectly be given, promised, or offered by the contractor, or any of his servants or agents to any public officer or persons in the employment of Government in any way relating to his office or employment, or if any such officer or person shall become in any way directly or indirectly interested in the contract, the Executive Engineer may there upon by notice in writing rescind the contract and the security deposit of the contractor shall there upon stand forfeited and be absolutely at the disposal of Government and the same consequences shall ensure as if he contract had been rescinded under the clause 2 hereof, and in addition the contractor, shall not be entitled to recover or be paid for any work thereto for actually performed under the contract.

Work not to be sublet.

Contract may be rescinded and security deposit forfeited for subletting, bribing or if contractor becomes insolvent.

Clause – 20: All sums payable by way of compensation under any of these conditions shall be considered as reasonable compensation to be applied to the use of Government without reference to the actual loss or damage sustained and whether or not any damage shall have been sustained.

Sum payable by way
of compensation to

be considered as
reasonable
compensation without
reference to actual loss.

Clause – 21: In the case of a tender by partners, any change in the constitution of the firm shall be forth with notified by the contractor to the Engineer-in-charge for his information.

Changes in
constitution of firm

In the case of failure to notify the change in the constitution within fifteen days the Engineer-in-charge may by notice in writing rescind the contracts and the security deposit of the contractor shall thereupon stand forfeited and be absolutely at the disposal of Government and the same consequences shall ensue as if the contract had been rescinded under clause-2 hereof, and in addition the contractor shall not be entitled to recover or be paid for any work therefore actually performed under the contract.

Clause – 22: All works to be executed under the contract shall be executed under the direction and subject to the approval in all respects of the Executive Engineer of the Circle for the time being who shall be entitled to direct at what point or points and in what manner they are to be commenced and from time to time carried on.

Clause - 23 : DELETED.

Clause - 24 : When the estimate on which a tender is made includes lump sums in respect of parts of the work the contractor shall be entitled for payment In respect of the Items of work involved or the part of the work in question at the same rates as are payable under this contract for such items, or if the part of the work in question is not, in the opinion of the Engineer-in-charge capable of measurement, the Engineer-in-charge may at his discretion pay the lump sum amounts entered in the estimate, and the certificate in writing of the Engineer-in-charge shall be final and conclusive against the contractor with regard to any sum or sums payable to him under the provisions of this clause.

Lump sums in
estimate.

Clause – 25: In the case of any class of work for which there is no such specification as is mentioned in the rule I, such work shall be carried out in accordance with Circle specification and in the event of there being no circle specification, then in such case the work shall be carried out in all respect in accordance with the instructions and requirements of the Engineer-in-charge.

Action where no
specification.

Clause - 26: The expression “work” or “works” where used in these conditions shall, unless there be something either in the subject or context repugnant to such construction, be construed, and taken to mean the works by or by virtue of the contract contracted to be executed, whether temporary or permanent, and whether original, altered, substituted or additional.

Definition of work.

Clause – 27: Government shall be entitled to recover in full from the contractor any amount that the Government may be liable to pay under Workman’s compensation Act VIII of 1923 to any workman employed in course of execution of any part of the work covered by this contract.

Clause – 28: That for the purpose of jurisdiction in the event of dispute if any, the contract should be deemed to have been entered into within the state of Odisha and it is agreed that neither party to the contract or of agreement will be competent to bring a suit in regard to the matters covered by this contract at any place outside the state of Odisha.

Clause – 29: The department will have the right to inspect the scaffolding and centering made for the work and can reject partly or fully such structure if found defective in their opinion.

Clause – 30: Sanitary arrangements will be made by the contractor at his own cost for his labour camp.

Clause – 31: The contractor shall bear all taxes including G.S.T; Income tax, royalty, fair-weather charges and tollage etc., where necessary.

Clause 32: Price Adjustment

32.1: Contract price shall be adjusted for increase or decrease in rates and price of labour, materials, fuels and lubricants in accordance with the following principles and procedures and as per formula given in following Para:

(a) The price adjustment shall apply for the work done from the start date given in the contract data up to end of the initial intended completion date or extensions granted by the Engineer and shall not apply to the work carried out beyond the stipulated time for reasons attributable to the contractor.

(b) The price adjustment shall be determined during each month from the formula given in following Para:

(c) Following expressions and meanings are assigned to the work done during each month:

R= Total value of work done during the month. It would include the amount of secured advance granted, if any, during the month, less the amount of secured advance recovered, if any during the month. It will exclude value for works executed for extra items under **Clause-34: Codal Provision** variations.

32.2: To the extent that full compensation for any rise or fall in costs to the contractor is not covered by the provisions of this or other clauses in the contract, the unit rates and prices included in the contract shall be deemed to include amounts to cover the contingency of such other rise or fall in costs.

The formulae for adjustment of prices are:

32(a) (i): Adjustment of other materials component

Price adjustment for increase or decrease in cost of local materials other than cement, steel, bitumen pipe and POL procured by the contractor shall be paid in accordance with the following formula:

$$VM = 0.85 \times P_m / 100 \times R_x (M_1 - M_0) / M_0$$

VM = Increase or decrease in the cost of work during the month under consideration due to changes in rates for local materials other than cement, steel, bitumen, pipe and POL.

M₀ = The all-India wholesale price index (all commodities) on 28 days preceding the date of opening of bids, as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

M₁ = The all-India wholesale price index (all commodities) for the month under consideration as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

P_m = Percentage of local material component (other than cement, steel, bitumen, pipe and POL) of the work.

32(a)(ii): Adjustment for cement component

Price adjustment for increase or decrease in the cost of cement procured by the contractor shall be paid in accordance with the following formula:

$$V_c = 0.85 \times P_c / 100 \times R_x (C_1 - C_0) / C_0$$

V_c = Increase or decrease in the cost of work during the month under consideration due to changes in the rate for cement

C₀ = The all-India wholesale price index for Ordinary Portland Cement (OPC) on 28 days preceding the date of opening of bids as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

C₁ = The all-India wholesale price index for Ordinary Portland Cement (OPC) for the month under consideration as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

P_c = Percentage of cement component of the work

32(a) (iii): Adjustment for steel component

Price adjustment for increase or decrease in the cost of steel procured by the contractor shall be paid in accordance with the following formula:

$$V_s = 0.85 \times P_s / 100 \times R_x (S_1 - S_0) / S_0$$

V_s = Increase or decrease in the cost of work during the month under consideration due to changes in the rate for steel

S_0 = The all-India wholesale price index for steel (Mild Steel long products) on 28 days preceding the date of opening of bids as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

S_1 = The all-India wholesale price index for steel (Mild Steel long products) for the month under consideration as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

P_s = Percentage of steel component of the work

Note: For the application of this clause, index of Mild Steel long products has been chosen to represent steel group.

32(a) (iv): Adjustment of bitumen component

Price adjustment for increase or decrease in the cost of bitumen shall be paid in accordance with the following formula:

$$V_b = 0.85 \times P_b / 100 \times R_x (B_1 - B_0) / B_0$$

V_b = Increase or decrease in the cost of work during the month under consideration due to changes in the rate for bitumen

B_0 = The official retail price of bulk bitumen at the IOC / BPCL depot at nearest centre on the day 28 days prior to date of opening of bids

B_1 = The official retail price of bulk bitumen at IOC / BPCL depot at nearest centre for the 15th day of the month under consideration

P_b = Percentage of bitumen component of the work

32(a) (v): Adjustment towards differential cost of pipes

Price adjustment for increase or decrease in the cost of pipe shall be paid in accordance with the following formula:

$$V_{pi} = 0.85 \times P_{pi} / 100 \times R_x (P_{i1} - P_{i0}) / P_{i0}$$

V_{pi} = Differential cost of pipe i.e. amounts of increase or decrease in rupees to be paid or recovered during the month under consideration

P_{pi} = Percentage of pipe component of the work

P_{i1} = All India whole sale price index of pipe for the period under consideration as published by the Ministry of Commerce and Industry, Government of India, New Delhi

P_{i0} = All India whole sale price index of pipe on 28 days preceding the date of opening of bids as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

32(b): Adjustment of labor component

Price adjustment for increase or decrease in the cost due to labour shall be paid in accordance with the following formula:

$$V_L = 0.85 \times P_L / 100 \times R_x (L_1 - L_0) / L_0$$

V_L = Increase or decrease in the cost of work during the month under consideration due to changes in rates for local labour

L_0 = The minimum wages for unskilled labour as notified by Government of Odisha as prevailed on the last stipulated date of receipt of tender including extension, if any.

L_1 = The minimum wages for unskilled labour as notified by Government of Odisha as prevailed on the last date of the

month previous to the one under consideration

Pl= Percentage of labour component of the work

32(c): Adjustment of POL (fuel and lubricant) Component

Price adjustment for increase or decrease in cost of POL (fuel and lubricant) shall be paid in accordance with the following formula:

$$V_f = 0.85 \times P_f / 100 \times R \times (F_1 - F_0) / F_0$$

V_f = Increase or decrease in the cost of work during the month under consideration due to changes in the rates for fuel and lubricants

F_0 = The official retail price of High-Speed Diesel (HSD) at the existing consumer pumps of IOCL/ BPCL/ HPCL at nearest centre on the day 28 days prior to the date of opening of bids

F_1 = The official retail price of HSD at the existing consumer pumps of IOCL/ BPCL/ HPCL at nearest centre for the 15th day of the month under consideration

P_f = Percentage of fuel and lubricants component of the work

Note: For the application of this clause, the price of High-Speed Diesel oil has been chosen to represent fuel and lubricants group.

32(d): Adjustment for Plant and Machinery Spares Component

Price adjustment for increase or decrease in the cost of plant and machinery spares procured by the contractor shall be paid in accordance with the following formula:

$$V_p = 0.85 \times P_p / 100 \times R \times (P_1 - P_0) / P_0$$

V_p = Increase or decrease in the cost of work during the month under consideration due to changes in the rates for plant and machinery spares

P_0 = The all-India wholesale price index for manufacture of machinery for mining, quarrying and construction on 28 days preceding the date of opening of bids as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

P_1 = The all-India wholesale price index for manufacture of machinery for mining, quarrying and construction for the month under consideration as published by the Ministry of Commerce and Industry, Government of India, New Delhi.

P_p = Percentage of plant and machinery spares component of the work.

Note: For the application of this clause, index of manufacturing of machinery for mining, quarrying and construction has been chosen to represent the plant and machinery spares group.

Regarding wholesale price Index (WPI) for appropriate commodity for payment of price adjustment, due to change of base year of WPI from 1993-94 to 2004-05 & 2011-12, it is observed that, the commodity 'Bars and Rod', 'Cement', 'Heavy machinery and parts' included in the list of WPI 1993-94 series are not mentioned as such in the WPI 2004-05 & 2011-12 series. Therefore, the following items in the WPI 2004-05 & 2011-12 series shall be considered corresponding to items in WPI 1993-94 series:

Sl. No.	Item in WPI 1993-94 series	Item in WPI 2004-05 series	Item in WPI 2011-12 series
1.	Cement	Grey cement	Ordinary Portland Cement
2.	Bars & rods	Rebars	Mild steel long products
3.	Heavy machinery & parts	Construction machinery	Manufacture of machinery for mining, quarrying & construction

32(e): APPLICATION OF ESCALATION CLAUSE:

The contractor shall for the purpose of availing reimbursement/refund of differential cost of steel, bitumen, cement, pipe, POL and wages, keep such books of account and other documents as are necessary to show that the amount of increase claimed or reduction available and shall allow inspection of the same by a duly authorized representative of Government and further, shall at the request of the Engineer-in-Charge, furnish documents to be verified in such a manner as the Engineer-in-Charge may require any document and information kept. The contractor shall within a reasonable time of 15 days of his becoming aware of any alteration in the price of such material, wages of labour and /or price of POL give notice thereof to the Engineer-in-Charge stating that the same is given pursuant to this condition along with information relating to there to which he may be in a position to supply.

Percentage Table

Sl. No.	Category of works		% Component (cost wise)		
			Labour (Pl)	P.O.L. (Pf)	Steel (Ps) + Cement (Pc) + Bitumen (Pb) + Pipes (Ppi) + Plant and Machinery Spares Component (Pp) + Other Materials*
1.	R. &B. works (% of component)	Road work	5	5	90
		Bridge work	5	5	90
		Building work	5	5	90
2.	Irrigation works (% of component)	Structural work	5	5	90
		Earth, Canal & Embankment work	5	5	90
3.	P. H. Work (% of component)	Structural work	5	5	90
		Pipeline work	5	5	<u>Pipe-70%</u> *Machinery + other materials-20%
		Sewer Line	5	5	<u>Pipe-70%</u> *Machinery + other materials-20%

*Note: Further break up has been worked out considering the consumption of cement, steel, bitumen, pipe and plant & machinery spare component in the work and has been enclosed herewith in shape of “Schedule of Adjustment Data” as an “Appendix to Bid”.

Appendix to Bid
Schedule of Adjustment Data

Clause No. 32 of F2/ P1 contract Sl. No.	Index description	Source of Index	Base value*	Base date*	Weightage of item**
32(a) (i)	Other materials	All India wholesale price index (all commodities) as published by the Economic Advisor to the Govt. of India, Ministry of Commerce and Industry	Values to be filled up at the time of drawl of contract	Values to be filled up at the time of drawl of contract	
32(a) (ii)	Cement	Wholesale price index for cement (Ordinary Portland Cement) as published by the office of the Economic Advisor to the Govt. of India, Ministry of Commerce and Industry			
32(a) (iii)	Steel	Wholesale price index for steel (Mild steel - long products) as published by the office of the Economic Advisor to the Govt. of India, Ministry of Commerce and Industry			
32(a) (iv)	Bitumen (VG-30)	Official retail price of bulk bitumen at the nearest IOCL/HPCL depot			

32(a) (v)	Pipes	Wholesale price index for the type of pipe under consideration as published by the office of the Economic Advisor to the Govt. of India, Ministry of Commerce and Industry			
32(b)	Labour	Minimum wage notified by the Labour & Employees State Insurance Department of Government of Odisha, India			5.00%
32(c)	POL	Official retail price of High-Speed Diesel (HSD) at nearest IOCL/ HPCL/ BPCL consumer pump depot			5.00%
32(d)	Plant & machinery	Wholesale price index for manufacture of machinery for mining, quarrying and construction as published by the office of the Economic Advisor to the Govt. of India, Ministry of Commerce and Industry			
Total:					100%

*Values to be filled up at the time of drawl of contract

**Values to be filled up in the bid document

Clause-33: After the work is finished all surplus materials and debris are to be removed by the contractor and preliminary works such as vats, mixing platforms etc.; are to be dismantled and all materials removed from the site.

The tenderer should aware of relevant provision of OPWD code with latest amendments and shall be abided by it. OPWD is deciding in case of any dispute arises.

Clause – 34 (FAIR WAGE CLAUSE)

Clause – 34 (a): - The contractor shall not employ for the purpose of this contract any person who is below the age of twelve years and shall pay to each labourer for work by such labourers fair wages.

EXPLANATION – Fair wages mean, wages, whether for time or piece work prescribed by the state P.W.D. provided that where higher rates have been prescribed under the minimum Wages Act, 1948, wages at such higher rates would constitute Fair Wages.

The **Executive Engineer** shall have the right to enquire into and decide any complaint alleging that the wages paid by the contractor to any labourer for the work done by such labourer is less than the wages as per sub paragraph 1 above.

(b) The Contractor shall, notwithstanding the provision of any contract to contrary, cause to be paid a fair wage to labourers indirectly engaged on the work including any labour engaged by his sub- contractors in connection with the said work as if the labourers had been immediately employed by him.

(c) In respect of all labour directly or indirectly employed in the work for the performance of the contractor's part of this agreement, the contractor shall comply with or cause, to be complied with all regulation made by the Government in regard to payment of wages, wage period, deductions from wages, recovery of wages not paid and deductions unauthorized made, maintenance of wage register, wage cards, publications of scale of wages and other terms of employment, inspection and submission of periodical returns and all other matters of a like nature.

(d) The **Executive Engineer / Sub Divisional Officer** concerned shall have the right to deduct from the money due to the contractor any sum required or estimated to be required for making good the loss suffered by a worker or workers by reason of non – fulfillment of the conditions of the contract for the benefit of the workers, non – payment of wages or of deductions made from his or their wages, which are not justified by their terms of the contract or non-observance of the regulations. Money so deducted should be transferred to be workers concerned.

(e) Vis-à-vis, the Government of Odisha, the contractor shall be primarily liable for all payments to be made under and for the observance of the regulations aforesaid without prejudice to his right to claim indemnity from his sub-contractor.

