

**GUJARAT MINERAL DEVELOPMENT CORPORATION LTD.**

(Khanij Bhavan, 132 feet Ring Road, Near University Ground, Vastrapur, Ahmedabad – 380 052)

PHONE: 2791 35 01 / 2791 32 00 FAX: (079) – 2791 14 54 2791 18 22

Tender No	GMDC/PD/ATPS/Fast bus/08/17-18
Subject:	E-tender is invited for Turnkey job for removal of existing non working FBT system, and Design, Supply, Erection, Commissioning and Testing of new Fast Bus Transfer system at ATPS

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(Khanij Bhavan, 132 feet Ring Road, Near University Ground, Vastrapur, Ahmedabad – 380 052)

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FUELING THE GROWTH

ISO 9001: 2008

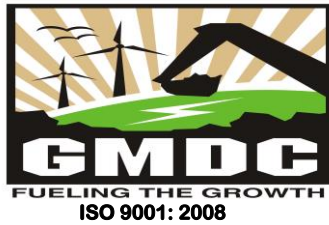
**E-TENDER NOTICE**

Sr. No.	Description	Details	
1	Scope of the work	E-tender is invited for Turnkey job for removal of existing non working FBT system, and Design, Supply, Erection, Commissioning and Testing of new Fast Bus Transfer system at ATPS	
2	Location	Akrimota Thermal Power Station, Vill -Nani Chher, Tal-Lakhpat, Dist-Kutch	
3	Tender Fee (The tender fee is non-refundable.)	Rs.5000/- (Rupees.Five thousand & five hundred only) Tender fee must be paid either in Cash or DD/ Pay Order at GMDC Ahmedabad Office.	
4	Earnest Money	Rs.50, 000/- (Rs.fifty thousand Only) in the form of Demand Draft of any Nationalized Bank or AXIS, IDBI, HDFC, and ICIC Bank in favor of GMDC Limited payable at Ahmedabad only.	
5	Security Deposit	5% of the contract value in form of DD/BG of any nationalized bank or of AXIS, IDBI, HDFC, and ICICI Bank will have to be paid on acceptance of the tender within fifteen (15) days of the issue of order.	
6	Time of Completion of work.	45 Days from the date of Work order	
7	Last date & time for submission of TENDER	August 21, 2017	Before 18: 00 Hrs.
8	Last date for submission of Tender fee, EMD and for other documents in person/ post	August 21, 2017	Before 18: 00 Hrs.
9	Verification of submitted documents (EMD, tender fee etc)	August 22, 2017	Before 12: 00 Hrs.
10	Opening of technical bids at GMDC HO, Ahmadabad.	August 22, 2017	Before 12: 00 Hrs.
11	Refund of Security Deposit	After 01 month of successful completion of work.	

The Corporation reserves the right to reject any or all the Bids without assigning any reasons thereof.

**GENERAL MANAGER (POWER)**

Gujarat Mineral Development Corporation Ltd.(A Govt. of Gujarat Enterprise)  
 "Kanij Bhavan", 132 Ft. Ring road, Nr. Manav Mandir, University Ground, Vastrapur,  
 Ahmedabad-380 052 Ph: 079 27913200/3502/1662/1665 Fax no: 079 27911822/2791 1520  
 E-mail: [power@gmdcltd.com](mailto:power@gmdcltd.com), Visit our web site: [www.gmdcltd.com](http://www.gmdcltd.com) and  
<https://gmdc.nprocure.com>



### **SUBMISSION OF TENDER:**

Tenderer shall submit their offer in electronic format on <https://gmdc.nprocure.com> after Digitally Signing the same. Supporting documents for **Technical bid along with Tender fee & EMD can be accepted in physical form, however technical bid as well as price bid is to be submitted in electronic form only. As per E-tendering process.** Offer of price bid in physical form will not be accepted and any such offer if received by GMDC will be out rightly rejected.

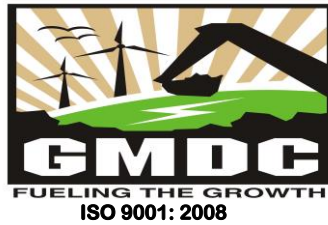
Interested bidders can view these tender documents online but bidders who are interested in bidding in this, bidders can download tender documents from <https://gmdc.nprocure.com>. Tender Documents are only available in Electronic Form. The bidder should submit all the forms electronically only. Bidders who wish to participate in this tender will have to register on <https://gmdc.nprocure.com>. Further bidders who wish to participate in online tenders will have to procure Digital Certificate as per information technology Act 2000 using which they can sign their electronic bids. Bidder can procure the same from (n) code solutions—a division of GNFC Ltd, who are licensed Certifying Authority by Govt. of India and they will assist them in procuring the same at below mentioned address. Bidders who already have a valid Digital Certificate need not procure a new Digital Certificate.

In case, bidder needs any clarification or if training required for participating in on line tender, they can contact following office:

**(n) Code Solutions-A Division of GNFC Ltd,**

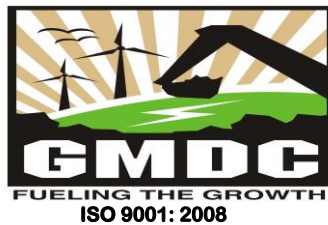
(n)procure cell 301, 3rdfloor, GNFC Info tower, Sarkhej – Gandhinager Highway,  
Bodakdev, Ahmedabad – 380054.

Toll Free: 1-800-233-1-1-Ext: 501,512,516,517, E mail :-nprocure@gnfc.net



**INSTRUCTIONS TO THE TENDERER**  
**(To be read & studied before quoting the Tender)**

1. All bid documents shall be signed by the authorized person/representative of the bidders.
2. Any changes, notifications, amendments etc related to these tender documents will be issued only on <https://gmdc.nprocure.com> and such shall prevail.
3. The bidder shall bear all costs associated with the preparation and the submission of the bid. Whether or not, the bid is accepted or even if GMDC withdraws the bid invitation, the bidder shall not be entitled to claim any costs, charges, etc in connection with the bid.
4. It is the bidder's obligation to conform to the scope of the work and work to the best of the efforts to complete the work as per the expected schedule provided by them.
5. GMDC reserves the right to reject any or all of the bids or accept any of the bids in part or full
6. The bid shall be evaluated only for the bidders who meet the eligibility criteria.
7. If required the bidders may visit at office along with the tender copy, to study the project before submitting the offer.
8. No escalation in price / rate will be allowed on any ground, extension in time limit may be granted with an explicit understanding that no price escalation will be paid.
9. Tenders will be opened in Two Bid system, i.e. Technical or Prequalification Bid and Price Bid. First the Technical or Prequalification Bid will be opened on-line on the date of opening of the tender. The Corporation will scrutinize the same and the Price Bids will be opened only of those bidders, who qualify themselves in Technical/ Prequalification Bid.
10. The bidders are required to submit the DD of EMD as per tender notice. It should be noted that if the demand draft of EMD is not submitted, the tender will not be considered for scrutiny and will be summarily rejected.
11. The Bidders will have to submit 'NO DEMAND CERTIFICATE' along with the final bill of the work, as per the Proforma given in this document.
12. Successful bidders will have to enter in to the agreement with the Corporation on an appropriate stamp paper of Rs. 100/- (to be provided by the contractor) after accepting the Letter of Intent and having agreed to and accepted the terms and conditions of the tender.
13. No page from the tender documents shall be defaced or detached. Also no correction in the tender documents shall be made by the bidder. Any comments which the bidders desires to make, shall not be placed on the tender documents, but shall take the form of a separate statement, as brief as possible, and giving reference to pages and clauses of the tender documents.
14. Tender documents consist of:
  - 1) General Terms and Condition.
  - 2) Special Terms & Condition, Instructions to Bidders.
  - 3) Price Bid.
  - 4) Technical Bid.