(f) The regulations aforesaid shall be deemed to be a part of this contract and any breach thereof shall be breach

of this contract.

(g) Under the provision of the Minimum Wages Act, 1948 and the Minimum Wages (Central Rules, 1950) the contractor is bound to allow or cause to be allowed to the labourers directly or indirectly employed in the work one day rest for six days continuous work and pay wages at the same rates as for duty. In the event of default, the **Executive Engineer / Sub Divisional Officer** concerned shall have the right to deduct the sum not paid on account of wages for weekly holiday to any labourer and pay the same to the persons entitled thereto from any money due to the contractor.

(h) The contractor shall at his own expenses provide or arrange for the provision of foot wear for any labourer doing cement mixing work and black topping of roads (the contractor has undertaken to execute under this contract) to the satisfaction of the Engineer-in-charge and on his failure to do so, Government shall be entitled to provide the same and recover the cost from the contractor.

(i) The contractor shall submit by the 4th & 19th of every month to the Engineer – in – charge, a true statement showing in respect of the second half of the preceding month and the first half of the current month respectively, (1) the number of labourers employed by him on the work (2) their working hour (3) the wages paid to them (4) the accident that occurred during the said fortnight showing the circumstances under which they happened and the extent of damage and injury caused by them and (5) the number of female workers who have been allowed maternity benefit according to clause (k) and (6) and the amount paid to them failing which the contractor shall be liable to pay to government a sum not exceeding Rs 50.00 for each default or materially in correct statement. The decision of the **Executive Engineer** shall be final in deducting from any bill due to contractor amount levied as fine.

(j) In respect of all labour, directly or indirectly employed in the works for performance of the contractor's part of this agreement, the contractor shall comply or cause to be complied with all the rules framed by Government from time to time for the protection of health and sanitary arrangements for workers employed by the Odisha Public Works Department and its contractors. This will apply to work places having 50 or more workers.

(k) Maternity benefit rules for female workers employed by contractor: Leaves and pay during leaves shall be regulated as follows.

1. Leave: - (i) In case of Delivery: - Maternity leave not exceeding 8 weeks, 4 weeks up to and including the day of delivery and 4 weeks following that day.

(ii) In case of miscarriage: - Up to 3 weeks from the date of miscarriage.

2. Pay: - (i) In case of Delivery: - Leave pay during maternity leave will be at the rate of the women's average daily earnings calculated on the total wages earned on the days when full time work was done during the period of three months immediately preceding the date on which she gives notice that she expects to be confined.

(ii) In case of Miscarriage: - Leave pay at the rate of average daily earning calculated on the total wages earned on the days when full time work done during a period of 3 months immediately preceding the date of such miscarriage.

Conditions for the Grant of Maternity Leave: - No maternity leave benefit shall be admissible to a woman unless she has been employed for a total period not less than 6 months immediately preceding date on which she proceeds on leave.

Clause – 35 (MODEL RULES FOR HEALTH & SANITARY ARRANGEMENTS FOR WORKERS BY ODISHA PW D OR ITS CONTRACTORS):

1. **Application:** - These rules shall apply to all construction works in charge of Odisha Public Works Department which are expected to continue for a year or more.
2. **Definitions:** - (i) Work place means a place at which an average of fifty or more workers is employed in connection with construction work.
(ii) Large work place means a place at which an average of 500 or more workers is employed in connection with construction work.
3. **First Aid:** - (a) At every work place there shall be maintained in a readily accessible place first aid appliances including an adequate supply of sterilizer dressings and sterilized cotton wool. The appliance shall be kept in good order and in large work places; they shall be readily available during working hours.

(b) At large work places where hospital facilities are not available within easy distance of the work, First Aid Posts shall be established and be run by a trained compounder.

(c) Where large work places are remote from regular hospitals, an Indoor ward shall be provided with one bed for every 250 employees.

(d) Where large work places are situated in cities, towns or in their suburbs and no beds are considered necessary owing to the proximity of the city or town hospitals, an ambulance shall be provided to facilitate removal of urgent cases to these hospitals. At other work places, some conveyance facilities, such as a car shall be kept readily available to take injured persons or persons suddenly fallen seriously ill to the nearest hospitals.

4. **Drinking Water:** - (a) In every work place, there shall be provided and maintained at suitable places easily accessible to labour a sufficient supply of water fit for drinking.

(b) Where drinking water is obtained from an intermittent public water supply, each work place shall be provided with storage where such drinking water shall be stored.

(c) Every Water supply storage shall be at a distance of not less than 15M, (50 feet) from any latrine, drain or other sources of pollution. Where water has to be drawn from an existing well which is within such proximity of latrine, drain or any other source of pollution, the well shall be properly chlorinated before water is drawn from it for drinking. All such wells shall be entirely closed in and be provided with a trap door which shall be dust and water proof.

(d) A reliable pump shall be fitted to each covered well the trap doors shall be kept locked and opened only for cleaning or inspection which shall be done at least once a month.

(e) The temperature of drinking water supplied to workers shall not exceed 90°F.

5. **Washing and bathing places:** - (i) Adequate washing and bathing places shall be provided separately for men and women

(ii) Such places shall be kept in clean and drained condition.

6. **Scale of accommodation in Latrines and Urinals:** - There shall be provided within the premises of all work place latrines and urinals in an accessible place and the accommodation separately for each of them shall not be less than the following

(a) Where the number of persons employed : No. of seats 1
does not exceed 50.

(b) Where the number of persons employed : No. of seats 3
exceeds 50 but does not exceed 100

(c) For every additional 100 : No of seats 3 per 100

(In particular cases the **Executive Engineer** shall have the power to verify the scale where necessary.)

7. **Latrines and Urinals for Women:** - If women are employed, separate latrines and urinals separate from that for men and marked in the vernacular in conspicuous letter "For Women Only" shall be provided on the scale laid in these rules.

Those for men shall be similarly marked "For Men Only". A poster showing the figure of a man or woman shall also be exhibited at the entrance of latrines for each sex. There shall be adequate supply of water close to the urinals and latrines.

8. **Latrines and Urinals:** - Except in work places provided with water flushed latrines and urinals connected with water born sewerage system, all latrines shall be provided with receptacles on dry earthen system which shall be cleaned at least four times daily and at least twice during working hours and kept in a strictly sanitary condition. The receptacles shall be tarred inside and outside at least once a year.

9. **Construction of latrines:** - The inside wall shall be constructed of masonry or stone materials and shall be cement washed inside and outside at least once a year. The dates of cement washing shall be noted in register maintained for this purpose and kept available for inspection.

10. **Disposal of Excreta:** - Unless otherwise arranged for by the local sanitary authorities, arrangement for proper disposal of excreta by incineration at the work place shall be made by means of suitable incinerator approved by Asst. Director of Public Health or Municipal Medical Officer or Health Officer as the case may be, in whose jurisdiction the work place is situated. Alternatively, excreta may be disposed off by putting a layer of night soil at the bottom of pucca tank prepared for the purpose and covering it with a layer of waste or refuse and then covering it up with 6 inch layer of earth for a fortnight when it will turn into manure.

11. **Provision of shelters during rest:** - At every work place, there shall be provided free of cost two suitable shades one for meals and the other for rest for use of labourers. The height of the shelter shall not be less than 3.30 M (11 feet) from the floor level to the lowest part of roof.

12. **Crèches :-** (a) At every work place at which more than 50 women workers are employed, there shall be

provided one hut for the use of children under the age of 6 years, belonging to such women and shall be used for infants games and play and their bed room. The hut shall not be constructed on a lower standard than the following.

- i. Thatched roofs
- ii. Mud floors and walls
- iii. Planks spread over the mud floor and covered with matting

The hut shall be provided with suitable and sufficient opening for light and ventilation. There shall be adequate provision for sweepers to keep the place clean. There shall be two dhais in attendance. Sanitary utensils shall be provided to the satisfaction of the Health Officer of the area concerned. The use of the hut shall be restricted to children, their attendant and mothers of children.

- (b) Where the number of women workers is not more than 50, the contractor shall provide one hut and one dhai to look after the children of women workers.
- (c) The size of crèche shall vary according to the number of women workers.
- (d) The crèche shall be properly maintained and necessary equipment like toys etc. shall be provided.

13. **Canteen:** - A cooked food canteen on a moderate scale shall be provided for the benefit of workers whenever it is considered expedient.

The terms and conditions of the agreements have been read/ explained to me and I/WE certify that I/WE clearly understand them.

Clause – 36: ODISHA P.W.D. / ELECTRICITY DEPARTMENT CONTRACTOR'S LABOUR REGULATIONS:

1. Short title: These regulations may be called “The Odisha Public Works Department / Electricity Department contractors Regulations.”

2. Definitions: In these Regulations unless otherwise expressed or indicated the following words and expression shall have the meaning hereby assigned to them respectively, that is to say.

1. “Labour” means workers employed by a contractor of the Odisha Public Work Department / Electrical Department directly / indirectly through a sub – contractor or other person, or by an agent on his behalf.
2. “Fair Wages” means wages whether for time or piece work prescribed by the State Public Works Department provided that where higher rates have been prescribed under the Minimum Wages Act 1948, wages at such higher rates should constitute fair wages.
3. “Contractor” shall include every person whether a sub-contractor or headman or agent employing labour on the work taken on contract.
4. “Wages” shall have the same meaning as defined in the Payment of Wages Act and include time and piece rate wages, if any.

3. Display of notice regarding wages, etc.: -

The contractor shall: -

(a) Before he commences his work on contract, display and correctly maintain and continue to display and correctly maintain, in a clean and legible condition, in conspicuous place on the work, notices in English and in the local Indian language spoken by the majority of the workers, giving the rate of wages prescribed by the State Public Works Department/ Electricity Department for the district in which the work is done.

(b) Send a copy such notices to the Engineer – in – charge of the work.

4. Payment of wages: -

1. Wages due to every worker shall be paid to him direct.
2. All wages shall have to be paid in current coin or currency or in both.

5. Fixation of wage period: -

- (1) The contractor shall fix the wage period in respect of which the wages be payable.
- (2) No wage period shall exceed one month.
- (3) Wages of every workman employed on the contract shall be paid before the expiry of ten days after the last day of the wage period in respect of which the wages are payable.
- (4) When the employment of any worker is terminated by or on behalf of the contractor, the wages earned by him shall be paid before the expiry of the day succeeding the one on which his employment is terminated.
- (5) All payments of wages shall be made on working day.

6. Wage book and wage cards etc.

- (1) The contractor shall maintain a Wage book of each worker in such form as may be convenient, but the same shall include the following particulars.:
 - (a) Rate of daily or monthly wages.
 - (b) Nature of work on which employed.
 - (c) Total number of days worked during each wages period.
 - (d) Total amount payable for the work during each wage period.
 - (e) All deductions made from the wages with an indication in each case of the ground for which the deduction is made.
 - (f) Wage actually paid for each wage period.
- (2) The contractor shall also maintain a wage card for each worker employed on the work.
- (3) The **Executive Engineer** may grant an exemption from the maintenance of wage bond, wage cards to a contractor who in his opinion may not directly or indirectly employ more than 100 persons on the work.

7. Fines and deductions which may be made from wages: -

- (1) The wage of a worker shall be paid to him without any deduction of any kind except the following.
 - (a) Fines
 - (b) Deduction for absence from duty, i.e. from the place or places where by the terms of his employment

he is required to work. The amount of deductions shall be in proportion to the period for which he was absent.

(c) Deduction for damage or loss of goods expressly entrusted to the employed person for custody, or for loss of money for which he is required to account where such damage or loss is directly attributable to his neglect or default.

(d) Any other deductions which the Government may from time to time allow.

(2) No fines shall be imposed on a worker and no deduction for damage or loss shall be made from his wages until the worker has been given an opportunity for showing cause against such fines or deduction.

(3) The total amount of fines which may be imposed in anyone wage period on a worker shall not exceed an amount equal to five paise in a rupee of the wages payable to him in respect of that wage period.

(4) No fine imposed on any worker shall be recovered from him by installments or after the expiry of 60 days from the date on which it was imposed.

8. Register of fines, etc: -

(1) The contractor shall maintain a register of fines and of all deductions for damage or loss. Such register shall mention the reason for which fine was imposed or deduction for damage or loss was made.

(2) The contractor shall maintain a list in English and in the local Indian language clearly defining acts and omissions for which penalty or fine can be imposed. It shall display such list and maintain it in a clean and eligible condition in conspicuous places of the work.

9. Preservation of register: -

The wage registers, the wage cards and the register of fines, deductions required to be maintained under these regulations shall be preserved for 12 months after date of the last entry made in them.

10. Power of Labour Welfare Officers to make investigation/ inquiry: -

The Labour Welfare Officer or any other persons authorized by the Government of Odisha on their behalf shall have power to make enquiries with a view to ascertaining and enforcing due and proper observance of the fair wage clauses and the provisions of the regulations. He shall investigate into any complaint regarding default made by the contractor/Sub-contractor in regard to such provisions.

11. Report of Labour Welfare Officer: -

The Labour Welfare Officer or other authorized as aforesaid shall submit a report of the result of his investigation or enquiry to the **Executive Engineer** concerned indicating the extent, if any, to which the default has been committed with a note that necessary deduction from the contractor's bill be made and the wages and the other dues be paid to the labourers concerned.

12. Appeal against the decision of Labour Welfare Officer:

Any person aggrieved by the decision and recommendation of the Labour Welfare Officer or other person so authorized may appeal against such decision to the Labour Commissioner within 30 days from the date of decision forwarding simultaneously a copy of his appeal to the **Executive Engineer** concerned but subject to such appeal, the decision of the officer shall be final and binding upon the contractor.

13. Inspection of Registers: -

The contractor shall allow inspection of the wage book and wage cards to any of his workers or to his agent at a convenient time and place after due notice is received, or to the Labour Commissioner or any other person authorized by the Government of Odisha on his behalf.

14. Submission of return: -

The contractor shall submit periodical returns as may be specified from time to time.

15. Amendment: -

Government of Odisha may from time to time, add to or amend these regulations. On any question as to the application, interpretation or effect of these regulations, the decision of the Labour Commissioner or any other person authorized by the Govt. of Odisha on that behalf shall be final.

Clause -37: The royalty of materials will be recovered from the work bill in case of failure of production of proper receipt from quarry Holder or Revenue Department after proper verification from concerned Tehsildar.

Clause -38: Amount specified may vary and the work will be taken up as per availability of funds. No claim whatsoever in this regard will be entertained.

Clause-39: (a) The earth work quantity will be assessed from cross sections taken at suitable intervals as decided by the **Executive Engineer, Muran Dam Division, Khatiguda**. Initial levels will be taken with reference to bench marks, which should be kept at site till finalization of the contract. The initial cross section papers should be signed by both the parties before starting earth work. The final cross sections of the embankment in filling reaches when finished to designed section will be taken for each portion of embankments and plotted over the initial level sections to ascertain the final quantity to be arrived by deducting necessary settlement allowance. The measurement for earth work should be at 30 M or at closer grid.

(b) Stone to be excavated shall be measured in solid normally, but if the site condition do not permit solid measurement as assessed by the Engineer-in-Charge due to a mixture of various rock in the particular location, stack measurement will be taken at the direction of the Engineer-in-charge from the stacks to be measured. Deduction shall be made for voids at 40 % minimum for closely packed stacks subject to increase in percentage according to the nature of compactness in stacking. No consideration will be given to any adverse condition by the contractor in his tender.

(c) Rubble stones, boulders, rough stones, soling stones are measured by volume of closely packed stacks. 1/6th volume for voids shall normally be deducted from closely packed stacks. Percentage of void shall be determined an actual observation and deducted.

(d) 12 ½ voids shall be deducted from metal and moorum stacks. The box of size 1.5m X 1.5m X 0.5 m to be measured as 1.5m X 1.5m X 0.44 = 1 cum. Similar measurement to be adopted for gravel stacks also and voids deducted. The rates are excluding voids.

Clause-40: Curing of all cement works will be done by the contractor as per instruction of the Engineer-in-charge at his own cost.

Clause-41: Dewatering of any magnitude either of excavation of foundation to finished section and laying concrete or masonry work or any structure when and wherever necessary during complete execution period will have to be done by the contractor at his own cost. This is treated to be inclusive of his tendered rate.

Clause-42: (a) The contractor should keep himself in constant touch with the Engineer-in-charge for smooth execution of work and arrange for adequate labourer depending on the work load and working place available. No claim for idle labour on any account will be entertained.

(b) The contractor is fully responsible for safe guard of the Govt. property entrusted to him.

Clause-43: No extension of time shall be allowed to the contractor, however it may be considered in case of exigencies like natural calamities only. The extension of time may be allowed if authority feels necessary. But no claim for monetary compensation will be entertained under any circumstances.

Clause-44: After completion of the work the contractor shall arrange at his own cost all requisite equipments and labour for testing the work and bear the entire cost of such test.

Clause-45: All correspondence with the tenderer will be made through post in the address given in the tender. The tenderer must mention in the tender, his correct postal address where letters can be delivered to him. The department will not hold responsible for non-receipt of any letter by the tenderer either for wrong address given by him or for his absence from the given address.

Clause-46: Any jungle clearance needed for borrowing earth beyond the toe of the embankment beyond the excavation limits is the responsibility of the contractor and no extra payment will be made.

Clause-47: Earth work beyond the theoretical designed will not be paid for.

Clause-48: Construction of coffer dams or islands or the works of open excavation or dressing required for construction of structure and approach drain should be included in the rates.

Clause-49: The contractor should take all precautions to protect the structures from flood damages at his own cost

during the period of execution. Damages if any caused by the probable flood during monsoon till completion and handing over of entire work will be made by the contractor at his own cost.

Clause-50: By submitting a tender for any work the tenderer will be deemed to have satisfied himself by actual inspection of the site/quarry and locality of the work about the quality and availability of the required quantity of materials including medical aids, labour and food stuff etc; and that the rates quoted by him in the tender will be adequate to complete the work according to the specification and conditions attached to and that he has taken into account all conditions, difficulties that may be encountered during its progress and to have quoted labour rates and materials, octroi and other duties, leads, lifts loading and unloading and freight for materials and all other charges necessary for the completion of the work to the entire satisfaction of the Engineer-in-Charge of the work and his authorized sub-ordinates. After acceptance of the contractor's rates Govt. will not pay any extra charges for any reason in case the contractor is found later on to have misjudged in conditions as regards availability of materials, labour or any other factors. It should be understood clearly that no claim whatsoever will be entertained afterwards on the plea of non-availability of proper quantity of materials including food stuff or any other cause.

Clause-51: It shall be distinctly understood that it is entirely the responsibility of the contractor to make such arrangement as may be required from time to time to protect the men, machinery, materials and the work under progress and work for which the measurements were recorded and a payment made.

Clause-52: The embankment slopes and banks will be maintained by the contractor till the final payment is made and any rain cuts, side settlements that would occur should be made good by him at his own cost without any claim.

Clause-53: (a) There will not be any compensation or extension of time granted for the reason of adequate cash flow.

(b) Works could be suspended depending on availability of funds and no compensation will be admissible on this accord except sanction of extra time.

(c) No compensation / claim for delay in sanction of deviation / extra items and payment there of will be admissible to contractor.

Clause-54: The contractor shall be responsible for compensation to any of his workman under Workmen's Compensation Act.

Clause-55: In case of down loaded tenders received with any addition, alternation & deletion, the approved tender document available with the Executive Engineer, Khatiguda is binding.

Clause-56: - As per para-No. 4 of the Resolution No. 12653 dated. 15.12.2008 of Govt. of Odisha Labour & Employment Deptt. the levy and collection of Cess @ 1% on the cost of construction should be paid by the

Agency.

The terms and conditions of the agreements have been read/ explained to me and.....certify that
... ..clearly understand them.

ADDENDUM TO CONDITION OF CONTRACT

1. NOTIFICATION OF AWARD AND SIGNING OF AGREEMENT

The bidder / tenderer whose bid has been accepted will be notified of the award by the Engineer-in-Charge prior to expiration of the validity period by cable, telex or facsimile confirmed by registered letter. This letter (herein after and in the conditions of contract called the “Letter of acceptance”) will state the sum that the Engineer-in-Charge will pay the contractor in consideration of the execution, completion and maintenance of the works by the contractor as prescribed by the contract (herein after and in the contract called the “contract price”).

The notification of award will constitute the formation of the contract, subject only to the furnishing of a performance security (I.S.D.) and additional performance security in accordance with the provisions of the agreement.

The agreement will incorporate all agreements between the officer inviting the bid / Engineer-in-Charge and the successful bidder. Within 15 (fifteen) days following the notification of award along with the letter of acceptance, the successful bidder will sign the agreement and deliver it to the Engineer-in-Charge. Following documents shall form part of the agreement.

i The notice inviting bid, all the documents including additional conditions, specifications and drawings, if any, forming the bid as issued at the time of invitation of bid and acceptance thereof together with any correspondence leading there to and required amount of performance security including additional performance security.

ii Standard P.W.D. form P1.

2. TIME CONTROL.

2.1 Progress of work and re-scheduling programme.

2.1.1. The Executive Engineer / Engineer in charge shall issue the letter of acceptance to the successful contractor. The issue of the letter of acceptance shall be treated as closure of the Bid process and commencement of the contract.

2.1.2. Within 15 days of issue of the letter of acceptance, the contractor shall submit to the Engineer-in-charge for approval and programme commensurate to clause no 2 showing the general methods, arrangements, and timing for all the activities in the works along with monthly cash flow forecast.

2.1.3. To ensure good progress during the execution of the work the contractors shall be bound in all cases in which the time allowed for any work exceeds one month to complete, 1/4th of the whole of the work before 1/4th of the whole time allowed under the contract has elapsed, ½ of the whole of the work before ½ of the whole time allowed under the contract has elapsed, 3/4th of the whole of the work before 3/4th of the whole time allowed under the contract has elapsed.

2.1.4 If at any time it should appear to the Engineer-in-charge that the actual progress of the work does not conform to the programme to which consent has been given, the contractor shall produce, at the request of the Engineer-in-charge a revised programme showing the modifications to such programme necessary to ensure completion of the work within the time for completion. If the contractor does not submit an updated programme within this period, the Engineer-in-charge may withhold the amount of 1% of the contract value from the next payment certificate and continue to withhold this amount until the next payment after the date on which the overdue programme has been submitted.

2.1.5 An update of the programme shall be a programme showing the actual progress achieved on each activity and the effect of the progress achieved on the timing of the remaining work including any changes to the sequence of the activities.

2.1.6 The Engineer-in-charge’s approval of the programme shall not alter the contractor’s obligations. The contractor may revise the programme and submit it to the Engineer-in-charge again at any time. A revised programme is to show the effect of variations and compensation events.

2.2 Extension of the Completion date.

2.2.1 The time allowed for execution of the work as specified in contract data shall be the essence of the contract. The execution of the works shall commence from the 15th day or such time period as mentioned in letter of award after the date on which the Engineer-in-charge issue written orders to commence the work or from the date of handing over of the site whichever is later. If the contractor commits default in commencing the execution of the work as aforesaid, Government shall without prejudice to any other right or remedy available in law, be at liberty to forfeit the earnest money and performance guarantee/security deposit absolutely.

2.2.2 As soon as possible after the contract is concluded the contractor shall submit a time and progress chart for each milestone and get it approved by the Department. The chart shall be prepared in direct relation to the time stated in the contract documents for completion of items of the work, it shall indicate the forecast of the dates of commencement and completion of various trades of section of the work and may be amended as necessary by agreement between the Engineer-in-charge and the Contractor within the limitation of time imposed in the contract documents, and further to ensure good progress during the execution of the work the contractor shall in all cases in which the time allowed for any work, exceeds one month (save for special jobs for which a separate programme has been agreed upon) complete the work as per milestone given in contract data.

2.2.3 In case of delay occurred due to any of the reasons mentioned below, the contractor shall immediately give notice therefore in writing to the Engineer-in-charge but shall nevertheless use constantly his best endeavors to prevent or make good the delay and shall do all that may be reasonably required to the satisfaction of the Engineer-in-charge to proceed with the works.

- i. Force majeure or
- ii. Abnormally bad weather or
- iii) Serious loss or damage by fire or
- iv) Civil commotion, local commotion of workmen, strike or lockout, officers any of the heads employed on the work or
- v) Delay on the part of other contractors or tradesmen engaged by Engineer-in-charge, in executing work not forming part of the contract.
- vi) In case of variation is issued which makes it impossible for completion to be achieved by the intended completion date without the contractor taking steps to accelerate the remaining work and which would cause the contractor to incurred additional cost or
- vii) Any other cause, which, in the absolute discretion of the authority mentioned, in contract data is beyond the contractor's control.

2.2.4 Request for re-schedule and extension of time to be eligible for consideration shall be made by the contractor in writing within fourteen days of the happening of the event causing delay. The contractor may also, if practicable, indicate in such a request the period for which extension is desired.

2.2.5 In any such case a fair and reasonable extension of time for completion of work may be given. Such extension shall be communicated to the contractor by the Engineer-in-charge in writing. Within 3 months of the date of receipt of such request, Non application by the contractor for extension of time shall not be a bar for giving a fair and reasonable extension by the Engineer-in-charge and this shall be binding on the contractor.

2.3. Compensation for delay. (Penalty Clause)

2.1.4 If the contractor fails to maintain the required progress in terms of clause 2 or to complete the work and clear the site on or before the contract or extended date of completion he shall without prejudice to any other right or remedy available under the law to the Government on account of such breach pay as agreed compensation the amount calculated at the rates stipulated below as the Executive Engineer(whose decision in writing shall be final and

binding) may decide on the amount of tendered value of the work for every completed day /month (as applicable) that the progress remains below that specified in clause 2 or that the work remains incomplete. This will also apply to items or group of items for which a separate period of completion has been specified compensation @1. 5% per month for delay of work, delay to be computed on per day basis. Provided always that the total amount of compensation for delay to be paid under this condition shall not exceed 10% of the tendered value of work or to the tendered value of the item or group of items of work for which a separate period of completion is originally given. The amount of compensation may be adjusted or set off against any sum payable to the contractor under this or any other contract with the Government. In case the contractor does not achieve a particular milestone mentioned in contract data, or the rescheduled milestone(s) in terms of clause 2.5 the amount shown against that milestone shall be withheld, to be adjusted against the compensation levied at the final grant of extension of time. Withholding of this amount on failure to achieve a milestone, shall be automatic without any notice to the contractor. However, if the contractor catches up with the progress of work on the subsequent milestone(s) the withheld amount shall be released. In case the contractor fails to make up for the delay in subsequent milestone(s) amount mentioned against each milestone missed subsequently also shall be withheld. However, no interest, whatsoever, shall be payable on such withheld amount.

2.4 Bonus for early completion:

The incentive for timely completion should be on a graduated scale of 1 (one) percent to 5 (five) percent of the contract value. Assessment of incentives may be worked out for earlier completion of work in all respect in the following scale.

Before 30% of contract period = 5% of Contract Value.

Before 20 to 30% of contract period = 4% of Contract Value.

Before 10 to 20% of contract period = 3% of Contract Value.

Before 5 to 10% of contract period = 2% of Contract Value.

Before 5% of contract period = 1% of Contract Value.

The amount of bonus, if payable, shall be paid along with final bill after completion of work. This should only be paid in respect of individual project for new construction / substantial additional or improvement works, the minimum value of which is mentioned below:

Sl. No.	Name of the work	Minimum value
1	Building work/Public Health work	₹40.00 lakh
2	Road work	₹3.00 crore
3	Irrigation work	₹10.00 crore

Incentive/bonus will be paid with approval of next higher authority of tender accepting authority on completion of original work before original time schedule.

2.5 Management of Meetings.

2.5.1 Either the Engineer or the contractor may require the other to attend a management meeting. The business of a management meeting shall be review the plans for remaining work and to deal with matters raised in accordance with the early warning procedure.

2.5.2 The Engineer shall record the business of management meetings and is to provide copies of his record to those attending the meeting and to the employer. The responsibility of the parties for actions to be taken is to be decided by the Engineer either at the management meeting or after the management meeting and stated in writing to all who attended the meeting.

RELEVANT PROVISION IN THIS CONTRACT STANDS MODIFIED ACCORDINGLY.

SPECIAL CONDITION OF CONTRACT

1. DEFINITIONS:

In the Contract (as hereinafter defined) the following words and expressions will have the meanings here by assigned to them:

- a) **Approved/Approval**- Means approved in writing.
- b) **Construction Plant**- Means all equipments, appliances or things of whatsoever nature required for the executing or completion, maintenance of the works or temporary works but does not include materials or other things intended to form or forming part of the permanent work.
- c) **Contract** - Means the Instruction and information for tenderer, General and Special conditions of the contract, technical specification, drawings, tender (including the schedule of quantities and tender prices), the formal agreement and all agenda and attachment related to the above.
- d) **Contractor**- Means the particular person, firm or Corporation with whom the contract has been made for executing the work.
- e) **Drawing** - Means the drawings referred to in the specifications, any modifications of such drawings approved in writing by the Engineer-in-charge and such other drawings as may from time to time be furnished or approved in writing by the Engineer-in-charge.
- f) **Engineer-in-charge** - Means the **Executive Engineer**, in-charge of the work specified or parts of the works under the contract, or such other departmental assistants or sub-ordinates to whom the **Executive Engineer**, / Engineer- in-charge may have delegated certain duties, acting separately within the scope of the particular duties entrusted to them.
- g) **Government** - Means Government of Odisha, Department of Water Resources.
- h) **I.S.S. /B.I.S.** - Means Indian Standard Specifications/Bureau of Indian Standard.
- i) **Temporary works** - Means all temporary works of every kind required for the performance of the contract.
- j) **Specification** - Whenever the terms "Specification" is used, apart from a specified standard specification, it shall mean the specification or plan prepared for a particular site as instructed to the contractor in executing that item of work.

2. EARNEST MONEY DEPOSIT:

- i) Tenderers including Govt. undertakings are required to deposit earnest money @ 1% of the amount put to tender. ii) In case the contractor proposes to engage machineries and equipments as asked for in the tender document owned or hired but deployed outside the State, he /she is required to furnish additional 2% EMD as bid security. The entire bid security including the additional bid security shall stand forfeited in case the contractor fails to mobilize the machineries within stipulated time as per the tender document.
- iii) The Bidder shall deposit/transfer the amount of Earnest Money Deposit (Bid Security) to be pledged in favour of the **Executive Engineer, Muran Dam Division, Khatiguda, Nabarangpur, Odisha** and may be in any of the following shape:
 - a) Transfer the amount through online payment mode / payment gateway of designated banks to the **SBI Account No. 41447065443 (IFSC Code - SBIN0006910)**
 - b) Deposit Receipt of any Schedule Bank.
 - c) National Savings Certificate.
 - d) Kisan Vikash Patra
 - e) No Cash/Bank Draft / Cheque payments are accepted.
 - f) Earnest money given with one tender previously and submitted with another tender is not to be entertained.

3. TAX CERTIFICATES:

The tenderers are also required to furnish Xerox/attested copy of the valid PAN Card, along with tender documents failing which the tender may not be considered. The original are to be shown at the time of opening. The bidders registered outside the State are required to submit an undertaking in the form of an affidavit that they are not registered under the GST Act in the state of Odisha as they have not started any business in the state and they have no liability under the Act. But Bidder has to produce valid GST certificate in form GST before signing of the agreement.

TAXES:

- A. The rates quoted by the Contractor shall be deemed to include GST and other taxes including royalties of all materials that the contractor will have to purchase for performances of this contract.
- B. During the course of contract period conditions as may be required under the provision of Odisha GST Act and Rules should be binded with the contract.

C. WORKS CONTRACTS & TAX DEDUCTION AT SOURCE: (TDS) UNDER G.S.T.

Under G.S.T. works contract is composite service taxable at CGST + SGST. The works contract will avail Input Tax Credit (ITC) on the input used for execution for work contract.

D. Income Tax:

Income Tax will be deducted from each running bill as per prevailing norms & condition and amended from time to time by the Government of Odisha.

E. Labour Cess:

Amount of labour cess will be deducted from each running bill @ 1% of contract value as per prevailing norms & condition and amended from time to time by the Government of Odisha.

F. TDS:

TDS / TCS will be deducted from each running bill as per prevailing norms & condition and amended from time to time by the Government of Odisha.

In case any amendment to the existing provisions is made during the tenure of the contracts, the same will be applicable to this contract.

4. VALIDITY OF TENDER:

4.1 Deleted.

4.2 The tenderer must furnish copy of Registration & GST clearance certificate at the time of opening of tender document otherwise his/her bid shall be declared as non-responsible & shall be liable for rejection.

4.3 The rates quoted shall remain valid for a period of 90 (ninety) days from the last date prescribed for receipt of tenders.

4.4 The tender which is not in the prescribed proforma and is not strictly in accordance with the terms and conditions of the tender call notice is liable for rejection.