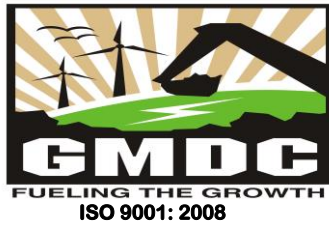


- |                  |  |
|------------------|--|
| 5) Annexure—A—   | Bid Qualifying criteria.                       |
| 6) Annexure—B –  | Scope of Work.                                 |
| 7) Annexure—C –  | Technical Specifications and requirements.     |
| 8) Annexure—D –  | Declaration—1.                                 |
| 9) Annexure—E –  | Declaration—2.                                 |
| 10) Annexure—f – | Articles of Agreement.                         |
| 11) Annexure—G – | Indemnity Bond.                                |
| 12) Annexure—H – | Draft Bank Guarantee for Security Deposit.     |
| 13) Annexure—I – | Vendor Registration Form.                      |
| 14) Annexure—J – | Performa for EMD.                              |
| 15) Annexure—K – | Solvency Certificate. –if applicable then only |
| 16) Annexure—L – | Draft Bank Guarantee for Advance payment.      |

**Note: -** These are to be complied by the tenderers, in case their tender is accepted.

Submission of tender will be the conclusive evidence that the tenderer has fully satisfied himself as to the nature and scope of the work to be done, site conditions, and all other factors affecting the performance of the contract and the price and also as to the terms and conditions of the contract.

15. Wherever the tenderer find any discrepancy, omission, ambiguity or conflict in or among the documents forwarded or be in doubt as to their meaning and interpretation; such matter should be called to the attention of the GMDC not later than 7 days period to the date of submission of tender. On receipt of such quarries the GMDC/consulting engineers will issue a clarifying bulletin which will also form a part of the contract. Neither the GMDC nor the Engineer-In-Charge/consulting engineer will be responsible for any oral instructions. The rates should be written both in figures and in words. In case of any difference between rates in figures and words, the rates in words will prevail.
16. Tenderers must disclose the names of their partners, if any, in the particular contract. Any tenderer failing to do so will render himself liable to have his earnest money deposit forfeited and the contract, if entered into, cancelled at any time during its currency.
17. If it is found that two or more persons who are connected with one another either financially or as principal and agent or master and servant have tendered under different names for the same contract without disclosing their connections, then such tenders will be rejected and the earnest money deposit shall be forfeited. Any contract entered into under such conditions is also liable to be canceled.
18. In case the tenderer is a joint stock company, the contract must be affixed with the seal of the company in the presence of witnesses and signed by two Directors or by persons duly authorized to sign the contract for the company under a power of attorney. The tenderer shall produce a certified copy of such power of attorney at the time of making the agreement.
19. The tenderer must fill in all blank spaces in the form of tender and sign in long hand as and where shown and scan the same. Only the principal authorized to make the contract, should



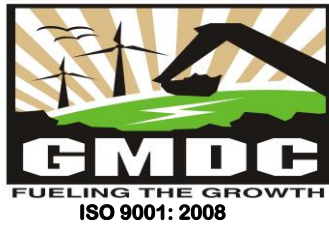
- sign the tender, and execute the contract on behalf of the tenderer.
20. The tenderer must be very careful to deliver a bonafied tender. Such a tender must propose any other condition than those laid down in this Document.
  21. Any tender who proposes alterations to any of the conditions lay down, or which proposes any other conditions of any description whatever is liable to be rejected.
  22. Incomplete tenders are liable to be rejected.
  23. If rates of current taxes, Sales tax/ duties, sales tax, service tax, VAT etc undergo any revision during contractual completion date, the same shall be allowed as statutory variation. However if any variation take place after contractual date of completion, the same shall not be allowed, even if delayed are accepted by bidder.
  24. No statutory variation shall be admitted, if current taxes, Sales tax/ duties, sales tax, service tax, VAT etc become payable because of exceeding the prescribed limit for turnover of the tenderers after the date of offer.
  25. Date of start shall be reckoned within 20 days from date of issue of work order.
  26. Other terms and conditions of the tender shall be read and considered as a part of the tender documents.
  27. The rates/prices quoted by the bidders will be final and any sort of escalation will not be considered.
  28. Clarifications/queries if any by the bidder should convey by Fax/ E-Mail well in advance before 7 days of due date as mentioned in Tender Notice at the following addresses ([power@gmdcltd.com](mailto:power@gmdcltd.com)) in a Cover, super scribing the name of work and due date.

*GENERAL MANAGER (POWER),  
GUJARAT MINERAL DEVELOPMENT CORPORATION LTD.,  
"KHANIJ BHAVAN", 132 FT. RING ROAD,  
UNIVERSITY GROUND, AHMEDABAD -380 052.*

Signature & Stamp of the Tenderer

Name: \_\_\_\_\_

Address: \_\_\_\_\_



## **General Terms and Condition**

### **1.0 GENERAL**

Wherever the term GMDC is used herein it shall mean Gujarat Mineral Development Corporation Ltd. Where the term Tenderer, BIDDER is used, it shall mean the person or organization responding to GMDC's request for quotation herein contained and shall include his legal representatives, successors and assignees.

### **2.0 ACKNOWLEDGEMENT OF NOTICE INVITING TENDER AND CLARIFICATION:**

- In case of any clarification on Tender, the BIDDER shall approach GMDC in writing by fax, email or by letter and GMDC will provide the information required in writing. However, failure to receive any addendum or clarification shall not relieve the BIDDER of any of the obligations stipulated in the Tender. Any amendments made to TENDER shall be intimated to the bidder by E-mail or post/fax.
- The BIDDER will acquaint himself with the conditions / limitations and official regulations under which or conforming to which the services are to be performed and should carefully examine all the information as may be furnished to them in writing from time to time. Failure to comply with above requirement will not relieve the BIDDER of his obligations in the event of his BID being accepted. Unless otherwise specifically stated in the BID, it will be assumed that all terms and conditions of TENDER are accepted by the BIDDER without any reservations.

### **3.0 Submission of BIDS**

- Bidder should submit price bid as well as Technical bid in electronically only. However Technical bid supporting Document can be submitted physically along with Tender Fee and EMD.
- The BIDS should be in English.

### **4 Technical BID**

#### **4.1 *The BIDDER shall submit following details in the Technical Bid:***

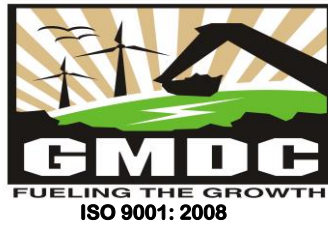
The technical bid should contain the following,

- Scope of work which shall confirm to the details mentioned above under the title "Scope of work"
- List of exclusions/deviations and reasons thereof as per the format provided
- Documents to demonstrate the eligibility of the bidder as per the criteria listed under "Eligibility"
- Time schedule – Bidder shall provide the time schedule detailing out the implementation of each of the activities.
- Any other information required for the evaluation of the bid

#### **4.2 Tender Fees**

As mentioned in Tender Notice Sr. No- 3

**Note:** - *Tender Fee is non refundable.*



#### **4.3 Earnest Money Deposit**

As mentioned in Tender Notice Sr. No- 4

**Note:** - Offer received without EMD will not be considered for evaluation. (Any relaxation on submission of EMD and tender fee for SSI or any other is not allowed in this tender)

#### **5.0 PRICE BID**

Tenderer shall submit their offer in electronic format shown on website as per clause no- Part II offer in physical format will not be accepted and any such offer if received by GMDC will be outrightly rejected / not consider for evaluation.

**5.1** TENDER with Annexure and all attachments will be considered to be read, understood and accepted by the BIDDER unless specifically stated by them otherwise in writing.

#### **6.0 BID OPENING**

**6.1** BIDS will be opened in 3 stages

Stage I—Verification of Tender Fee, EMD and technical documents

Stage II—Technical Bid (Electronically)

Stage III—Price Bid (Electronically only)

**6.2** The technical BIDS (Stage-I) will be opened on date fixed by GMDC.

**6.3** The price BID shall be opened after the corresponding technical BIDS are scrutinized and possible clarifications obtained from all BIDDERS for bringing all of them acceptable technically and at par commercially. Price Bid will be opened only of those bidders who qualify in technical bid.

#### **6.4 Validity of BIDS**

All BIDS should be kept valid for acceptance for **120 days** from the closing date of bid submission. Bid with lower validity will be rejected.

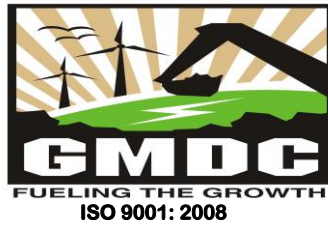
#### **7.0 INFORMATION REQUIRED IN THE BID**

***BIDS should include the following information.***

##### **7.1.1** Technical BID (Part I)

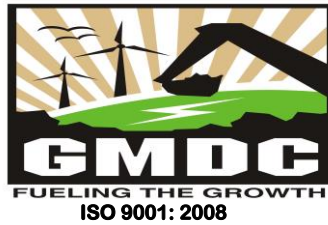
**7.1.1.1** Scope of Work which shall conform to Technical Bid with details.

**7.1.1.2** Certificate that the technical BID is in total conformity with TENDER and if not the list of exclusion/deviations & reasons thereof. All Deviations shall be listed at one place under "Schedule of Deviations" as per format given in Annexure C and shall comprise as under:  
Should the BIDDER consider that compliance with any requirements of the Specification would render the SCHEME unsuitable, he shall submit a proposal or proposals for modifying the requirements and shall include these in the "Schedule of Deviations" from the specification. Deviation mentioned elsewhere/in any other form will not be considered.



**8.0 Following are the essential requirements for the bid, failing of which, the BID shall be rejected:**

1. BIDDER shall submit the time schedule for completion of the project.
2. The work shall be carried out in best workmanship manner as per the technical specifications. Qualified and experienced engineer shall carry out the electrical work under his control.
3. The work shall have to be completed within the time limit, failing which, GMDC will impose penalty as clause.
4. All testing equipments, tools, tackles and workmen required for carrying out the job shall be arranged by the contractor.
5. All safety precautions with necessary action shall be taken by the contractor for his work force working at site and transportation. GMDC in any way shall not be responsible for any compensation arising out of any damage caused to any of contractor during the work and transportation.
6. Any damage done to the property of GMDC by the contractor or his men while carrying out the work shall be made good by the contractor at his own cost.
7. If the contractor abandons the work or does not work as per schedule, GMDC shall get the work completed by any other agency at the risk and cost of the original contractor.
8. The validity of the offer for the work shall be 120 (One hundred twenty) days from the date of opening of Bid.
9. The tender received without Earnest money will be summarily rejected. The Earnest Money Deposit will be refunded to the unsuccessful tenderers after an award has been finalized. The Earnest Money Deposit (E-Tender Guarantee) will be forfeited in the event, the successful tenderer fails to accept the contract and fails to submit the "Security Deposit" to the GMDC as stipulated in this e -Tender documents within ten(10) days after receipt of notice of award of contract.
10. This job being directly related to immediate use after the installation, completion time is essence of the contract. Penalty will be levied for delay in completion of work. The amount of penalty will be as per rule.
11. The conditional offer will liable to be rejected.
12. The successful tenderer shall have to pay the security deposit at the rate of 5% of contract value in favor of "Gujarat Mineral Development Corporation Ltd-Ahmedabad " in form of DD of any Nationalized Bank or ICICI, IDBI, AXIS, HDFC Bank valid for the contract period and enter into an agreement on stamp paper of Rs.100/- as per prevailing norms under labor contract. It shall be incumbent on the Contractor to pay the stamp duty and the legal charges for the preparation of the contract agreement.
13. The rates shall be firm throughout the period of contract inclusive of supply of material, labor, loading, unloading at site and workshop. No price escalation will be given.
14. As per rules, TDS will be deducted from the bills.



**9.0 BID PREPARATION AND SUBMISSION EXPENDITURE**

The BIDDER shall bear all costs associated with the preparation and submission of the BID including any visits to the site. Whether or not the BID is accepted or even if GMDC withdraws the BID invitation, the BIDDER shall not be entitled to claim any cost, charges, expenses etc, in connection with the submission of the BID.

**10.0 SIGNING OF BIDS**

**10.1** The BIDS shall be signed by legally authorized principal officer of the BIDDER.

**10.2** On the BID being accepted by the GMDC, Letter of Intent will be issued by GMDC. to the technical qualified bidder quoting lowest price bid demanding security deposit. After receipt of security deposit, The GMDC will also issue detailed work order indicating detailed terms and condition of the work after receipt of security deposit after which BIDDER has to commence the job..

**11.0 GMDC’S RIGHTS**

GMDC will exercise unrestricted right to reject any or all the BIDS or accept any of the BIDS in full or part.

**12.0 BID EVALUATION**

BID shall be evaluated only for prequalified bidders. The pre-qualification criteria shall be as follows.

- Scope of work which shall conform to the details mentioned above under the title “Scope of work”
- List of exclusions/deviations and reasons thereof as per the format provided
- Documents to demonstrate the eligibility of the bidder as per the criteria listed under “Eligibility”
- Time schedule – Bidder shall provide the time schedule detailing out the implementation of each of the activities.
- Any other information required for the evaluation of the bid

For required discussion, in such case bidder has to visit GMDC at his own cost.

**13.0 TECHNICAL BID EVALUTION CRITERIA**

The evaluation of the technical proposal shall be based upon its responsiveness to the scope of work, eligibility and time schedule.

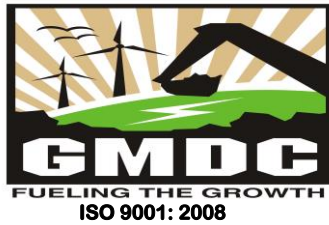
**14.0 The Commercial BID shall be evaluated on the following basis:**

The Bidder whose evaluated cost to GMDC is lowest, will qualify for the award of LOI by GMDC subject to other conditions as evaluated by GMDC on completeness as acceptable to GMDC.

**15.0 GMDC reserves right to split work in to 2 (two) or more parts to speed up the work at L-1 Rates**

**Signature & Stamp of the Tenderer**

**Name & Address:** \_\_\_\_\_



## Special Terms & Condition, Instructions to Bidders

- **Experience of the Bidder**

A comprehensive list of past projects implemented, by the bidder indicating clients, dates, size of projects and any other relevant material should be included in the offer.

- **Time Schedule**

The bidder should complete the work in 45 Days (Date of site clearance is to be considered as a start date of work order). And contract period will be for 45 Days.

- **Payment Terms**

The bidder shall receive the payment under the work order as follows. Within 30 days from the receipt date of receipt of bill after completion of milestones.

The breakup of the payment shall be as follows,

Sr	Activity	Payment structure
1	20% advance payment on submission of bank guarantee of equal amount valid for two months	20 %
2	80% payment will released on satisfactory completion of work and 72 hours trail run.	80%

### RA Bill

- RA bill /final bill will be submitted by contractor at the office of the General Manager Power, Ahmedabad in 3 Copies.

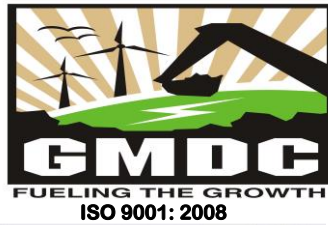
- Variation in taxes, work contract taxes, duties, levies etc after award of job but within Time schedule mentioned in TENDER shall be to the account of GMDC. Any variation in taxes, work contract taxes, duties, levies etc beyond Time schedule shall be to BIDDER's account.

- **Penalty.**

For any delay in completion of WORK solely attributable to BIDDER beyond the agreed time schedule at the time of award of job, penalty shall be levied at the rate of 0.5 % per week with cap of 10% of order value.