4.5 Alternate tenders, conditional tenders and tenders containing indefinite terms will not be entertained. The tenders will be considered by giving special emphasis on the capability of the tenderer and the implements and earth moving machinery at his disposal for the work.

4.6 Rates quoted should be for finished items of work and for sufficiency as per the description of the schedule of quantity and specification and shall include all taxes including GSTIN on works contract, royalty, cess and general and incidental charges pertinent to the work, other charges of materials, octroi duty, ferry tolls, conveyance charges and other costs on account of land and building including temporary building required by the tenderer for collection of materials, storage, housing of staff or other purpose for the work. The tenderer must quote the percentage rate for the work to be included in contract and tenders containing indefinite terms such as estimate rate or item rates shall not be considered. All rates must be for finished items of work unless otherwise mentioned in the tender schedule.

4.7 The Percentage rate in the tender should be written both in words and figures and in case of any discrepancy noted, the percentage rate written in words will prevail.

i) The tenderer shall bear cost of various incidental sundries and contingencies needed by the work of all within the following or similar category.

ii) Labour camps and hutments necessary to a suitable scale including contingency and sanitary arrangements, medical aids thereon to the satisfaction of the health authorities.

iii) Water arrangements for labourers as well as for the works. No claim for carriage for water whatsoever will be entertained.

iv) Fees and dues levied by the Municipal and Water Supply Authorities.

v) Suitable equipment and wearing apparatus for the labours engaged in risky operation.

iv) Suitable fencing, barriers, signals including parapet and electrical signal where necessary at works and approaches in order to protect the public and employees from accidents.

vii) No compensation for any damage done by rain or by similar action during execution of the works shall be paid.

viii) The tender shall be written legibly and free from erasures, overwriting or correction of the figures. Corrections unavoidable should be made by scoring out the same and initialing dating and rewriting. The tender should show the total of each page and grand total of whole tender.

4.8 The tender is to be decided as per prevailing codal provisions taking into consideration the capacity of the tenderer and equipments available with him for the work. The authority reserves the right to reject any or all tenders without assigning any reason there to.

4.9 In order to qualify for consideration for award of the contract the tenderer should satisfy the bid criteria as stipulated in the Technical Bid. To substantiate the tenderer is required to submit authentic records duly certified by the Executive Engineer of the Department in support of such experience.

4.10 Percentage to be quoted by the contractor for various the work should be consistent and rational. Tenders with inconsistent percentage and / or speculative percentage shall be liable for rejection.

4.11 The payment for RA bill will be made in level section measurement and no string section measurement will be considered.

4.12 All the tenderer are required to submit along with their tender declaration about the names of their relatives employed in Water Resources Department in the prescribed proforma appended. In case they have no relation in Water Resources Department a certificate to that effect shall have to be furnished.

4.13 An affidavit shall be furnished by the contractor at the time of submission of tender paper about the authentication of tender documents including E.M.D.

4.14 The conditions in this detailed tender call notice will form part of the agreement to be drawn by the contractor.

5. AWARD OF CONTRACT:

The tenderer whose tender is selected for acceptance shall within a period of fifteen days upon written intimation being given to him by Registered post, deposit initial security deposit so that the EMD and initial security deposit will be 2% (two percentage) +additional security 1% in case of machineries to be hired from outside, of the accepted tender amount and sign the agreement in the PWD form P1 for fulfillment of the contract in the office of the Engineer-in -charge. This initial security deposit together with the EMD and the amount of 5% deduction from each running bill as per P1 agreement shall be retained as security deposit for the fulfillment of this contract. This security deposit will carry no interest. Failure to enter into the required agreement and to pay the security deposit as above within the specified period shall entail forfeiture of the earnest money. No tender shall be finally accepted until the required amount of security money is deposited. The written agreement to be entered into between the Contractor and the Govt. shall be the foundation of the rights of both the parties and the contract shall be deemed to be incomplete until the agreement is first signed by the Contractor and then by the Executive Engineer, the department will accept the initial security deposit in the accepted from prescribed in clauses as above pledged in favor of the Engineer-in -Charge and in no other form. The Security deposit deducted from each running bill will be 5%. If the contractor expresses his request in writing he will be permitted to convert the security deposit of 5% into interest bearing securities (for an amount not less than Rs. 10.00 lakh in each case which will be pledged in favour of the Executive Engineer. Successful bidder registered under other state government/MES/Railways/CPWD has to register under the State PWD before signing of the agreement.

5 .2. In case of delay in acquisition of land no compensation will be admissible but extension of time will be granted. 5 .3. The earnest money deposited by the unsuccessful tenderers will be refunded as per relevant rules in force.

5.4. Special Class contractors shall employ under him one Graduate Engineer and two Diploma holders belonging to the State of Odisha. Likewise, an 'A' Class contractor shall employ under him one Graduate Engineer or two Diploma holders belonging to state of Odisha. The employment of such graduate Engineer and Diploma holders under the Contractor shall be for full time and continuous and they shall not be superannuated, retired, dismissed or removed personnel from any State Government/Central Government Service / Public Sector Undertakings /Private companies and firm or be ineligible for appointment to Govt. service. The contractor shall pay them monthly emoluments, which shall not be less than the emoluments of the personnel of equivalent qualification employed under the State Govt. of Odisha.

The Chief Engineer Roads, Odisha may however assist the contractor with names of such unemployed Graduate Engineers and Diploma holders if the contractor seeks for such help. The name of such Engineering personnel appointed by the contractor who would be supervising the works should be intimated to the tender receiving authority along with each tender. Each bill of the contractor shall be accompanied by an employment roll of engineering personnel together with certificate of the Graduate Engineer or Diploma holder employed by the contractor to the effect that the work executed as per the bill has been supervised by him.

5.5. No part of the contract shall be sublet without written permission of the Engineer-in-charge or any transfer be made by power of attorney authorizing others to receive payment on behalf of the contractor.

5.6 No tenderer is permitted to furnish their tender in his own manuscript paper.

6. OBSERVATIONS OF LAWS AND LOCAL REGULATIONS, ACCIDENTS AND SAFETY MEASURES:

The Contractor shall observe all State and Local rules and regulations so far as they are relevant in controlling the operations involved carrying out the work and indemnify the Govt and employees of the Govt. against all suite, losses, demands, actions, judgments and cost of every kind resulting from the commissions and omissions of the contractor and his employees in violation of the said rules and regulations.

6.1 Department for payment of the compensation under Workmen's Compensation Act VIII of 1923 on account of the workmen being employed by him and the full amount of compensation awarded by any competent court of law to the workmen will be recovered from the contractor and will be paid to the workmen as per direction of the court.

6.2 The contractor shall have to abide by the Labour Laws and Rules in vogue and shall provide at his own cost housing, water supply, sanitation, medical aid and other facilities to the labours engaged in the work as required under Labour Laws and Regulations. The Contractor shall not employ labour of minor age group.

6.3 The contractor shall have to abide by the safety code introduced by the Govt. of India, Ministry of Works, Housing and Supply in their standing order No.44150 dated 25.11.57.

6.4 Blasting where required shall be taken up only when proper precaution have been taken for the protection of lives and property in accordance with I.S. 4081 – 1967: Safety code for blasting and related drilling operations. Only persons licensed for and thoroughly conversant with the working methods and precaution to be observed in using explosives shall carry out blasting. To avoid the danger of injury from flying debris, all personnel in a blasting area shall retreat to an adequate cover. While carrying out excavation adequate precautions in accordance with I.S. 3764 – 1966: Safety code for excavation works shall be taken for the safety of workers. The contractor shall have to abide by the blasting rules & regulations.

6.5 In case of any damage to Govt. or public property or to the property owned to any persons or firms or bodies due to negligence or any such action of the contractor resulting in damage or stoppage or work there by, the contractor shall be liable to be penalized to the extent of the assessed value of the damage or the out turn lost.

7. CHANGE OF ADDRESS OF CONTRACTOR:

The bidder must mention in the bid, his correct postal address where letters can be delivered to him. All correspondence with the bidder will be made through post in the address given in the bid. The department will not hold responsible for non-receipt of any letter by the bidder either for wrong address given by him or for his absence from the given address. The contractor shall inform the Engineer-in-Charge and the department any change of his postal address from time to time from the one given in the bid and authorise any person with due intimation to the Engineer-in-Charge and the department to receive instructions or communications from the department on his behalf, failing which the said undelivered instructions and communications published in the notice board of the Engineer-in-Charge shall be treated to be intimation to the contractor and the same shall be binding on him. All the correspondence should be made in English.

8. ARCHAEOLOGICAL FINDINGS:

The contractor shall deliver to the Engineer-in-charge all articles of archaeological importance as and when those are found in course of execution.

9. CONTEMPORARY CONTRACTORS:

The contractor shall take into consideration the needs and requirements of the other contractors if any, working in the vicinity during the tenure of his contract and shall neither take nor cause to be taken any steps or actions that may cause disruption / disturbance to their work, labour or arrangements etc. Any action by the contractor that the Engineer-in-charge in his unquestioned direction may consider as infringement of the above would be considered as a breach of contract and he may take such action against the contractor as deemed fit.

10. INTEREST:

Under no circumstances interest is payable for dues of the Contractor if any lying unpaid or payable for the work.

11. PLANS AND DRAWINGS:

The work has to be carried out in accordance with the Odisha Detailed Standard Specification and relevant I.S. Specification pertaining to the tendered items of work and specifications and special conditions appended here to. Drawings will be supplied to the contractor to execute the work in general conformity therewith. These drawings will be supplemented by such additional, general and detail drawings or directions as may be considered necessary or desirable as the work progress. No claim will be entertained due to change of

drawing. Where details shown on those drawings differ from the requirement of the specifications, the requirement of the specifications shall govern and the contractor shall not work without proper drawings, direction and instructions. He shall check all drawings carefully and bring to the notice of the Engineer-in-charge any error and omissions and discovered, where upon the Engineer-in-charge shall prepare revised additional drawings and specifications as may be required. All such additional general and detailed drawings will be binding on the Contractor under the same terms and conditions as provided in clauses of F2 agreement. The decision of the Engineer-in-charge with regards to specification is final, for which no compensation or claim will be entertained.

12. CONSTRUCTION PROGRAMME:

i) The contractor shall have to submit the construction programme i.e. the plan and programme of execution for completion of the work at the time of agreement to the Engineer-in-charge. The Engineer-in charge shall have to approve the said construction programme by fixing a pragmatic mile stone with reference to the provisions laid down under clause 2(a) of the condition of the contract, for timely completion of the work and accordingly the work is required to be executed.

ii) If the revised construction programme is required on account of non-completion of work for which Extension of Time is required or for disruption of the execution in the stipulated period, the contractor shall have to submit the same to the Engineer-in-charge along with the Extension of Time application, if extension of time is prayed for or immediately after disruption of the execution mentioning the clear reasons as the case may be, for revision of work programme. The decision of the Engineer-in-charge is final and binding on the contractor. The contractor shall arrange for additional shifts whenever necessary to suit the revised construction programme. No extra payment on this account is admissible.

B. The contractor has to make adequate lighting arrangements for night works wherever necessary in fulfillment of the construction programme at his own cost and no extra payment on this account is admissible.

13. AVAILABILITY OF LABOUR:

Labour required for the work may not be available to the full extent in the locality. The contractor may have to import labour from outside. He shall arrange and regulate the labour strength according to necessity. The Department shall not entertain the claim for any idle labour whether or not at the fault of the contractor or due to any other reasons whatsoever. The contractor's item rate in the tendered are deemed to have adequate coverage on account of import and employment of required labours and providing facilities and amenities to them.

14. SUSPENSION OF WORK:

The Engineer-in-charge may from time to time by written orders without in any way deviating the contract, direct the contractor to suspend the work or any part thereof at such time and the contractor shall not after receiving such written order proceed with the work or items thereof ordered to be suspended until he shall have received a written notice from the Engineer-in-charge to proceed with the work again. Should the work be ordered to be suspended directly in the interest of safety of the work due to acts of God or major war or indirectly as a result of the contractor not complying with any of the provisions of the contract in respect of the quality of the materials, workmanship, programmed of execution he shall not be entitled to claim any compensation for any loss he may be put to directly or indirectly for such suspension of work.

During the period of suspension of the work the contractor shall properly protect and secure the works as necessary in the opinion of the Engineer-in-charge.

15. ITEMS NOT COVERED IN THE SCHEDULE:

The items of work not covered in the agreement shall be paid in the current schedule of rates of the State and those not covered by the said schedule of rates will be paid on actual analysis approved by competent authority.

16. FORCE MAJEURE:

The contractor shall take all precautions to protect the work from damages due to rains, flood, cyclones, fire or by any other natural calamity, public agitation or riots etc and also make good such damage if any at his own cost during the period of execution and till the work is taken over by the Department. No compensation will be paid to the contractor on account of idle labour due to above reason.

17. TOOLS AND PLANT:

The contractor should arrange necessary tools, plant and machineries for the efficient execution of work at his own cost and the rates quoted should be inclusive of such charges. The department may lend on hire some machineries for use in the work subject to their availability on terms and condition as shall be specified by the Department from time to time and after execution of necessary agreement. But on the plea of non-supply of machineries by the Department, the works should not be delayed nor any compensation on such account is tenable nor will the contractor be eligible for any time extension on that score.

18. HAUL ROADS:

All haul roads to borrow areas and quarries will be constructed and maintained by the contractor at his own cost. The roads so constructed shall be allowed to be used free of cost by agencies working in other reaches including Govt. Department unless otherwise restricted by the Engineer-in-charge.

19. DEPARTMENTAL STOCK MATERIALS:

The contractor may be issued stock materials as per terms and conditions specified under Clause - 8 of F2 contract for bonafied use in the work. It shall be his responsibility to make all arrangements for proper transport, safe storage, watch and ward of materials and all other charges incidental there on. No payment shall be made on this account to the contractor separately. He shall be responsible for any loss or damage of departmental materials and machinery during transit and execution of work.

20. CONSTRUCTION SHEDS:

Temporary structures may be erected by the contractor at his expenses for storage sheds, office, residence, labour hutments etc; on the land available with the Department with the permission of the Engineer-in-charge. On completion of the work these structures should be dismantled and the site cleared and handed over to the Department.

21. RATE:

21.1. In the event of delay in supply of departmental materials or supply of detailed structural designs for unavoidable reasons, reasonable extension of time will be granted on the application of the contractor. But no claim for monetary compensation will be entertained under any circumstances.

21.2. Any slip debris and other foreign materials deposited on the working region on account of rains, flood or any other cause prior to and during the course of execution and till the work is completely taken over by the department have to be cleared by the contractor at his cost. The rates quoted by the contractor shall be inclusive of all such contingencies.

21.3. The contractor shall not interfere with the execution of water supply or electrical arrangements or any other works entrusted to any other agency by the Department at any time during progress of work.

21.4. It shall be the responsibility of the contractor to make such arrangements as may be required from time to time to protect men, machinery and the works against damage due to flood and the department accepts no liability whatsoever for damage or loss on this context.

22. SITE CLEARANCE:

Such portion of the site of work as may be considered necessary for the purpose of alignment and demarcation shall be cleared of jungle, if any by the contractor at his own cost. The limits of the structure within which work will be carried out within the scope of the contractor shall be suitably demarcated by the Department. The contractor has to supply necessary labour at his own cost for fixing benchmark pillars/alignment pillars / alignment and pegs and also for layout, leveling and profiling and maintaining the same till completion of the work. The contractor at his own cost will supply cement concrete pillars required for layout. The layout and Bench mark pillars already laid out by the Department is to indicate generally this alignment of Canal in the field. The contractor while taking up excavation works will preserve original pillars.

23. NO CLAIM FOR IDLE LABOUR:

Contractor should keep himself in touch with the Engineer-in-charge for smooth execution of work and arrange adequate labour depending upon the work load and working space available. No claim whatsoever for detention / idle of labour will be entertained.

24. OTHER CONTRACTORS:

Contractor's operations shall be so planned as to prevent water from his work flowing or finding way in to the neighboring reaches. In the event of water from his reach flowing or finding way into the neighboring or subsequent reaches, the respective contractor shall be liable to pay compensation towards any expenditure incurred and loss or damage sustained by the concerned contractor(s) on account of the said reasons unless they otherwise mutually settle the issue amongst themselves. Provided that if there, by any dispute among the contractors on the account of such compensation arises, the decision of the Engineer-in-charge shall be final and conclusive and binding on concerned contractor.