- **ASSIGNMENT**

BIDDER shall not assign the WORK or any part thereof or any share or interest therein without the prior written consent of the GMDC. BIDDER shall not sub-contract the whole or any part of WORK without the prior written consent of GMDC. On concurrence of GMDC, BIDDER may sub-contract any part of WORK to any of its affiliates, in which event BIDDER shall remain fully responsible



## **LEGAL JURISDICTION AND ARBITRATION**

- a. The matter relating to any differences arising out of this agreement shall be subject to the exclusive jurisdiction of Ahmedabad only.
- b. All questions, disputes, differences whatsoever which may at any time arise between the parties to this contract in connection with the contract or any matter arising out of or in relation thereto, shall be referred to arbitration as per the provision of Arbitration and Conciliation Act, 1996 and the venue of the arbitration proceedings shall be at Ahmedabad only.

## **FORCE MAJEURE**

- (a) Force majeure is herein defined as any cause which is beyond the control of the contractor or the Corporation as the case may be which they could not foresee or with a reasonable amount of diligence could not have foreseen and which substantially affect the performance of the contract, such as:
  - i. natural phenomena such as flood, draughts Cyclone, earthquake and epidemics, declaration of war
  - ii. Acts of any government, including but not limited to war, declared or undeclared priorities, quantities, embargoes, providing either party shall within fifteen (15) days from the occurrence of such a cause notify the other in writing of such cases.
- (c) For delay arising out of Force Majeure, the contractor will not claim extension in completion date for a period exceeding the period of delay attributable to the causes of force Majeure and neither company nor the Contractor shall be liable to pay extra costs (like increase in rates, remobilization, advance, idle charges for labour and machinery etc.) provided it is mutually established that the Force Majeure conditions did actually exist.
- (b) The contractor will advise, in the event of his having resort to this clause by a registered letter duly certified by the statutory authorities, the beginning and end of the cause of delay, within fifteen days of the occurrence and cessation of such Force Majeure condition. In the event of delay lasting over two months, if arising out of Force Majeure, the contract may be terminated at the discretion of the Corporation.
- (d) If any of the Force Majeure conditions exists in the place of operation of the contractor even at the time of submission of bid he will categorically specify them in his bid and state whether they have been taken into consideration in their quotations



- (e) The contractor or the Corporation shall not be liable for delays in performing his obligations resulting from any force majeure cause as referred to and/ or defined above. The date of completion will, subject to hereinafter provided, be extended by a reasonable time given though such cause may occur after contractor's performance of his obligations has been delayed for other causes.

## **COMPLETION OF WORK**

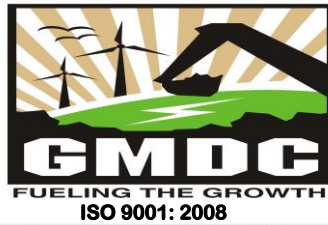
When the Contractor fulfills all its obligations under the contract to the satisfaction of General Manager (P)/Head of the department (**as applicable**) and subject to terms and conditions of the Contractors, it shall be eligible to apply for completion certificate. The General Manager (P)/Head of the department (**as applicable**) shall formally issue completion certificate after verifying from the completion documents and satisfying himself that the work has been completed in accordance with all the provisions of this contract and instructions issued to the contractor by the GMDC and (**concerned authorities**) from time to time. The contractor after obtaining the completion certificate is eligible to present the final bill for the works executed by him/ it under the contract.

Within completion of the work in all respects as defined in the tender document, the contractor shall be required to obtain from the General Manager (P)/Head of the department (**as applicable**) such completion certificates as to the (clearing of the areas on the downhill side of site of all rubbish dirt, rock overburden materials, structures etc..)(**may be modified as per the scope/requirement**)

- i. If the contractor fail to comply with the requirement of this clause on or before the date fixed for the completion of the work the General Manager (P)/Head of the department (**as applicable**) may at the expenses of the contractor carry out such work and the contractor shall forth with pay the amount of all such expenses so incurred and shall have no claim in respect of any such work.

- ii. For purpose of this clause the following documents are required by the GMDC subject to the conditions that General Manager (P)/Head of the department (**as applicable**) for his satisfaction.

- (a) Certificate of the satisfactory completion of the work as per the terms and conditions of the tender/agreement.



- (b) A Certificate to the effect that no outstanding claim / payments are due to the persons employed by the contractor or his sub contractor if permitted by GMDC including the Statutory payments, which have fallen due.
- (c) “No claim/demand” and “No dues” certificates.
- (d) Proof of depositing P.F. and other applicable statutory dues from time to time.

Immediately on completion of the work, the contractor shall submit his final bill indicating the gross and net amount payable. On receipt of this, the GMDC shall verify the same, determining the total value of the work done of the contract and after adjusting all the sums already paid to him/ it and / due to the company on any account and such further sums as the GMDC is already authorized or required to reserve or retain as per the terms of the contract or otherwise make over to the contract as his / its final payment.

#### **CONSTITUTION OF THE COMPANY / FIRM / PROPRIETARY CONCERN (AS APPLICABLE)**

The Contractor shall not change the constitution of the company // firm / proprietary concern (as applicable) during the currency of the contract except same is necessary due to statutory provisions or permitted by GMDC..

**Other clauses** like scope of work, SD, advance payment, payment of RA bills etc. may be incorporated as per the actual requirement with respect to the nature of contract/work. However the special attentions required with respect to SD, the same should be issued by the Nationalised banks and banks approved by Govt. of Gujarat from time to time only (except co-operative banks).

In case of statutory variation in taxes, duties etc.. the following clause may be incorporated:

“Any statutory increase / decrease in duties, taxes, cess etc and / or introduction of any new duties, taxes, cess, other levies etc., after the last date of submission of tender till scheduled date of completion of work shall be to GMDC’s account subject to submission of documentary proof of having remitted / adjusted the same and to the extent directly related to the services rendered by the contractor.

In case of delay beyond scheduled date of completion of work, any statutory increase in duties, cess etc. and / or introduction / levy of any duty, tax, cess after scheduled date of completion of work shall be in the contractor’s account and reduction in such duties, taxes, cess and levy shall be passed on to GMDC’s Accounts and the order value shall be reduced accordingly.”



CONTRACTOR TO ABIDE BY FOLLOWING TAX LAWS:

(a) **General Taxes:** The Contractor shall be responsible for and shall pay out of his own, moneys, all taxes, dues, fees, cesses, octroi and charges payable to Central or State Governments or dues payable on material purchased by him or constructional plant provided by him for the works, and on all materials brought by him on the site and used for the works and shall indemnify the purchaser against any liability on account of any such taxes, dues, fees, cess, octroi and charges.

(b) **Income-Tax:** The Contractor and his employees shall bear and pay all Income-Taxes, corporate and personnel, super tax or any other Indian tax as may be payable by him on the amounts payable to him under the contract. If for any reason whatsoever the purchaser is called upon to pay in respect of the Contractor's or his employees income, any income-tax, supertax, or any tax under Income-tax Act or any tax under any other law in force in India, then the Contractor shall be bound and liable to reimburse and pay to the Purchaser the amount of such tax so paid by the purchaser and the Contractor shall further agree that the Purchaser will also be entitled to recover and reimburse to himself the amount of such tax out of the fees, remuneration or any other sum payable by him to the Contractor under the Contract.

(c) **Taxes in respect of Workmen:**

The Contractor shall provide and maintain workmen's compensation insurance coverage to provide compensation benefits in the event of injury of employees in the course of work under the contract. Liability under the Workmen's Compensation Act:

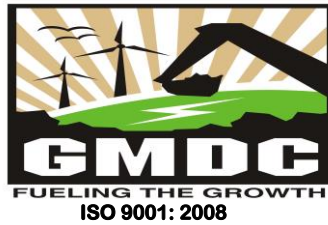
(I) The Contractor shall at all times identify the Purchaser against any claims which may be made under the Workmen's Compensation Act, 1923 or any statutory modification thereof or otherwise for or in respect of any damages or compensation payable in consequence of any accident or injury sustained by any workman or other person whether in the employment of the Contractor or not.

(II) Liability under the employee's State Insurance Act 1948: Where the Contract is in connection with the Purchaser's work office coming under the purview of the Employee's State Insurance Act, 1948, the Contractor shall make necessary deduction from the monthly emoluments of his staff employed on the Contract at the prescribed rate and remit the aggregate amount monthly to the Purchaser together with the Employer's (Contractor's) contribution as required under the Act and together with the standard form duly filled in as required under the Act.

(III) Liability under the Employees Provident Fund Act, 1951: Where the contract is in connection with the purchaser's works office coming under purview of the employees provident Fund Act, 1951, the Contractor shall make necessary deduction from the monthly emoluments of his staff employed on the Contract at the prescribed rate and remit the aggregate amount monthly to the purchaser together with the Employer's (Contractor's) Contribution as required under the Act, and together with the standard forms duly filled in required under the Act.

(D) You will abide by the provision of labour laws, contract labour regulations and Abolition act (contract Act-37 of 1970) pertaining to the employment of the labour and shall get yourself register with regional provident fund commissioner and inform the corporation about the registration number by submitting the copy of the number allotted to you by RPFCL. You have to submit the copy of labour license from the competent authority for the subject work

Signature & Stamp of bidder



### **NON FULFILMENT OF TERMS & CONDITION AND TERMINATION OF THE CONTRACT.**

- a. If the Contractor fails to carry out the work as per terms and conditions of the contract to the satisfaction of the CORPORATION, CORPORATION shall be entitled to forfeit the security deposit paid by the Contractor. This however, shall not absolve the Contractor from his obligation to fulfill the contract. In such event, the CORPORATION shall have a right to complete and / or to get the work completed at the cost & risk of the Contractor and the Contractor shall be responsible to pay such cost incurred by the CORPORATION to complete the work and / or to get the work completed.
- b. Likewise, if the Contractor does not fulfill the terms and conditions of the contract and does not carry out the work up to the entire satisfaction of CORPORATION, CORPORATION has the right to forthwith terminate the contract at its sole discretion, without assigning any reason, Under such events, the CORPORATION shall be entitled to forfeit the security deposit paid by the Contractor and the CORPORATION shall have a right to complete the work and / or to get the work completed at the risk and cost of the Contractor.
- c. For any reasons, if it is required, the CORPORATION reserves rights to cancel terminate. amend and / or alter the contract and / or bifurcate and / or reduce the contract work at any time without giving any notice to the Contractor and without incurring any responsibility. For such cases, Contractor shall have to take away his labour, tools, tackles, machinery, equipment etc. and shall leave the site at once or shall have to carry out the instructions of the CORPORATION.

### **SUB-CONTRACT**

The Contractor shall not assign or sub-contract any portion of this work without the prior written consent of Corporation.



FUELING THE GROWTH  
ISO 9001: 2008

## GUJARAT MINERAL DEVELOPMENT CORPORATION LTD.

(Khanij Bhavan, 132 feet Ring Road, Near University Ground, Vastrapur, Ahmedabad – 380 052)

### PRICE BID

Tender No	GMDC/PD/ATPS/Fast bus/08/17-18
Subject:	E-tender is invited for Turnkey job for removal of existing non working FBT system, and Design, Supply, Erection, Commissioning and Testing of new Fast Bus Transfer system at ATPS

PHONE: 2791 35 01 / 2791 32 00 FAX: (079) – 2791 14 54 2791 18 22

## GUJARAT MINERAL DEVELOPMENT CORPORATION LTD.

(Khanij Bhavan, 132 feet Ring Road, Near University Ground, Vastrapur, Ahmedabad – 380 052)



FUELING THE GROWTH  
ISO 9001: 2008

**Price Bid**

<b>Sr No</b>	<b>Description</b>	<b>Cost</b>
01	Turnkey job for removal of existing non working FBT system, Design, Supply, Erection, Commissioning and Testing of new Fast Bus Transfer system at ATPS	
02	Buyback offer price for existing panels	
03	Service Tax/ GST will pay extra at actual as per prevailing rates in INR	
<b>Total Cost (Supply - Buyback offer)</b>		



### Deviation Sheet

Clause in which deviation is requested	Deviation	Reason for deviation

Signature & Stamp of the Tenderer

Name: \_\_\_\_\_

Address: \_\_\_\_\_



**DECLARATION SHEET**

.....  
Bidder's Name

I... certify that all the above typed-in data and information pertaining to this specification is correct and is true representation of the equipment covered by our formal Proposal dated..... I hereby certify that I am duly authorized representative of the Bidder whose name appears above my signature.

Bidder's Name : .....

Authorised Representative's  
Signature and Stamp : .....

G M D G



## **GUJARAT MINERAL DEVELOPMENT CORPORATION LTD.**

(Khanij Bhavan, 132 feet Ring Road, Near University Ground, Vastrapur, Ahmedabad – 380 052)

### **TECHNICAL BID**

Tender No	GMDC/PD/ATPS/Fast bus/08/17-18
Subject:	E-tender is invited for Turnkey job for removal of existing non working FBT system, and Design, Supply, Erection, Commissioning and Testing of new Fast Bus Transfer system at ATPS

PHONE: 2791 35 01 / 2791 32 00 FAX: (079) – 2791 14 54 2791 18 22

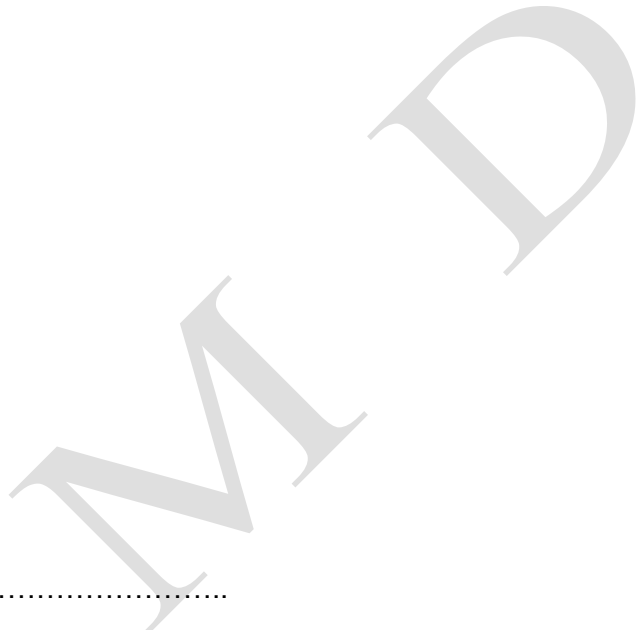
**GUJARAT MINERAL DEVELOPMENT CORPORATION LTD.**

(Khanij Bhavan, 132 feet Ring Road, Near University Ground, Vastrapur, Ahmedabad – 380 052)



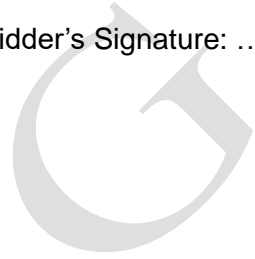
**PROPOSAL PARTICULARS**

- Bidder's Name : :
- Bidder's Complete Address : :
- Bidder's Complete Company Name : :
- Bidder's Proposal Number : :
- Bidder's Proposal Date : :
- Bidder's Proposal Validity Period : :
- Bidder's Phone number : :
- Bidder's E-Mail : :
- EMD Detail : :
- Tender Fee Detail : :



Bidder's Name: .....

Bidder's Signature: .....





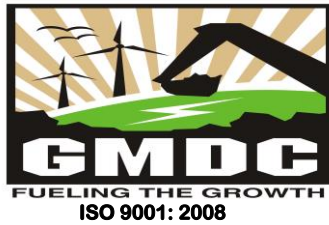
**Technical Deviation Sheet**

Clause in which deviation is requested	Deviation	Reason for deviation

Signature & Stamp of the Tenderer

Name: \_\_\_\_\_

Address: \_\_\_\_\_



**TECHNICAL DECLARATION SHEET**

.....  
Bidder's Name

I... certify that all the above typed-in data and information pertaining to this specification is correct and is true representation of the equipment covered by our formal Proposal dated. .... I hereby certify that I am duly authorized representative of the Bidder whose name appears above my signature.