25. SITE ORDER BOOK:

An order book with pages serially numbered will be issued by the **Executive Engineer** shall be maintained by the Sectional Officer systematically till completion of the work and there after surrender it, to the Engineer-in-charge for record. The order book shall be available at the site during work hours for recording instructions relating to the work. Order regarding the work as and when necessary, shall be entered in this book by the **Executive Engineer** or his superiors in office with their dated signature in exercise of statutory power vested on them which shall be duly noted by the contractor or his authorized agent with his dated signature. The Superintending Sub-ordinate, the in charge of work shall also record his observation of defective work and such orders / observation entered in this book, and noted by the contractor agent shall be considered to have been duly given to the contractor, similarly orders entered by the Executive Engineer and Chief Engineer shall be deemed to have been duly issued by the Engineer - in - charge for the contract.

26. CLAIM BOOK:

A claim book of pages serially numbered shall be issued by the **Executive Engineer** to the contractor who shall maintain it systematically and securely, and shall record in it such items as are not covered by his contract and or claimable as extra claim shall be entered in this book under the dated signature of the contractor or his duly authorized agent at the end of each month.

A certificate should be furnished by him along with those claims to the effect that beyond the claims entered in the book, the contractor has no other claims up-to-date. If in any month there are no claims to be recorded, a certificate to that effect should be furnished by the contractor in the claim book. Each claim must be definite and should give also as far as possible the quantities as well as the total amount claimed. The claim book must be submitted regularly by the contractor to the Engineer-in-charge by the 10th day of each month for his orders. Claims not made in this manner are liable to be summarily rejected. The claim book shall be finally surrendered by the contractor to the Engineer-in-charge for record.

27. RULE TO VERBAL ORDER:

It shall be the contractor's responsibility to get any verbal orders, instructions or directions confirmed in writing without which no cognizance will be taken of such verbal orders, instructions or directions for settlement of any claim arising thereof.

28. STATUTORY OBLIGATIONS OF CONTRACTOR:

The contractor shall have to arrange water required for the work at his own cost.

28.1. The contractor shall have to construct and maintain coffer dam as required for the work during execution at his own cost.

28.2. Bailing out water from foundation, construction of cross bund, dewatering wherever necessary during execution of the work shall have to be done by the contractor at his own cost.

28.3. Gangway, scaffolding or any such arrangements required for the work are to be provided by the contractor at his own cost as per direction of the Engineer-in-charge. The Department will have the right to inspect such arrangement made for the work and reject partly or fully such structures found defective in opinion of the Engineer-in-Charge.

28.4. Department shall not pay compensation to the contractor for the damage occurred to the materials and work entrusted to his due to natural calamities

29. DEPARTMENTAL RIGHT FOR DEVIATION IN QUANTITIES:

Right is reserved to make such increase or decrease in quantity or item of work mentioned in the schedule attached to the tender notice as may be considered necessary for satisfactory completion of the work and such increase or decrease shall in no way invalidate the contract.

30. SAFETY OF MACHINERIES:

Unusual flood may occur during the working season. In the event of overtopping or breach in the cofferdam/embankment due to such flood in the working season resulting in flooding of the working area or outside the working area, the contractor shall make his own arrangement to shift the machineries and equipments, materials etc. to a safe place at his own cost. The work shall be resumed after the floods. Necessary reconstruction of the cofferdam / embankment clearing the working area of debris and silt shall have to be done by the contractor at his own cost. Suitable extension of time may however be granted in such eventualities at the request of the contractor, but no compensation whatsoever shall be paid in this regard.

31. CONTRACTOR DYING, BECOMING INSOLVENT, INSANE OR IMPRISONED:

(a) In the event of the death, insanity, insolvency and imprisonment of the contractor or the contractor being a partnership firm becomes dissolved or being a corporation goes into the liquidation, the contract may be terminated by notice in writing pasted at the site of work and advertised in one issue of the local newspaper and all acceptable works shall be paid for after recovering all the contractor's dues to Govt. there from at appropriate rates to the person or persons entitled to receive and give an dishonor age for the payment.

(b) If the contractor becomes bankrupt or has a receiving order made against him or compound with his creditor or being a Corporation commence to be wound up not being a voluntary winding up for the purpose only an amalgamation or reconstruction or carry on its business under a receiver for the benefit of the creditors of any of them, the Department shall be at liberty

i) To give such liquidator, receiver, or other person the option of carrying out the contract subject to his providing a guarantee for the due, faithful performance of the contract up to an amount to be determined by the Department.

ii) To terminate the contract forthwith by notice in writing to the contractor or to the liquidator or receiver or to any person in whom the contract may become vested and to act in the manner as per prevalent clauses of P1 contract.

32. MEASUREMENT OF EARTH WORK SHALL BE TAKEN AS FOLLOWS:

Before commencement of work initial levels and to determine the final measurement of the work, final levels of the ground / river bed and bank or structural work etc, as the case may be shall be taken in presence of the contractor at suitable intervals as decided the **Executive Engineer, Muran Dam Division, Khatiguda, Nabarangpur**. The contractor will satisfy himself about the correctness of the initial and final levels entered in the level book issued by the Engineer-in-charge and in token of the acceptance of the said levels the contractor shall have to sign in each page of level book in which the said levels are recorded. Basing on these levels, the gross quantity of work executed by the contractor shall be arrived at. After completion of the work the contractor shall be given a written notice to attend the final measurement. On receipt of the notice, the contractor must have to attend the final measurement failing which the measurement ex-part shall be taken by the Engineer-in-charge which shall be binding on the contractor. In case of the abandonment of work, if it is decided by the Engineer-in charge that final measurements of executed work shall be taken, the same procedure shall

be followed as in case of final measurement on completion of work. It is the responsibility of the contractor to make the site free from all problems to take measurement by the **Executive Engineer** or his authorized officer. If, in the opinion of the Engineer-in-Charge, the site is not free from problem for measurement and the contractor does not take any corrective measures to get rid of same, the Engineer-in-Charge shall make the site free from problem to take the measurement at the cost of the contractor and to determine cost involved thereof, certificate by the Engineer-in-Charge for the purpose, shall be conclusive and binding.

32.1. The Engineer-in-charge shall decide the contractual matters in accordance with codes, rules and acts in vogue which shall be binding on both parties.

33. REMOVAL OF CONTRACTOR'S MEN:

The contractor shall on the written direction of the **Executive Engineer** immediately remove from the works any person employed thereon, who may, in the opinion of the Engineer-in-charge, be incompetent or has misconduct himself. Such person shall not be employed again on the works without the written permission of the Engineer-in-charge.

34. DETAILS CALL NOTICE BEING PART OF CONTRACT:

The detail Tender Call Notice and all the Annexure there to will form the part of the agreement when the work will be awarded to the contractor. All the correspondences made with the contractor and all his correspondences with the department after the tender is received will also be attached with the agreement.

35. FAIR WAGES CLAUSE:

The contractor should abide by the fair wage clause introduced by the Govt. and shall not pay less than the fair wages fixed by the Govt. to the laborer engaged by him in the work.

36. LABOUR LICENSE AND REGISTRATION:

The contractor is to furnish labour license as per the relevant labour Act and rules in force before signing the agreement, failing which execution of agreement will not be entertained.

37. QUALITY CONTROL AND TESTING:

The quality control organization of department will conduct necessary tests to ensure specifications and quality of execution of work as per standard procedures in vogue. Before collecting materials required for execution of respective items of work & laid down in the schedule of quantities the contractor shall ensure that samples of materials proposed to be used are first approved by the Engineer-in-Charge. The samples of the materials proposed to be used should be furnished to the Departmental Quality Control Laboratory at Khatiguda/Berhampur for testing.

38. TESTING OF THE STRUCTURES:

During execution of work, the contractor shall arrange the requisite equipments for testing of the work if found necessary at his own cost. The contractor has to establish field laboratory in the site of work at his own cost.

39. DEFECTS LIABILITY:

The contractor shall be responsible to make good of the defects at his own expense, which may develop or may be noticed before the expiry of one year from the certified date of completion and which is attributable to the contractor. All notices of such defect shall be given to the contractor promptly. In case, the contractor fails to make good of the defects, the Engineer-in-charge employ other persons/ agencies to make good of such defect, and all expenses consequent thereof and incidental thereto, shall be borne by the contractor.

In the event Government takes over portions of works, as they are completed, the liability of the contractor under this clause for those portions shall extend to a period of one year from the actual date on which portions of the works are taken over to the possession of the Department.

40. ENGINEER-IN-CHARGE'S DECISION:

It shall be accepted as an inseparable part of the contract that in matters regarding materials, workmanship, removal of improper work, interpretation of the contract, drawing and contract specification, mode of procedure and carrying out of the work, the decision of the Engineer-in-charge, which shall be given in writing, shall be final and binding on the contractor. The Engineer-in-Charge's final authority applies to technical consideration and does not include decisions regarding sums due to or from the contractor for extension of time.

41. SETTLEMENT OF DISPUTE:

If the contractor considers any work demanded of him to be outside the requirements of the contract or considers any drawing, record or ruling of the Engineer-in-charge, on any matter in connection with or arising out of the contract or carrying out of work to be unacceptable, he shall promptly ask the Engineer-in-charge in writing for written instruction or decision. There upon the Engineer-in-charge shall give his written instructions or decision within a period of thirty days of such request. Upon receipt of the written instruction or decision, the Contractor shall promptly proceed without delay to comply with such instruction or decision. If the Engineer-in-charge fails to give his instructions or decision in writing within a period of thirty days after being requested or if the contractor is dissatisfied

with the instruction or decision of the Engineer-in-charge, the contractor may within thirty days after receiving instructions or decision of the Engineer-in-charge will approach to the higher authority who shall afford an opportunity to the contractor to be heard and to offer evidence in support of his appeal. The Authority shall give his decision within a period of thirty days after the contractor has given the said evidence in support of his appeal, which shall be binding upon the contractor.

42. RESOLUTION OF DISPUTES:

- a) All claims are to be settled by a Civil Court of Competent jurisdiction by way of Civil Suit.
- b) The contractor shall not be entitled to invoke Civil Suit until and unless he has completed the work or until the Govt. has made alternative arrangements for completion of work in question as the case may be.
- c) The pendency of Civil Suit proceedings shall not dis-entitle the Government for completion of the work

43. JURISDICTION OF COURT:

For the purpose of jurisdiction in the event of dispute, if any, contractor should be deemed to have entered into within the State of Odisha and it is agreed that neither party to the contract has the right to bring a suit in regards to the matter covered by the agreement or contract at any place outside the state of Odisha.

43.1. If any further necessary information is required, the Engineer-in-charge will furnish such information on written request, but it must be clearly understood that tender must be received in order and according to instruction / specifications appended herewith.

44. CEMENT:

The Cement manufactured inside the State of Odisha is to be used.

45. STEEL:

Reinforcement bar manufactured by Steel Authority of India Ltd. (SAIL) / RINL is to be used.

46. ROYALTY OF CONSTRUCTION MATERIALS:

Royalty of construction materials at the rate specified by the Government of Odisha will be recovered from the bills of contractor.

47. Labour Cess @ 1% will be recovered from the bills of the Contractor.

48. TECHNICAL SPECIFICATION:

Technical Specification will be adhered to as per the Bill of Quantity details and as per the direction of the Engineer-in-Charge.

49. CERTIFICATE BY THE CONTRACTOR.

The terms and conditions of the Detail Tender Call Notice, P₁ Agreement and its additional / special conditions have been read, explained to me and I / We certify that I / We clearly understand them.

PERMANENT ADDRESS:

Signature of the Contractor

(Full name in Block Letters)

Mobile No:

PRESENT ADDRESS

REFERENCE TO THE I.S. CODES

GENERAL SPECIFICATIONS

The terms the India Standard Specification herein after referred to as BIS as used therein means the relevant Bureau of Indian Standard codes with all amendments published up to the date of Submission of tenders.
A statement of relevant BIS is applicable to this contest is enclosed.

LIST OF INDIAN STANDARDS

(I) CEMENT

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Specification to ordinary and Low heat Portland cement	269-1976
2. Specification for Portland Pozzolana Cement	1489-1976
3. Portland Slag Cement (Third revision)	455-1976
4. Method for physical tests for hydraulic cement (Reaffirmed 1980)	4031-1968
5. Method of Chemical analysis for hydraulic cement (First revision)	4032-1985
6. Rapid hardening Portland cement	8041-1978
7. Hydrophobic Portland cement	8043-1978
8. High Strength ordinary Portland cement	8112-1976

(II) AGGREGATES

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Specification for coarse and fine Aggregates from natural source for concrete	383-1970
2. Specification for sand for masonry mortars	2116-1965
3. Method of Tests for aggregates for concrete (Part I to Part VIV)	2385-1969
4. Standard sand for testing of cement (First revision) with amendment 1 and 2 Reaffirmed 1980	650-1966
5. Methods for sampling of aggregates for concrete	2430 -1969
6. Method of test for determining aggregates impact value of soft coarse aggregates	5640-1970

(III) BUILDING STONES

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Methods of Test for Determination of strength Properties of natural building stone (Part I to Part IV) Part I Compressive Strength Part II Transverse Strength Part III Tensile Strength Part IV Shear strength	1221-1974
2. Method of Measurement of Buildings and Civil Engineering works method. (Part IV Stone masonry)	1200-1976

(I V) STEEL

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Code of practice for bending and fixing of bars	2502-1963
2. Specification for cold worked steel deformed bars for concrete reinforcement	1786-1979
3. Code of practice for welding of MS Bars used for reinforced concrete construction	2751-1966
4. Code for practice for use of Metal are welding for general construction of mild steel	818-1989
5. Deformed bars for concrete reinforcement hot rolled mild steel and medium tensile steel (Revise)	1139-1966
6. Recommendations for detailing of reinforcement in reinforced concreted works	5525-1969
7. Specification for Mild Steel and medium tensile steel Bars for Concrete reinforcement. (Part I)	432-1966
8. Code for practice for safety and health requirement in Electric and Gas welding and cutting operations	818-1968
9. Code for practice for fire precautions in welding and cutting operation	3016-1965
10. Measurement of building and Civil Engineering works method part VIII steel	

work and iron work (Part VIII)	1200-1974
11. Code of procedure for manual or metal ARC and welding of Mild steel	823-1964
12. Specification for filler rods and wires for gas welding	1278-1972
13. Recommendations for welding cold worked steel bars for R.C.C	9417-1979
14. Hard drawn steel wire fabrics for R.C.C	1566-1982

(V) MASONRY

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Code of practice for construction of stone masonry Part-I, Rubble stone masonry (Part I)	1597-1967
2. Code of practice for construction of stone masonry Part II, Ashlars Masonry (Part II)	1597-1967
3. Specification for fly ash for use as pozzolana and admixture (Part I)	3812-1981
4. Method of Measurement of building and Civil Engineering works Part XII plastering and pointing. (Part-XII)	

(VI) CONCRETE

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Method of Measurement of building and Civil Engineer works Part-II cement concrete works. (Part-II)	1200-1968
2. Code of practice for plain and reinforced concrete	456-1978
3. Specification for pre cast concrete coping blocks.	5751-1969
4. Methods of tests for strength of concrete 516-1959	
5. Code of practice for laying in situ cement concrete lining on canals 3873-1978	
6. Specification for Admixtures for concrete 9103-1979	
7. Method of Test for Autoclaved cellular concrete products (Part-I to IX)	6441-1972-73
8. Method of Sampling and Analysis of concrete	1199-1959
9. Specification of Batch type concrete mixtures	1791-1963
10. General requirements for Concrete Vibrators immersion type	2505-1980
11. Specification for concrete vibrating tables	2514-1963
12. Method of test for permeability of cement mortar & concrete	3085-1965
13. Specification for fly ash for use as pozzolana as admixture for Concrete (Part-II)	3812-1981
14. Specification for Portable swing weigh batch for concrete (single and double bucket type)	2722-1964
15. Code of practice for installation of joints in concrete pavements	6509-1972
16. Code of practice for general construction of plain and reinforced concrete for dams and other massive structures	457-1957
17. General requirement for concrete vibrator screed board type (First revision)	2506-1985
18. Code of practice for concrete structures for shortage of liquid (Part-1 to 4)	3370
19. Code of practice for use of immersion vibrator for consolidating concrete (First revision)	3558-1983

<u>SHORT TITLE</u>	<u>BIS No.</u>
20. Method for testing performance of batch type concrete mixer	4634-1968
21. From vibrators for concrete	4656-1968
22. Concrete batching and mixing plant	4925-1968
23. Ready mixed concrete (First revision)	4926-1976
24. Code of practice for sealing joints in concrete lining on canals	5256-1968
25. Vibrating plate compactor	5889-1970
26. Concrete transit mixer and agitator	5892-1970