Bidder's Name : .....

Authorised Representative's  
Signature and Stamp : .....

G M D G



## **Annexure—A**

### **Bid Qualification Criteria**

1. Bidder should be supplier of Fast Bus Transfer System for more than 100MW power plant.
2. Bidder should have executed at least 01 retrofitting work of fast bus transfer system in India.
3. Bidder has to submit performance certificate or copy of work order
4. The bidder should furnish valid Real Time Digital Simulation (RTDS) Test certificate for offered MBBTS, if already carried out by Government approved agencies such as CPRI/ERDA. If not carried out, bidder should be ready to carry out the same at Government approved agencies such as CPRI/ERDA at his own cost.
5. Bidder should give Buyback offer of ATPS existing FBT system.

## Annexure—B

### Scope of Works

**Existing Power supply arrangement at GMDC AKRIMOTA TPS for bus transfer system and other requirements in proposed bus transfer system:**

Unit#1&2 are connected to Unit boards' 1A-1B & 2A-2B at 6.6KV Bus. Unit #1&2 have 2nos Unit Auxiliary Transformers (UAT-1&2). UAT#1 & UAT#2 boards are separated by open tie breakers. The 6.6 KV power supply single line diagram in each unit is as shown:

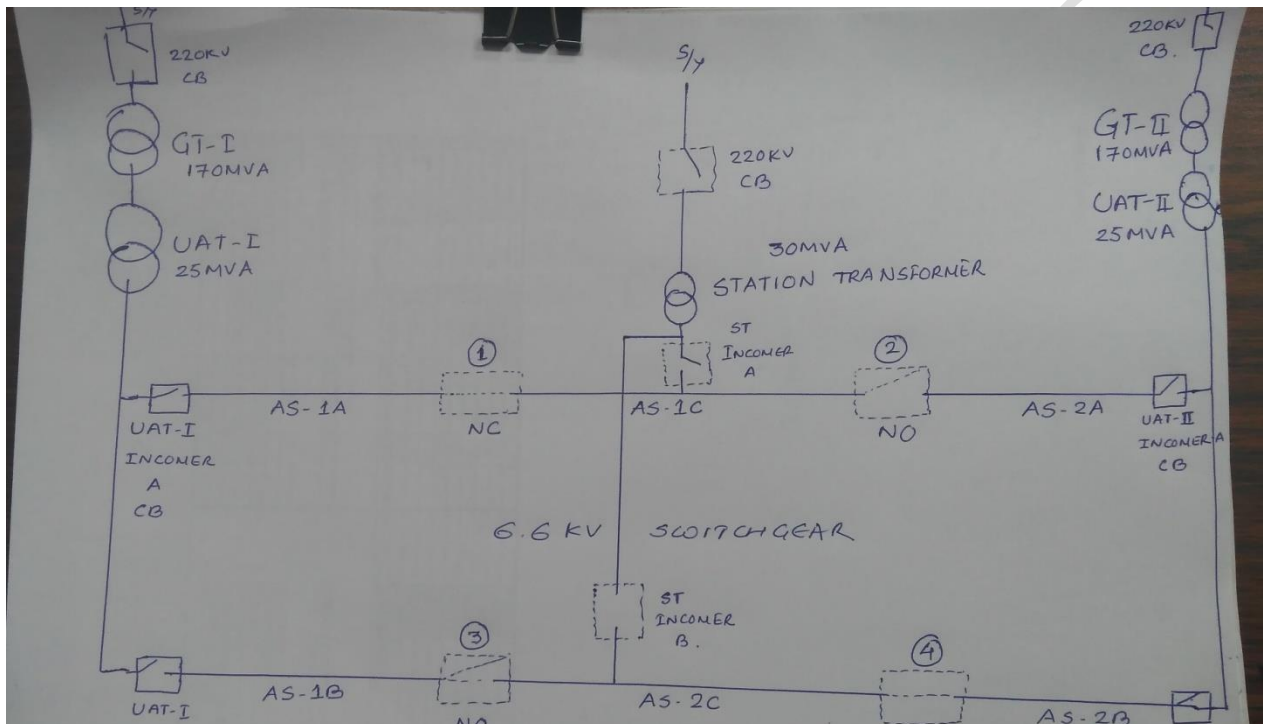


Fig.1

Bus 1A-AB & 2A-2B gets power supply from UT during normal operating conditions. In case of failure of any source i.e. UT/GT fails, and then power supply is transferred to healthy source by closing respective NO tie breakers & tripping the Incomer breakers.

The transfer is achieved as follows:

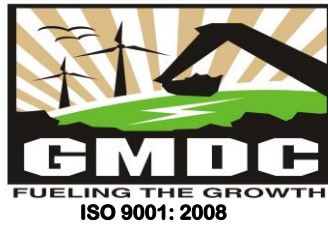
**(i) UAT to UAT & Station Transformer transfer and vice versa**

On Unit tripping, the supply to the Unit Board would be transferred automatically to the alternate unit supply by tripping the faulty Unit Incomer breaker and closing the Alternate Unit Supply Tie Breaker, through various modes.

#### 2.1 Existing Auto transfer scheme at GMDC AKRIMOTA TPS:

Currently M/s Aartech make old Edison Pro scheme is installed at GMDC AKRIMOTA TPS for Unit to Unit Changeover.

#### 2.2 Purpose of MBBTS (Microprocessor Based Bus Transfer System), which is intended to



### **replace existing auto transfersystem:**

UAT-1 is connected with AS-1A board & 1B board. 1C board is connected through NC tie breaker with UAT-1

UAT-2 is connected with AS-2A board & 2B board. 2C board is connected though NC tie breaker with UAT-2

Unit #1&2 has 2 Unit Auxiliary Transformer (UAT) and one Station Transformer (ST) will feed to station auxiliary's boards (1C & 2C) through 6.6 KV Busarrangement. Unit boards & Station boards are separated by tie breakers.

**Note:** At present Station Transformer (ST) isn't connected with 6.6KV bus but after FBT installation we will connect ST with 1C & 2C board and all ties 1,2,3,4 in Fig.1 (2No +2NC) breaker will NO. So when any UAT or ST will trip, power supply should be change over on healthy bus without any interruption through FBT.

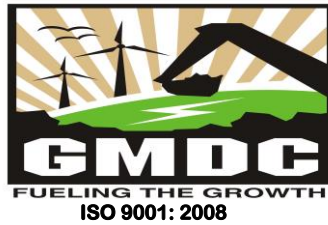
The purpose of required MBBTS system is to replace the existing Auto Transfer System (6.6 KV Bus Transfer) with new generation high speed microprocessor basedbus transfer system having superior features like better man machine interface,having more contact inputs (CI) and fast acting solid state contacts, continuousmonitoring of breaker and system healthiness, event recording with easy analysis,any communication protocol and on line test ability facility etc.

Pl. see below proposed 3 breaker scheme transfer direction which makes userflexible from the point of operation.

### **3. Details scope of work:-**

#### **Scope for MBBTS System, which is intended to replace existing auto transfer System:**

1. Before quote the Tender Bidder should visits the site to get proper information and actual required job identifications.
2. This scope is intended to cover the design, manufacture, assembly, testing at manufacturers work, supply and delivery properly packed for transport F.O.R site of MBBTS Unit to Station with all accessories for efficient and trouble free operation.
3. You shall intimate to GMDC Ltd to witness factory test of equipments on your cost.
4. The scope of work should also include erection, testing at site and commissioning and putting into successful operation of all equipment furnished under this specification with supply, laying and termination of cables required for the MBBTS.
5. All the cables required for the installation and commissioning of the MBBTS will be in the scope of bidder.
6. Removal of existing components/panel installed at site along with removal of connected cables, required for carrying out modifications to suit new supplied equipment's.
7. Necessary changes in existing scheme are to be documented in drawings by the bidder to fulfil the station requirement of bus transfer scheme, the philosophy of which is already mentioned in this document.
8. It is not intent to specify herein all details of work. Nevertheless all the work should be carried out and should be operative in all aspect and should confirm to highest standard of Engineering, Design and workmanship.