27. Concrete pavers	7245-1974
28. Concrete slump test apparatus	7320-1974
29. Method of making curing and determining compressive strength of accelerated cured concrete test specimen	9013-1978

(VII) EARTH WORK

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Method of Measurement of building and Civil Engineering works Part I, Earthwork. (Part-I)	1200-1969
2. Safety code for piling and other deep foundations	5121-1969
3. Code of practice for Design installation, observation and Maintenance of uplift pressure pipes for Hydraulic structures on permeable foundation	6532-1972
<u>SHORT TITLE</u>	<u>BIS No.</u>
4. Safety code for excavation works	3764-1966
5. Code of practice for protection of slope for Reservoir embankment	8237-1985
6. Code of practice for earth work on canals	4701-1982
7. Guidelines for lining of canals in expansive soils	9451-1985
8. Method of test for soils Part-II Determination of water concrete (Part-II)	2720-1973
9. Method of test for soils Determination of water content dry density relation using light compaction. (Part-VII)	2720-1974
10. Method of test for soils determination of dry density of soils in place by the sand replacement method (Part-XXVIII)	2720-1974
11. Method of test for soils determination of dry density of soils in place by the core cutter method (Part-XXIX)	2720-1975
12. Classification and identification of soils for general	1498-1970
13. Safety code for blasting and related drilling operation with Amendment No. I (Reaffirmed 1978)	4081-1967
14. Portable Pneumatic drilling machine (First revision)	5441-1986
15. General requirement for black hold drilling rigs	7209-1974
16. Safety code for working with construction machinery	7293-1974
17. Code of practice for stability analysis of earth dams	7894-1975
18. Guidelines for design of under seepage control measures for earth and rock fill dams	8414-1977
19. Filtration media sand and gravel (Part-I)	8419-1977
20. Guidelines for design of large earth and rock fill dams	8826-1978
21. Under drainage arrangements of lines canals.	4558-1983
22. Precast cement concrete stables for canal lining	3868-1966
23. Methods of tests of soils (Part-1 to X)	2720
24. Ammonium nitrate for explosive	4668-1967
25. Method of test for commercial blasting explosives and accessories (Part-1 to V)	6609
26. Detonators	7632-1975
27. Method of load test on soils (Second revision)	1888-1982
28. Method for standard penetration test for soil (first revision)	2131-1981
29. Glossing of terms and symbolic relating to soil engineering	2809-1972
30. Method of sampling and preparation of stabilized soils for testing (Part-I)	4332-1967
31. Test in over burden (Part-1)	5529-1969

(VIII) OTHER SUBJECTS

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Safety code for scaffolds and ladder's part I scaffolds	3696-1966
2. Safety code for scaffolds and ladders Part 2 ladders (Part-II)	3696-1966
3. Recommendations on stacking and storage of construction materials at site.	4082-1977
4. Plywood for general purposes (Second revision amendment 1 to 3)	303-1975
5. Test Sieves	460-1985

6. Code practice for under drainage of lined canals (1st revision)	4558-1983
7. Code of for practice for in situ permeability test (Part-1 & 2)	5529
8. Structural steel (Standard quality) (with amendment No.1 to 3)	226-1975
9. Hard drawn steel wires (Third revision) (Part-II)	432-1982
10. Concrete pipes (with and without reinforcement) (2nd revision)	458-1971
11. Code of practice for laying of concrete pipes	783-1959
12. Specification for mild steel tubes, tubular and other wrought steel fittings Part-I mild steel tubes (fourth revision) (With Amendments No. 1 to 5)	
13. Hard drawn steel wire fabric for concrete reinforcement (Second revision)	1566-1982
14. Asbestos cement pressure pipe (Second revision)	1592-1980
15. Proformed filler for expansion test in concrete payment and structures (non extruding and resilient type)	1838-1961
16. Cast iron detachable joints for use with asbestos cement pressure pipes.	8794-1978
17. Structural steel (Fusion welding quality) (Second revision)	2062-1980
18. Code of practice for laying of cast iron pipe (With amendment No. I)	3114-1965
19. Methods of testing for concrete pipes.	3597-1966
20. Rubber sealing rings for gas mains water mains and sewers	5382-1969
21. Centrifugally cast (spun) iron low pressure pipes for water gas and sewage (First revision)	6163-1978
22. Code of practice for laying of asbestos cement pressure pipes	6530-1972
23. Cast iron detachable joints for use with asbestos cement pressure pipes	8794-1978
24. Other Publications: Specification for Road and Ministry of shipping and transport bridge works No.	7900

(IX) STONE PITCHING AND LAUNCHING APPRON

<u>SHORT TITLE</u>	<u>BIS No.</u>
1. Methods of test for determination of strength properties of natural building stone. (Part-1 to 4)	
2. Method of test determination of true specific gravity of natural building stone (First revision)	1122-1974
3. Method of identification of natural building stone (1st Revision)	1123-1975
4. Method of test for determination of water absorption apparent specific gravity and porosity of natural building stone (1st revision)	1124-1974

<u>SHORT TITLE</u>	<u>BIS No.</u>
5. Method of test for determination of weathering of natural building stones (First revision)	1125-1974
6. Method of test for determination of durability of natural building stone (First revision)	1126-1974
7. Recommendations for dimensions and workmanship of natural building stones for masonry work (First revision)	1127-1970
8. Recommendation of dressing of natural building stone (1st. revision)	1129-1972
9. Sand for plaster (First revision)	1542-1977
10. Code of practice for construction of stone masonry	1597-1967
11. Rubble stone masonry (Part I to II)	1597-1967
12. Method for determination of resistance to wear by abrasion of natural building stones (First revision)	1706-1972
13. Sand for masonry mortars (First revision)	2116-1980
14. Code of practice for preparation and use of masonry mortars (First revision)	2250-1981
15. Stone facing (Part-I)	4101-1967

16. Method of test for determination of water transmission rate by capillary action through natural building stones	4121-1967
17. Method of test for surface softening of natural building stones by exposure to acidic atmospheres	4120-1967
18. Methods of test for determination of permeability of natural building stones (First revision)	4348-1973
19. Method of test for toughness of natural building stones	5218-1969
20. Gujarat State, Section 2, Engineering properties of building stones (Part1/Sec.2)	7779-1975
21. Recommendation practice for quarrying stones for construction purpose	8881-1977

(X) ROAD WORK

SHORT TITLE	BIS No.
1. Paving bitumen (revised) (with Amendment No.1)	73-1961
2. Cut back bitumen (Revised)	217-1982
3. Glossary of terms relating to bitumen and tar(2nd revision)	454-1961
4. Digboi type cut back bitumen (revised)	454-1961
5. Distributors for hot tar and bitumen (first revision)	2093-1974
6. Heaters for tar and bitumen (first revision)	2094-1974
7. Hot asphalt mixing plants (with amendment No.1)	3066-1965
8. Bitumen emulsion for roads (anionic type)	3117-1965
9. Asphalt pavers finisher (first revision) (with amendment No.1)	3251-1965
10. Bitumen drums	3575-1977
11. Recommendations on stacking and storage of construction materials at site (first revision)	4082-1977

SHORT TITLE	BIS No.
12. Bitumen mastic for bridge decking and roads	5317-1969
13. Method of test for determining aggregates impact value of soft coarse aggregates	5640-1970
14. Safety code for construction involving use of hot bituminous materials.	5916-1970
15. Method of test for determination of stripping value of road aggregates.	6241-1971
16. Coarse aggregates for water bound macadam (first revision)	6579-1981
17. Adhesive, bitumen emulsion	7393-1974
18. Code of practice for road gullies	774-1975
19. Bitumen emulsion for roads (Cationic type)	8887-1976
20. Methods for testing tar and bituminous materials	9381-1976
21. Method for testing tar and bituminous materials Determination of effect of heat and air by thin film over test.	9382-1979

In addition to the relevant BIS codes, the specifications prescribed and guidelines issued by Central water Commission Standard Specifications shall also be followed where BIS specifications are not available.

**GOVERNMENT OF ODISHA
WORKS DEPARTMENT**

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OFFICE MEMORANDUM

File: No. 07556900012016- 17254 /W dt. 5.12.2017

Sub: Electronic Receipt, Accounting and Reporting of Cost of Tender Paper and Earnest Money Deposit on submission of bids.

1. The State Government have been working on formulation of rules and procedures for electronic receipt, accounting and reporting of the receipt of Cost of Tender Paper and Earnest Money Deposit on submission of bids through the e- procurement portal of Government of Odisha i.e.” <https://tenderodisha.gov.in>” for some time past.
2. Electronic receipt of cost of tender paper has been successfully tested through S.B.I payment gateway. Now it has been decided to introduce electronic receipt of **Cost of Tender Paper and Earnest Money Deposit on submission of bids** through payment gateway of designated banks such as SBI/ICICI Bank/ HDFC Bank for all Government Departments, State PSUs, Statutory Corporations, Autonomous Bodies and Local Bodies etc. in phases (ANNEXURE-1). The process outlines as well as accounting and reporting structure are indicated below.
 - a) It will be carried out through a single banking transaction by the bidder for multiple payments like **Cost of Tender Paper and Earnest Money Deposit on submission of bids**.
 - b) Various payment modes like Internet banking/ NEFT/RTGS of Designated Banks and their Aggregator Banks as well can be accessed by the intending bidders.
 - c) Reporting and accounting of the e-receipts will be made from a single source.
 - d) Credit of receipts into the Government accounts and to the designated Bank account of the participating entities indicated in Para-2 above would be faster.
3. Only those bidders who successfully remit their **Cost of Tender Paper and Earnest Money Deposit on submission of bids would be eligible to** participate in the tender/bid process. The bidders with pending or failure payment status shall not be able to submit their bid. Tender inviting authority, State Procurement Cell, NIC, the designated Banks shall not be held responsible for such pendency or failure.
4. Banking arrangement:
 - a) Designated Banks (SBI/ICICI Bank/HDFC Bank) payment gateway are being integrated with e-Procurement portal of Government of Odisha (<https://tendersodisha.gov.in>)
 - b) The Designated Banks participating in **Electronic Receipt, Accounting and Reporting of Cost of Tender Paper and Earnest Money Deposit on submission of bids** will nominate a Focal Point Branch called e-FPB, who is authorized to collect and collate all e-Receipts. Each such branch will act as the Receiving branch and Focal Point Branch notwithstanding the fact that the bidder might have debited his account in any of the bank’s branches while making payment.
5. **Procedures of bid submission using electronic payment of tender paper cost and EMD by bidder.**
 - a) The bidders have to log onto the Odisha e-Procurement portal (<https://tendersodisha.gov.in>) using his/her digital signature certificate and then search and then select the required active tender from the “Search Active Tender” option. Now, submit button can be clicked against the selected tender so that it comes to the “My Tenders” section.
 - b) **Uploading of Prequalification/Technical/Financial bid:** The bidders have to upload the required Prequalification/Technical/Financial bid, as mentioned in the bidding document and in line with Works Department office memorandum NO. 7885/W dt.23.07.2013.
 - c) **Electronic payment of tender paper cost and EMD:** Then the bidders have to select and submit the bank name as available in the payment options.
 - i. A bidder shall make electronic payment using his/her internet banking enabled account with designated Banks or their aggregator banks.
 - ii. A bidder having account in other Banks can make payment using NEFT/RTGS facility of designated Banks. Online NEFT/RTGS payment using internet banking of the bank in which the bidder holds his account, by adding the account number as mentioned in the challan as an interbank beneficiary.
 - d) **Bid submission:** Only after receipt of intimation at the e-Procurement portal regarding successful transaction by bidder the system will activate the ‘Freeze Bid Submission’ button to conclude the bid submission process.
 - e) **System generated acknowledgement receipt for successful bid submission:** System will generate an acknowledgement receipt for successful bid submission. The bidder should make a note of ‘Bid ID’ generated in the acknowledgement receipt for tracking their bid status.
6. **Settlement of Cost of Tender Paper:**
 - a) **Cost of Tender Paper:** In respect of Government receipts on account of Cost of Tender Paper, the e-Procurement portal shall generate a MIS for the State Procurement Cell (SPC). The MIS will contain an abstract of the cost of tender paper collected with reference to Bid Identification Number. The State Procurement Cell shall generate Bank-wise challans under the head of Account for Cost of Tender Paper and instruct the designated Banks to remit the money to the proper head of account of State Government. In respect of the cost of tender paper received through the e-Procurement portal the remittance to the Cyber Treasury account will be made to the Head of Account 0075-Misc. General Services-800- Other Receipts-0097-Misc.Receipts-02237-Cost of Tender Paper.
 - b) For the time being, the State Procurement Cell (SPC) will use over the counter payment facility of the Odisha Treasury portal. Thereafter, remittance through EFT and RTGS will be facilitated through the Odisha Treasury portal.
 - c) Similarly, in case of State PSUs, Statutory Corporations, Autonomous Bodies and Local Bodies etc. Cost of Tender Paper, the e-Procurement portal shall generate a MIS for the State Procurement Cell (SPC). The MIS will contain an abstract of the cost of tender paper collected with reference to Bid Identification Number. The cost of tender papers will be credited to the

registered Bank account of the concerned State PSUs, Statutory Corporations, Autonomous Bodies and Local Bodies etc.

- d) Bank will refund (in case the Tender Inviting Authority (TIA) issues such instructions) the tender fee and EMD to the bidder, in case the tender is cancelled before opening of Bid as per direction received from TIA through e-procurement system.
- e) Bank-end Transaction Matrix of Electronic receipt of Cost of tender paper and Earnest Money Deposit on submission of bids is enclosed in the Annexure-1.
7. Settlement of Earnest Money Deposit on submission of bids:
 - a) The Bank will remit the Earnest Money Deposit on submission/cancellation of bids to respective bidders accounts as per direction received from TIA through e-procurement system.
8. **Forfeiture of EMD:**
Forfeiture of Earnest Money Deposit on submission of bid defaulting bidder is occasioned for various reasons.
 - a) In case the Earnest Money Deposit on submission of bid is forfeited, the e-Procurement portal will direct the Bank to transfer the EMD value from the Pooling Account of SPC to the registered account of the tender inviting authority.
 - b) The Tender inviting authorities of the Government Departments will deposit the forfeited **Earnest Money Deposit on submission of bid**, in the State Government Treasury under the appropriate head (8782-Cash Remittances and Adjustments between the officers rendering accounts to the same Accounts Officer-102- P.W Remittances-1683-Remittances-91028-Remittances in to Treasury) after taking the amount as a revenue receipt in their Cash Book under the head 0075- Misc.General Services-00-101-Unclaimed Deposits-0097-Misc. Receipts-02080-Misc.Deposits and submit the detail account to D.A.G Puri as a deposit of the Division.
 - c) By clicking submit button, system will initiate the forfeiture of EMD. System will not allow the evaluator to edit the initiation after clicking the submit button. Forfeiture option can be carried out in phased manner like one bidder at a time.
9. **Role of the Banks.**
 - a) Make necessary provision / customizations at their end to enable the provision for online payments/ refunds as per this document.
 - b) Provide necessary real-time message to bidders regarding successful or unsuccessful transactions during online payment processes and redirect them to e-Procurement website with necessary transaction reference details enabling them to submit their bids.
 - c) The bank shall ensure transfer of funds from the pooling account to the Government Head/current account of PSUs/ULBs within the next bank working day as per the directions generated from e-Procurement portal.
 - d) Bank should provide timely reports and reference details tonic enabling them to carry out their role as stated below.
 - e) Refund of amount to bidders as per the XML file provided by e-Procurement system on the next bank working day from the date of generation of the XML file and also provide a confirmation to NIC on the same.
10. **Role of State Procurement Cell:**
 - a) Communicate requirements of Government departments/ State PSUs/Autonomous Bodies/ULBs online payment requirements to National Information Centre/ the authorised Banks for mapping/customization.
 - b) In every working day, the State Procurement Cell shall generate MIS from the e-Procurement portal to ascertain the tender paper cost received in the e- Tendering process separately bank-wise for the Government Department and the PSUs/ ULBs. The SPC shall generate bank- wise separate online challans from the Odisha Treasury portal and make the remittance through over-the-counter facility or NEFT/ RTGS (as and when this functionality is available in Treasury portal) and issue instruction to the bank for remittance of the receipt to the State Government account.
 - c) The State Procurement Cell shall be responsible for providing challan details and MIS in respect of the remittance towards tender paper cost to the Tender inviting authorities for their record.
 - d) State Procurement Cell shall monitor the progress of e-Tendering by different Government Departments/State PSUs /Autonomous Bodies/ULBs through MIS. State Procurement Cell shall monitor and send monthly progress reports to the Government.
 - e) The e-Procurement System will generate a consolidated refund and settlement XML file as an end of the day activity.
 - f) E-procurement system will provide a web service for Payment Gateway (PG) provide to pull the encrypted refund and settlement details in XML file against a day.
 - g) Similarly, Payment Gateway (PG) provider will provide a web service to pull the refund and settlement status against a day.
 - h) E-procurement system will update the status accordingly for reconciliation report.
11. **Role of National Informatics Centre.**
 - a) Customize-Procurement software and web-pages of Government of Odisha (<https://tebndersodisha.gov.in>) to enable the provision for electronic payment.
 - b) The NIC, Odisha will modify/ rectify the errors in electronic data relating to the Chart of Account.
 - c) NIC will provide an interface to organizations to download the electronic receipt data.
 - d) Enable automatic generation of daily XML files from e-Procurement system and ensure delivery of the same to the authorized for enabling automatic refund/settlement of funds.
 - e) NIC shall enable the e-Procurement portal to generate MIS as required for the State Procurement Cell in order to make remittance of the tender paper cost to the State Government account using the Odisha Treasury Portal.
12. **Role of Cyber Treasury.**
 - a) The cost of the tender paper deposited by the SPC using the Odisha Treasury Portal which will be accounted for by the Cyber Treasury and it shall submit the accounts to A.G (O) as per the established process.
 - b) The Cyber Treasury will provide MIS as required to the SPC for the purpose of accounting and reconciliation of the electronic remittances made to the State Government account.
13. **Redressal of Public grievances:**
 - a) The State Procurement Cell, Odisha National Informatics Centre, Odisha and the e-FPB will have an effective procedure for dealing with, public complaint fore-Receipt related matters. In case, any mistake is detected by any of the stakeholders in reporting of receipt of tender paper cost and EMD, either suo-moto or on being brought to its notice, the State Procurement Cell, Odisha, National Centre, Odisha unit, Cyber Treasury and the bank will promptly take steps for

rectification. The e-Focal Point Branch of the participating Banks, National Informatics Centre, Odisha and the State Procurement Cell, Odisha will notify the contact number and address of the Help Desk for resolution of any dispute regarding e-Receipt.