9. Any material or accessory which may not have been specifically mentioned but which is necessary or usual for satisfactory operation and maintenance should be furnished without any extra cost.
10. The contractor should apply all brand new material and accessories as specified herein with such modification or alterations as agreed upon in writing after mutual discussion.
11. The Contractor should provide all required test equipment for performing all shop and site tests. All tests equipment should be of reputed make, required accuracy class and should be recently calibrated. The record of calibration of test equipment should be made available to the purchaser on demand.
12. Bidders are requested to study & ensure the proposed MBBTS by checking its feasibility particularly for design of the control philosophy and compatible to envisaged installation at the existing available location.
13. The Bidder should submit along with the Bid schedule showing complete programme, procedure and the order in which the complete work is to be carried out with dates and estimated time for various parts of the work at the factory and at the site (i.e. QAP).
14. ATPS scope will be only to provide the isolation requirements and providing existing wiring connection arrangements so as to facilitate successful bidder to replace the existing system by new offered system and carryout installation, commissioning and testing of MBBTS system at GMDC AKRIMOTA Site in both units. The modified drawings and other operational and maintenance documents are to be prepared and submitted by the bidder to ATPS.
15. Bidder shall submit the schedule of work to complete the work at site within time limit (one week)
16. Bidder shall follow GMDC Ltd all rules & regulation specially Fire & safety.
17. Bidder shall full fill statutory requirements to GMDC Ltd HR department before execute the work.

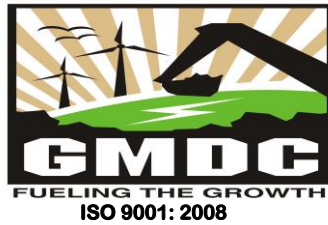
#### **18. Test During Manufacture:**

- 18.1 During the manufacture of panel, Manufacture's standard test and tests specified irrelevant IS should be performed and copies of test results should be furnished.
- 18.2 The bidder should offer MBBTS systems which are already in use for thermal power Generating stations or large conventional power generating stations in India.
- 18.3 The bidder should furnish valid Real Time Simulation Test (RTST) certificate for offered MBBTS, if already carried out by Government approved agencies such as CPRI/ERDA. If not carried out, bidder should be ready to carry out the same at Government approved agencies such as CPRI/ERDA at his own cost.
- 18.4 Purchaser reserves the right to witness any of the tests during manufacture on bidder cost
- 18.5 The vendor should submit Quality Assurance Plan (QAP) covering all the points mentioned above and process control method exercised by him. The actual inspection will be carried out as per the approved plan.

#### **19. Shop Inspection And Test:**

The Bidder should completely assemble, with all its associated equipment including brought out items, mounted, wired and test MBBTS panels as per relevant standard. Routine tests should be carried out on panels as per relevant standard in presence of Owner's representative.

#### **20. Routine Tests:**



The tests should include but not necessarily limited to the following:

- i) Visual check and dimensional check
- ii) Assembly check
- iii) IR value by 1 kV
- iv) HV test by 2 kV for 1 min.
- v) Operation under simulated service condition to ensure accuracy of wiring, correctness of control scheme and proper functioning of the equipment.

## **21. Test witness:**

21.1 All inspections should be performed in presence of purchaser's representative. The bidder will give at least 15 days advance notice of the date when tests should be carried out.

21.2 Certified test report of all the tests carried out at the works should be furnished in six copies for approval of the purchaser. No dispatch should be affected without approval of the owner. No dispatch should be carried out without approval of test certificate.

21.3 After dispatch clearance by the quality assurance department, the material should be transported to site by the Bidder securely packed.

21.4 All the site activities including unloading, storage cum insurance of equipment and materials on arrival to site, installation, commissioning and carrying out all the tests at site should be performed by the Bidder in presence of purchaser's representatives and with the permission of purchaser as and when required.

## **22. Work at site:**

### **Erection, Testing and Commissioning:**

22.1 All Testing, Commissioning and trial operation of the MBBTS should be in the scope of the Bidder with all equipment, accessories, men and materials required to carry out the work. If required, Bidder may visit the site and study the existing MBBTS to carry out the work.

22.2 The scope of work includes receipt and storage of panels at site. The Bidder should carry physical inspection of the panels with purchaser's representative.

22.3 As per the shutdown programme of the units, site work should be carried out by the Bidder.

22.4 Bidder should submit the three set of documents comprising manufacturer instruction manual, specification of supplied items, factory as well as site test report, software for operation of MBBTS and any other documents as required.

22.5 Testing of MBBTS at Site:

i) After complete erection and erection clearance and cabling, the following tests will be included but not limited, to be carried out by the Bidder. Any other tests not listed below but essential for the work, will be included by the Bidder.

ii) Operation under simulated service condition to ensure accuracy of wiring, correctness of control scheme and proper functioning of the equipment under all fault conditions.

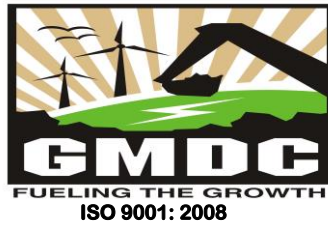
iii) High voltage test as per relevant IS should be performed on all wiring and current carrying parts.

iv) Cold change over trials of the breakers through MBBTS.

22.6 All tests at site should be performed in presence of purchaser's representative.

22.7 Certified test report of all the tests carried out at the site should be furnished in six copies for approval of the purchaser.

22.8 Commissioning and Trial Operation: The contractor should arrange for commissioning and trial operation with men and material as required and/or as directed by the purchaser. The hot trials



should be carried out after synchronizing and stabilization of the unit. Recording of all parameters during actual transfer should be carried out and report should be submitted. Both Cold & Hot Trials are to be carried out successfully before ATPP representatives and a satisfactory M.O. signed by ATPP & Suppliers engineer In-charge is to be obtained

22.9 Guarantee/Warranty: Bidder shall provide free of cost service for one year and guarantee for supply of materials for 18 months of commissioning.

#### **4. Technical specification and requirements:**

**Features and Specifications required in MBBTS as below: Please mention in Annexure-A also**

##### **4.1 Main Features required in MBBTS transfer relay:**

4.1.1 The MBBTS transfer relay should be designed to provide process continuity to the loads attached to the motor or other auxiliaries, while transferring the power supply from one source to another. The aim of the MBBTS should be to maintain the healthy power supply to the auxiliaries on the electrical buses at all times without subjecting them to abnormal conditions that leads to their failure. In the event of planned or contingent transfer condition, the "MBBTS should transfer the auxiliaries to an alternate healthy supply, if available, in a fast and safe manner.

4.1.2 MBBTS transfer relay should be fail safe such that in case of any problem in the MBBTS like system trouble or control supply failure etc. it should not issue unwanted signal affecting switchgear system. No tripping/closing of breakers should be initiated under such cases.

4.1.3 The BTS would monitor and prevent paralleling of two sources and would be designed to be completely automatic, self-checking and built in online testing mode to ensure highest degree of reliability

##### **4.1.2 Bus Transfer Initiation requirements:**

The MBBTS transfer relay should preferably have additional feature for selecting all possible and appropriate bus transfer directions based on the existing status of the concerned switchgear.

The initiation of bus transfer required from MBBTS is as follows:

4.1.2.1 Manual Transfer: Manual transfer will be used for planned transfer during normal operation of the plant. This transfer should be initiated from the front of the panel and should be user friendly. Manual transfer should be possible in both UT to Stand vice versa as per requirement.