14. Applicability and modification of existing rules/orders:

The modalities prescribed in this Office Memorandum for downloading of tender paper, submission and rejection of bid, acceptance of Bids as well as refund and forfeiture of earnest deposit will be applicable for electronic submission of bids through e-procurement portal. Existing provisions regulating cost of Tender Paper and Earnest Money Deposit in OPWD Code and OGFR would stand modified to the extent prescribed in this Office Memorandum.

15. These arrangements would be made effective after signing of MoU between the designated Banks and the State Procurement Cell, firming up of Banking arrangements and technical integration between designated Bank and e- Procurement Portal.

1. This shall take effect from the date of issue of this Office Memorandum.
2. Accordingly, relevant existing codal / contractual provision exist vide Office Memorandum No. 6785/W dt.09.05.2017 of Works Department stands modified to the above extent.
3. This has been concurred in by the Finance Department vide their UOR No.39/WF-I dt.09.11.2017.

Sd/-

E.I.C-cum-Secretary to Government.

Memo No. 17255 /W dated 5.12.2017

Copy forwarded to P.S to Hon'ble Chief Minister, Odisha for information and necessary action.

Sd/-

F.A-cum-Addl. Secretary to Government

Memo No. 17256 /W dated 5.12.2017

Copy forwarded to OSD to Chief Secretary, Odisha. / Sr. P.S to Development Commissioner-cum- Addl. Chief Secretary, Odisha / Sr. P.S to Addl. Chief Secretary, Finance for information and necessary action.

Sd/-

F.A-cum-Addl. Secretary to Government

Memo No. 17257 /W dated 5.12.2017

Copy forwarded to All Departments / Managing Director, OB & CC Ltd. Bhubaneswar / Managing Director, OCC Ltd. Bhubaneswar for information and necessary action.

Sd/-

F.A-cum-Addl. Secretary to Government

Memo No. 17258 /W dated 5.12.2017

Copy forwarded to EIC (Civil), Odisha |Bhubaneswar / All Chief Engineers, Odisha/ All Executive Engineers/ All Executive Engineers (under Works Department) for information and wide circulation among subordinate offices.

Sd/-

F.A-cum-Addl. Secretary to Government.

Memo No. 17295 /W dated 5.12.2017

Copy forwarded to the Principal Accountant General (A&E), Odisha Bhubaneswar / Principal Accountant General, Odisha, Puri Branch, Puri for information and necessary action.

Sd/-

F.A-cum-Addl. Secretary to Government

Memo No. 17260 /W dated 5.12.2017

Copy forwarded to the Director, Treasuries and Inspection, Odisha, Bhubaneswar for information and necessary action.

Sd/-

F.A-cum-Addl. Secretary to Government

**GOVERNMENT OF ODISHA
WORKS DEPARTMENT**

OFFICE MEMORANDUM

No. 07764600022025 173 /W., Bhubaneswar Dt. 03/01/26

Sub:- Amendment of Codal & Contractual Provisions.

After careful observation, Government has been pleased to abolish the extant provisions of threshold negative bid caps (14.99%) introduced in Appendix-IX, Clause 36 of OPWD Code Volume-II in the procurement of works undertaken by the Govt of Odisha and its agencies to ensure the procurement process results in a viable and successful manner with adoption of following incremental **Additional Performance Security(APS)** system:

1. Additional performance security shall be taken on an incremental basis from the selected bidder for low bid prices in the project works as under:

- I. where the bid price is below 0% but not below 10% of the project cost put to bid, no additional performance guarantee/security percentage is required.
- II. where the bid price is below 10% but not below 20% of the project cost put to bid, the additional performance guarantee/security percentage shall be incremented by 0.1% for every percentage of bid price below 10% of the project cost put to bid starting at 11% with the additional bid performance guarantee being 0.1% and this additional performance guarantee percentage shall be applied on the bid price;
- III. where the bid price is 20% or more below of the project cost put to bid, the additional performance guarantee percentage shall be incremented by 0.2% for every percentage of bid price below 20% of the project cost put to bid in addition to 1% of the bid price and this additional performance guarantee percentage shall be applied on the bid price;
- IV. The additional performance guarantee percentage shall be rounded off to the next lower percentage based on whether the decimal point of the percentage of bid price is below 0.5% or next higher percentage based on whether the decimal point of the percentage of bid price is 0.5% or more.
- V. The additional performance security shall be treated as part of the performance security.

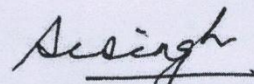
VI. Justification for abnormally low bids shall be scrutinized by the Departmental Technical Committee and recommended to the competent authority of the Administrative Department for the approval of the Additional Performance Security(APS). An abnormally low bid is one in which the Bid price, in combination with other elements of the Bid, appears so low that it raises material concerns as to the capability of the Bidder to perform the contract at the offered price. Procuring Entity may, in such cases, seek written clarifications from the Bidder, including detailed price analyses of its Bid price in relation to scope, schedule, resource mobilization, allocation of risks and responsibilities, and any other requirements of the bid document. If, after evaluating the price analyses, the procuring entity determines that the Bidder has substantially failed to demonstrate its capability to deliver the contract at the offered price, the Procuring Entity may reject the Bid/ Proposal. However, it would not be advisable to fix a normative percentage below the estimated cost, which would automatically be considered as an abnormally low bid.

2. These amendments shall take effect from the date of issue of the O.M.

3. Accordingly, the relevant existing codal/contractual provision stands modified with effect from the date of issue of this O.M.

4. This has been concurred in by the Finance Department vide **File No. FIN-WF1-MISC-0102-2025**

By order of the Governor

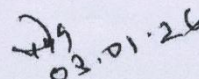


Principal Secretary to Government

Memo No. 174 /W, dated 03/01/26

Copy along with soft copy forwarded to Gazette Cell, Commerce and Transport (Commerce) Department, Bhubaneswar, for information and necessary action.

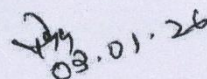
They are requested to publish the Office Memorandum in the extraordinary issue of the Gazette and supply 20 (twenty) copies to this Department.


03.01.26

EIC-cum-Special Secretary to Government

Memo No. 175 /W., Dt. 03/01/26

Copy forwarded to the P.S. to the Hon'ble Chief Minister, Odisha for the kind information of the Hon'ble Chief Minister.


03.01.26

EIC-cum-Special Secretary to Government

Memo No. 176 /W., Dt. 03/01/26

Copy forwarded to the P.S. to the Hon'ble Minister, Law, Works, Excise, Odisha for the kind information of the Hon'ble Minister.

Jh
03.01.26

EIC-cum-Special Secretary to Government

Memo No. 177 /W., Dt. 03/01/26

Copy forwarded to the OSD to the Chief Secretary, Odisha, for the kind information of the Chief Secretary, Odisha.

Jh
03.01.26

EIC-cum-Special Secretary to Government

Memo No. 178 /W., Dt. 03/01/26

Copy forwarded to Sr. P.S. to the DC-cum-ACS, Odisha, for the kind information of the DC-cum-ACS, Odisha.

Jh
03.01.26

EIC-cum-Special Secretary to Government

Memo No. 179 /W., Dt. 03/01/26

Copy forwarded to Principal Accountant General (A&E), Odisha, Bhubaneswar/ Principal Accountant General (E & SR Audit), Odisha, Puri Branch, Puri for kind information and necessary action.

Jh
03.01.26

EIC-cum-Special Secretary to Government

Memo No. 180 /W., Dt. 03/01/26

Copy forwarded to P.S. to the Principal Secretary to Govt., Finance Department/ H & UD Department for the kind information of the Principal Secretary, Finance Department/ H & UD Department respectively.

Jh
03.01.26

EIC-cum-Special Secretary to Government

Memo No. 181 /W., Dt. 03/01/26

Copy forwarded to P.S. to the Commissioner-cum-Secretary to Govt., RD Department/ PR&DW Department for the kind information of the Commissioner-cum-Secretary, RD Department/ PR&DW Department respectively.

Jh
03.01.26

EIC-cum-Special Secretary to Government

Memo No. 182 /W., Dt. 03/01/26

Copy forwarded to the Finance Department/ H & UD Department/ RD Department/ PR&DW Department/DoWR/ all other Departments for information and necessary action.

Jh
03.01.26

EIC-cum-Special Secretary to Government

Memo No. 183 /W., Dt. 03/01/26

Copy forwarded to the FA-cum-Special Secretary to Government, Works Department for kind information and necessary action.

03.01.26

EIC-cum-Special Secretary to Government

Memo No. 184 /W., Dt. 03/01/26

Copy forwarded to all Collectors & DMs for information and necessary action.

03.01.26

EIC-cum-Special Secretary to Government

Memo No. 185 /W., Dt. 03/01/26

Copy forwarded to EIC(Civil-cum-Roads), Odisha /EIC, Water Resources, Odisha/ EIC, Rural Works, Odisha/ EIC (PH), H&UD Department/ EIC (RWSS) PR&DW Department/ EIC, DPQ, Odisha/ EIC, NHs, Odisha/ EIC-cum-Managing Director, OB & CC Ltd., Bhubaneswar, Odisha/ Chief Engineer, Roads-I & II, Odisha / Chief Engineer, Buildings-I & II, Odisha / Chief Engineer, NHs, Odisha/ Chief Engineer, Bridges, Odisha / Chief Engineer, P&IP, Odisha / Chief Engineer, RD & QP, Odisha /Chief Engineer, RW- I & II, Odisha / Chief Engineer, PH (Urban), Odisha / Chief Engineer, Electricity, Odisha / Managing Director, OCC Ltd., Bhubaneswar/ all State PSUs for kind information and necessary action.

03.01.26

EIC-cum-Special Secretary to Government

Memo No. 186 /W., Dt. 03/01/26

Copy forwarded to all CCEs/ SEs/ EEs of the Works Department for kind information and necessary action.

03.01.26

EIC-cum-Special Secretary to Government

Memo No. 187 /W., Dt. 03/01/26

Copy forwarded to Roads Section/ A/C-I Section /A/C-II Section/ Plan Section / Building Section / Budget Section / N.H. Section / FC & AA Section, Works Department for information and necessary action

03.01.26

EIC-cum-Special Secretary to Government

GOVERNMENT OF ODISHA

WORKS DEPARTMENT

OFFICE MEMORANDUM

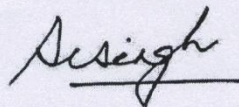
No. 07764600022025 632 /W., Bhubaneswar Dt. 9.1.26

Sub- Clarification on Works Department Office Memorandum No.173 dt 03.01.2026 regarding Amendment of Codal and Contractual Provisions.

The following clarifications are issued on Works Department Office Memorandum No. 173 dated . 03.01.2026

1. The phrase " *to abolish the extant provisions of threshold negative bid caps (14.99%) introduced*" in the first para of the Works Department OM No. 173 dated. 03.01.2026 may be read as " *to abolish the extant provisions of threshold negative bid caps of 15 % introduced vide Works Department OM No. 12366/W dt. 08.11.2013 and amended vide Works Department OM No. 1437 dt, 31.01.2023*"
2. If more than one bid is quoted (decimal up to two numbers will be taken for all practical purposes), either at the estimated cost put to tender or less than the estimated cost put to tender, the tender accepting Authority will finalize the tender through a transparent lottery system, where all the concerned bidders/their authorized representatives, the concerned SE/EE of the concerned Division and Divisional Accounts Officer (DAO) will remain present.
3. If the rate quoted by the SC and ST Category Contractors comes to the rate quoted by the L1 bidder(decimal up to two numbers will be taken for all practical purposes) after availing 10% price preference as per Para 2 of Works Department Resolution No. 27748 dated. 11.10.1977, the tender shall be finalized by the tender accepting authority through a transparent lottery system along with other categories of contractors.
4. As regards the bidding process in which the tender has been floated before the issue of Works Department Office Memorandum No.173 dt 03.01.2026, the bid shall be finalized as per the earlier provisions in Appendix-IX, Clause 36 of OPWD Code Volume-II.
5. This has been concurred in by the Finance Department in File No **FIN-WF1-MISC-0102-2025**

By order of the Governor



Principal Secretary to Government

Memo No. 633 /W, dated 9.1.26

Copy along with soft copy forwarded to Gazette Cell, Commerce and Transport (Commerce) Department, Bhubaneswar, for information and necessary action.

They are requested to publish the Office Memorandum in the extraordinary issue of the Gazette and supply 20 (twenty) copies to this Department.

Jae
09.01.2026

EIC-cum-Special Secretary to Government

Memo No. 634 /W., Dt. 9.1.26

Copy forwarded to the P.S. to the Hon'ble Chief Minister, Odisha for the kind information of the Hon'ble Chief Minister.

Jae
09.01.2026

EIC-cum-Special Secretary to Government

Memo No. 635 /W., Dt. 9.1.26

Copy forwarded to the P.S. to the Hon'ble Minister, Law, Works, Excise, Odisha for the kind information of the Hon'ble Minister.

Jae
09.01.2026

EIC-cum-Special Secretary to Government

Memo No. 636 /W., Dt. 9.1.26

Copy forwarded to the OSD to the Chief Secretary, Odisha, for the kind information of the Chief Secretary, Odisha.

Jae
09.01.2026

EIC-cum-Special Secretary to Government

Memo No. 637 /W., Dt. 9.1.26

Copy forwarded to Sr. P.S. to the DC-cum-ACS, Odisha, for the kind information of the DC-cum-ACS, Odisha.

Jae
09.01.2026

EIC-cum-Special Secretary to Government

Memo No. 638 W., Dt. 9.1.26

Copy forwarded to Principal Accountant General (A&E), Odisha, Bhubaneswar/ Principal Accountant General (E & SR Audit), Odisha, Puri Branch, Puri for kind information and necessary action.

Memo No. 639 W., Dt. 9.1.26

EIC-cum-Special Secretary to Government

Copy forwarded to P.S. to the Principal Secretary to Govt., Finance Department/ H & UD Department/ Works Department for the kind information of the Principal Secretary, Finance Department/ H & UD Department/ Works Department respectively.

EIC-cum-Special Secretary to Government

Memo No. 640 W., Dt. 9.1.26

Copy forwarded to P.S. to the Commissioner-cum-Secretary to Govt., RD Department/ PR&DW Department for the kind information of the Commissioner-cum-Secretary, RD Department/ PR&DW Department respectively.

EIC-cum-Special Secretary to Government

Memo No. 641 W., Dt. 9.1.26

Copy forwarded to the Finance Department/ H & UD Department/ RD Department/ PR&DW Department/ DoWR/ all other Departments for information and necessary action.

EIC-cum-Special Secretary to Government

Memo No. 642 W., Dt. 9.1.26

Copy forwarded to the FA-cum-Special Secretary to Government, Works Department for kind information and necessary action.

EIC-cum-Special Secretary to Government

Memo No. 643 W., Dt. 9.1.26

Copy forwarded to all Collectors & DMs for information and necessary action.

EIC-cum-Special Secretary to Government

Memo No. / 644 W., Dt. 2.1.26

Copy forwarded to EIC(Civil-cum-Roads), Odisha /EIC, Water Resources, Odisha/ EIC, Rural Works, Odisha/ EIC (PH), H&UD Department/ EIC (RWSS) PR&DW Department/ EIC, DPQ, Odisha/ EIC, NHs, Odisha/ EIC-cum-Managing Director, OB & CC Ltd., Bhubaneswar, Odisha/ Chief Engineer, Roads-I & II, Odisha / Chief Engineer, Buildings-I & II, Odisha / Chief Engineer, NHs, Odisha/ Chief Engineer, Bridges, Odisha / Chief Engineer, P&IP, Odisha / Chief Engineer, RD &QP, Odisha /Chief Engineer, RW-I & II, Odisha / Chief Engineer, PH (Urban), Odisha / Chief Engineer, Electricity, Odisha / Managing Director, OCC Ltd., Bhubaneswar/ all State PSUs for kind information and necessary action.

24.01.2026
EIC-cum-Special Secretary to Government

Memo No. / 645 W., Dt. 2.1.26

Copy forwarded to DDG & State Informatics Officer. National Informatics Centre, Odisha State Centre, Bhubaneswar, Email- sio-ori@nic.in for information and necessary action.

24.01.2026
EIC-cum-Special Secretary to Government

Memo No. 646 /W., Dt. 2.1.26

Copy forwarded to the Chief Executive Officer (Administrative), Odisha Computer Application Centre(OCAC), Bhubaneswar, for information and necessary action.

24.01.2026
EIC-cum-Special Secretary to Government

Memo No. 647 /W., Dt. 2.1.26

Copy forwarded to all EICs/CEs/CCEs/ SEs/ EEs of the Works Department for kind information and necessary action.

24.01.2026
EIC-cum-Special Secretary to Government

Memo No. 648 /W., Dt. 2.1.26

Copy forwarded to Roads Section/ A/C-I Section /A/C-II Section/ Plan Section / Building Section / Budget Section / N.H. Section / FC & AA Section, Works Department for information and necessary action

24.01.2026
EIC-cum-Special Secretary to Government



ANNEXURE-1**Back-end Transaction Matrix of Electronic receipt and remittance of Cost of Tender Paper and Earnest Money Deposit on submission of bids.**

	Cost of Tender Paper	Earnest Money Deposit on submission of bids.
Government Departments	I. The Payment towards the cost of Tender Paper, in case of Government Departments, shall be collected in separate pooling accounts opened in Focal Point Branch called e-FPB of respective designated banks (as stated in Para 2) at Bhubaneswar on T+1 day II. With reference to the Notice Inviting Tender/Bid Identification Number, the amount so realized is to be remitted to Government Account under the Head of Account 0075-Misc. General Services-800-Other Receipts -0097-Misc. Receipts-02237-Cost of Tender Paper through Odisha Treasury Portal after opening of the bid.	I. In case of tenders of Government Departments, amount towards Earnest Money Deposit on submission of bids shall be collected in a pooling account opened for this purpose at Focal Point Branch called e-FPB of respective designated banks at Bhubaneswar, and the banks will remit the amount to respective bidder's account within two working days on receipt of instruction from TIA through refund and settlement of e-procurement system. II. In case of forfeiture of Earnest Money Deposit on submission of bids, the e-Procurement portal will direct the Bank to transfer the EMD value from the Pooling Account of SPC to the registered account of the tender inviting authority within two working days of receipt of instruction from TIA.
State PSUs, Statutory Corporations, Autonomous Bodies and Local Bodies.	I. In case of State PSUs, Statutory Corporations, Autonomous Bodies and Local Bodies etc. the amount towards Cost of Tender Paper on submission of bids shall be collected in separate pooling accounts opened in Focal Point Branch called-FPB of respective designated banks at Bhubaneswar on T+1 day. II. The Paper Cost will be transferred to the respective current accounts of concerned State PSUs, Statutory Corporations, Autonomous Bodies and	I. Amount towards EMD on submission of bids shall be collected in a separate pooling account of Focal Point Branch called e-FPB of respective designated banks at Bhubaneswar and the banks will remit the amount to respective bidder's account on receipt of instruction from TIA through refund and settlement of e-procurement system within two working days from receipt of such instruction. II. In case of forfeiture of Earnest Money Deposit on submission of bids, the e-procurement portal will direct the Bank to transfer the EMD value from the Pooling Account of SPC to the registered account of
	Local Bodies etc after opening of bid.	the tender inviting authority within two working days of receipt of instruction from TIA.

ANNEXURE-‘A’**AFFIDAVIT**

1. I/We, Sri/Smt.....aged.....years, Son/Daughter/ Wife of
Sri..... at present residing
At.....P.O.....P.S.....Dist.....State.....
.....& Country..... PIN do here by solemnly affirm as follows:

- I. That, I / We possess a valid license for execution of works contract issued by*.....belongs to.....class & is valid up to**.....I am submitting tender before the ***Executive Engineer, Muran Dam Division, Khatiguda*** for execution of the work "Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda." in response to Bid Identification No. **EEMDD-03(02/03)/2026-27, Dt: - 07.08.2026.**
- II. The undersigned also hereby certify that neither our firm M/s.....have abandoned any work in the State or in India nor any contract awarded to us for such works have been rescinded, during last five years prior to the date of this Bid.
- III. The undersigned hereby authorize(s) the department to seek information from any bank, person, firm or corporation to furnish pertinent information deemed necessary to verify statement or information regarding my (our) competence and general reputation.
- IV. The undersigned hereby undertake to furnish any further qualifying information at the request of the Department/Project implementing agency.
- V. The undersigned undertake that in case of any information furnished by me found to be incorrect, the Government has right to reject the Bid.
- VI. I am swearing this affidavit that all bid documents and accompanying papers those being uploaded and /or submitted by me before the ***Executive Engineer, Muran Dam Division, Khatiguda*** are all authentic and Bonafide documents in the eyes of the law of the land. That the facts stated in the affidavit are true to the best of my knowledge and belief.

(Signed by an authorized Officer of the Firm with Seal)

Title of Officer:

Name of Firm:

Date :

Note:

- The affidavit is to be furnished in court paper incorporating the statement mentioned above duly sworn in, before Magistrate/Notary Public.
- Mention the license issuing authority.
- Mention the date up to which the license is valid.

ANNEXURE-‘B’

Name of the work: "Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."

e-Procurement Notice Bid Identification EEMDD-03(03)/2026-27, Dt: - 07.08.2026

INFORMATION REGARDING LITIGATION/ DEBARRING/ EXPELLING OF BIDDER OR ABANDONMENT OF WORK BY THE BIDDER

1.	a)	Is the bidder currently involved in any litigation relating to works?	:	YES/NO
	b)	If yes, give details:	:	
2.	a)	Has the bidder or any of its constituent partners been debarred / expelled by any agency in India during the last three years?	:	YES/NO
	b)	If yes, give details:	:	
3.	a)	Has the bidder or any of its constituent partners failed to perform on any contract work in India during the last three years?	:	YES/NO
	b)	If yes, give details:	:	

Note: If any information in this schedule is found to be incorrect or concealed, qualification will summarily be rejected.

I/We am/are aware that if the facts stated above subsequently proved to be false my/our contract will be rescinded with forfeiture of I.S.D.& security deposit and I/We shall be liable to make good the loss or damage resulting from such cancellation.

(Signature of bidder)

Date:

Address:

ANNEXURE-‘C’

Name of the work: "Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."

e-Procurement Notice Bid Identification EEMDD-03(03)/2026-27, Dt: - 07.08.2026

UNDERTAKING ON CERTIFICATE OF NO RELATIONSHIP

I/We hereby certify that I/We am/are not related to any officer of Govt. of Odisha of the rank of Asst. Engineer and above and any officer of the Department of Water Resources, Govt. of Odisha of the rank of Asst. Secretary and above. I/We am/are aware that if the facts subsequently proved to be false my/our contract will be rescinded with forfeiture of I.S.D.& security deposit and I/We shall be liable to make good the loss or damage resulting from such cancellation.

(Signature of bidder)

Date:

Address:

ANNEXURE – “D”**CHECKLIST**

		<u>Tick appropriate column</u>			
		Yes		No	
1	Certificate of Registration of Contractor attached.	Yes		No	
2	Electronic Receipt towards EMD & Paper cost / Cost of bid document enclosed.	Yes		No	
3	Copy of PAN Card.	Yes		No	
4	Copy of GSTIN Clearance certificate / (Copy of GST)	Yes		No	
5	Original Affidavit regarding authentication of documents with no adverse certificate (<i>Annexure- ‘A’</i>)	Yes		No	
6	Information regarding current litigation debarring expelling of tendered or abandonment of work by the tenderer. (<i>Annexure- ‘B’</i>)	Yes		No	
7	No Relation Certificate (<i>Annexure- ‘C’</i>)	Yes		No	
8	Copy of Affidavit for not having availed exemption of EMD in works during the current financial year (for Engineering Contractors)	Yes		No	
9	Copy of Labour License Certificate/ Undertaking	Yes		No	
10	Copy of Affidavit in case of SC/ST Contractor with valid caste certificate	Yes		No	
11	Any other document felt necessary furnished.	Yes		No	

DECLARATION BY THE BIDDER

I/We have read and examined the invitation for Bids and the Contract Data, Applicable Specification, Location, Instruction to Bidders and Directions, Conditions of Contract, Clauses of contract, Special Condition, Schedule & other Documents and Rules referred to in the Conditions of contract and all other contents in the Bid documents for the work.

I/We hereby Bid for the execution of the work specified in the invitation for Bid within the time specified in Contract Data as per schedule of quantities and in accordance with the specifications, and

instructions in writing referred to in NIFB and the Conditions of contract and with such materials as provided for, and in all respects, in accordance with such conditions so far as applicable.

We agree to keep the Bid valid for Ninety (90) days from the date of opening of tender and not to make any modifications in its terms and conditions. Electronic receipt of Bid Security (EMD) of _____ is enclosed and in the event of tender being decided in my/our favour, if I/we, fail to commence the work in the time specified, I/we agree that, the Governor of ODISHA or his successors in the office shall without prejudice to any other right or remedy, be at liberty to forfeit the said Bid security absolutely. Otherwise, the said Bid security shall be retained by him towards security deposit to execute all the works referred to in the Bid documents upon the terms and conditions contained or referred to therein and to carry out such deviations as may be ordered, up to maximum percentage mentioned in contract data and those in excess of that limit at the rates to be determined in accordance with the provision contained in conditions of contract.

I/We hereby declared that I/We shall treat the documents and other records connected with the work as secret/confidential documents and shall not communicate information/derived there from to any person other than a person to whom I/We am/are authorized to communicate the same or use the information in any manner prejudicial to the safety of the state.

I/We agree that should I/we fail to commence the work specified in the above declaration, an amount equal to the amount of the Bid Security mentioned in the form of invitation of Bid shall be absolutely forfeited to the Governor of ODISHA and the same may at the option of the competent authority on behalf of the Governor of ODISHA be recovered without prejudice to any other right or remedy available in law.

Dated:

Signature of Witness:

Signature of Contractor

Occupation:

Postal Address:

Address:

FORM-A
STRUCTURE AND ORGANISATION

Name of the Contractor:

Class of Contractor:

Nationality of Tenderer:

Address:

Telegraphic Address:

Telephone No. (Land/ Mob.): Telex.:

Email Id.: Date and location of

Establishment..... the Tenderer of (Please tick whichever is applicable).

- 1] An individual.
- 2] A proprietary firm:
- 3] A limited company or limited corporation:
- 4] A member of a group of companies (if yes, give name, address and present description of other companies).
- 5] A subsidiary of large organization.
(if yes, give names, address of the present origination).
- 6] If the company is subsidiary state what involvement, if any, will the parent company have in the project.
Attach the organization chart showing the structure of the organization including the name of the Directors / position of officer.
- 7] Number of years of experience
 - a. As a Prime Contractor
 - I. In own country.
 - II. Other country (Specify country).
 - b. In a joint venture.
 - I. In own country
 - II. Other country (specify country)
- 8] Name and the Address of any associates the tenderer has in Indian who are knowledgeable in the procedure of customs, immigration takes and other information necessary do work.
- 9] How many years has your organization been in business under your present name?
Add what were your fields where and when you established your organization. When did you add new field (if any)?
- 10] Were you ever required suspending construction for a period of more than six months continuously after you started? If so, give the names of project and reason of failure.
- 11] Have you ever not completed any work awarded to you? If so, give name of Project and Reasons for not completing the work.
- 12] In how many projects were imposed penalties for delay? Please give details.
- 13] In which fields of Civil Engineering construction do you claim specialization and interest?
- 14] Give details of your experience in modern concreting in civil work and quality control.
- 15] Give details of your material testing Laboratory.

Signature of Tenderer

TENDER FOR THE WORK

I / We hereby tender for the execution for the Governor of Odisha of the work specified in the underwritten memorandum at the rates specified therein within a period of 12 (Twelve) Calendar Months from the date of written order to commence and in accordance in all respects with all specification, designs, drawing and other documents referred to in rule I hereof and subject to the annexed conditions of contract and with such materials as are provided for by, and in all other respects in accordance with such conditions so far as applicable.

MEMORANDUM

(a)If several sub- works are included, they should be detailed in a separate list.	A)	Name of Work	"Annual Maintenance to whole garden at Downstream of Muran Dam (Right Flank) for one year under UIDC, Khatiguda."
	B)	Name of the Contractor	
	C)	Estimated Cost	
	D)	Amount put to Tender	
	E)	Percentage Rate Excess over / Less than the Tender Value	
	F)	Agreement Amount	
	G)	Earnest Money	
	H)	Initial Security Deposit @ 2% to be deposited before the Commencement of the work	
	I)	Additional Performance Security	
(b)This deposit will be 5% of the estimated cost of the work	J)	Besides Earnest Money Deposits & Initial Security Deposits Percentage to be deducted from Bill - @ 3% (Three Percent) towards Security Deposit (According to works Deptt. No.15446 Dt. 23.8.2005). Besides Earnest Money Deposit and Initial Security Deposit Contractors of super, Special, A&B Classes will be required to furnish security deposit by way of deduction from their bills @ 5% of the Gross amount of each bill whereas in case of 'C' & 'D' Class Contractors, such deduction will be made @ 3% of the Gross amount of Each bill. Thus, total security deposit will be 7% for super, special, A' & 'B' Class & 5% for 'C' & 'D' Class Contractors.	
This percentage deduction from bills will be credited to the contractor's security Deposit.	K)	The Goods and Service Tax (GST) has been come into force with effect from 01.07.2017. The Tender has been invited on work value excluding CGST & SGST. GST as applicable shall be paid extra over the gross amount of contractor's bill amount vide Section -15 & Section- 142(I) of Odisha GST Act 2017	
	L)	All taxes such as income tax, labour cess, royalty, TDS/ TCS of GST will be the deducted from each bill as per prevailing norms & conditions and as amended from time to time by the Government of Odisha.	
	M)	Time required for the work from date of written order to Commence	
	N)	Date of written order to commence	
	O)	Stipulated date of completion	

	P)	Total number of Items tendered for		
	Q)	Royalty of stone /Earth/ sand/ Moorum will be deducted from bills as per prevailing rules		
	R)	Building & other construction workers welfare cess @ 1 % of the gross amount of the bill will be deducted from the bill towards labour cess as per amendment rule of Govt. of Odisha.		

Should this tender be accepted I/We hereby agree to abide by and fulfill all the terms and provisions of the said conditions of contract annexed here to so far as applicable, or in default thereof to forfeit and pay to the Government of Odisha or his successors in office the sums of money mentioned in the said conditions

Dated the day of.....

Signature of
contractor
before
submission of
tender

Witness –

Address –

Occupation –

The above tender is hereby accepted by me on behalf of the Government of Odisha.

Dated the day of.....

***Executive Engineer
Muran Dam Division,
Khatiguda***

Signature of
the officer by
whom
accepted.

SECTION – 5

DRAWINGS

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