4.1.2.2 Auto transfer: MBBTS should have features for automatic transfer through continuous monitoring algorithms. These algorithms may be used in future if required to initiate and transfer under specified bus deterioration conditions like under voltage, bus under frequency or high df/dt with respect to their settings. This should ensure healthy source to the station auxiliaries.

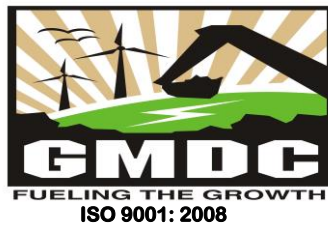
##### **4.1.3 Bus Transfer Modes required:**

4.1.3.1 The bus transfer should initiate in such a fashion so that it should attempt (i) fast (ii) in phase and (iii) slow for all transfers with fixed priority.

4.1.3.2 The fast transfer should be break before make type where old source breaker trips before new source breaker closes. The transfer should be done on the basis of comparing the phase angle and voltage of both the sources with overall time limit.

4.1.3.3 The in-phase transfer should also break before make type and safely transfer the bus when fast transfer is blocked. It should be possible to supervise the in-phase transfer on the basis of voltage and phase angle deviation with maximum frequency difference, maximum df/dt limit with overall time limit. Logic should calculate in advance based on falling voltage parameters, first rate of change of phase angle and second rate of change of phase angle using predictive algorithm.

4.1.3.4 When both fast transfer and in-phase transfers fail, slow transfer should come to action. In



this mode of transfer all/selected motors should trip at 70% of busvoltage. The healthy breakers (tie circuit breaker) will close after tripping of faulty source breaker. The closing command to the tie circuit breaker would be given only after the Bus voltage is below a safe value of 20-30% (settable).

4.1.3.5 Additional preferable Feature: A Momentary paralleling transfer mode should also be provided only during manual transfers, that is make before trip transfer, for a small duration of not more than 500ms. This transfer mode is generally not preferred as the fault level of the two paralleled transformers exceeds the breaking capacity of the feeder breakers and the same may damage if a fault occurs during paralleling of two supply circuit breakers.

4.1.4 Fast Transfer From faulty bus to healthy bus should be achieved within 2 cycles of dead bus time

4.1.5 In Phase Transfer Mode - Transfer at first slip cycle phase in coincidence with 2<sup>nd</sup> order Prediction Algorithm

4.1.6 It should have Momentary Paralleling Mode.

4.1.7 Initiation by external initiation logic and internal logic generated voltage / frequency / rate of change of frequency mode etc.

4.1.8 It should be ANSI C50.41 Compliant.

4.1.9 It should have Integrated System Interlocks.

4.1.10 It should have multiple breaker scheme configuration features and multiple transfer directions based on breaker configurations.

4.1.11 The communication protocols should be standard.

4.1.12 It should have Software arrangements for Virtual Testing, Transfer.

4.1.13 It should have features of event recording, uploading, analysis & oscillography with sequence of events.

#### **4.1.14 MBBTS Blocking:**

Following should be minimum conditions of MBBTS blocking. During blocking, the indication with the cause of blocking should be indicated on the front of the panel and alarm should be generated.

4.1.14.1 **Self-test failure:** It should continuously perform self-test and in the event of failure of this test, MBBTS should be blocked. Same should be annunciating in main control room.

4.1.14.2 **Breaker failure:** On initiation of close commands to breaker if faulty source breaker fails to trip and healthy source breaker closes, then to avoid paralleling, the new breaker should trip. Same should be annunciating in main control room.

4.1.14.3 **Transfer failure:** When desired sequence of bus transfer request does not result in desired bus transfer operation, it should block further initiation. Same should be annunciating in main control room.

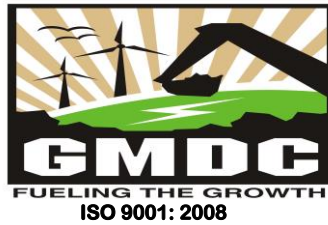
#### **4.1.15 Breaker Configuration:**

The MBBTS should continuously monitor the status of the breakers through NO and NC auxiliary contacts of the breaker. If the status of NO and NC contacts of the breaker are not consistent with each other, the breaker status error condition should be detected and indicated and MBBTS should put into non-readiness.

#### **4.1.16 Breaker Trip/Close Circuit Monitoring:**

MBBTS should continuously monitor the DC voltage across the closing and tripping command contacts for UAT, SAT and Tie circuit to ensure continuity. The tripping voltage of the closed breaker and closing voltage of tripped breaker should be monitored continuously. In the event of non-compliance of any of the above, MBBTS should put into non-readiness.

#### **4.1.17 Source Voltage Healthiness:**



MBBTS should continuously monitor the healthiness of incoming source for healthiness otherwise it should put the system into non-readiness.

#### **4.1.18 Online Testing:**

On line testing mode should be incorporated in the MBBTS. Test mode PushButton should be provided on the front interface. During test mode, it should check all interlocks to ascertain this operation. If any of the interlock fails, should be detected in the test mode and should be indicated. On actuation of test transfer, the tripping and closing contacts should be asserted as per real system conditions, but should not actually trigger the transfer. The display of change status of breaker in test mode should be indicated on the interface. After completion of test operation, the test mode should get automatically disconnected. During on line testing, if requirement arises for actual transfer, it should override the on line testing.

#### **4.1.19 Transfer Analysis:**

MBBTS should record every transfer event, which can be uploaded to the PC/laptop. The display of the events should be step by step to analyze schematics. It should continuously monitor the electrical parameters like phase angle, voltage magnitude, frequency and their difference between faulty source and healthy sources at all the instants.

4.1.20 It should have platform of minimum 32 bit microprocessor based RISC architecture.

4.1.21 It should be functional by Input control power supply of 220/110/48V DC  $\pm$  10%.

4.1.22 It should have Test and transfer illuminated pushbuttons with MBBTS service selection in/out toggle switch, readiness disable etc.

4.1.23 It should have system interface of Minimum 17 contact inputs, minimum 4 trip rated electromechanical contact outputs, 9 trips rated solid state contact outputs, 4 numbers 5A current inputs, 4 Nos 110V AC voltage inputs, front and rear RS-232 ports, RS-220/110/485 port/RJ-45 port, IRIG-B port.

4.1.24 It should have software Interface with graphical user interface (GUI) based scheme implementation, virtual test set simulation, modular object oriented programming, settings, online viewing, SCADA MIMIC application diagram, sequence of event recording, step-by-step replay, analysis, Oscillography, data profiler, remote control.

4.1.25 It should have comprehensive transfer readiness & MBBTS blocking interlocks

4.1.26 External Alarm Circuit: For external alarm on the electrical control panel for MBBTS trouble separately, NO contact should be wired up to the terminal block. Any other MBBTS annunciation required for safe operation of the plant should be provided on terminal block. Provision for future Modbus Communication Protocol should be available.

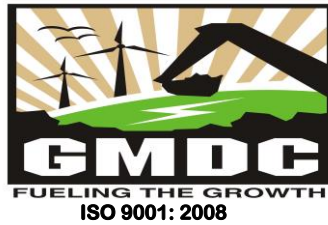
#### **4.1.27 Human Machine Interface Requirements in MBBTS transfer relay**

Human Machine Interface general requirement: The interface should be menu driven with screen and push buttons for transfer operations. The menu structure should be simple and easy for the operator and understandable with all easy to follow instructions and diagnostic information, logs and testing feature. It should give all information on the screen like transfer mode, MBBTS IN/OUT condition, Previous transfer log, Breaker status, MBBTS ready/not ready with the status of all conditions required for MBBTS ready state, MBBTS Blocked/not blocked conditions with all conditions required for MBBTS with manual reset, MBBTS test IN/OUT status etc with the approval of the owner.

The Bidder may add other conditions required for satisfactory operation of the MBBTS. The bidder may add the conditions required to fully satisfying the MBBTS up to final commissioning and trial operations and the manufacturer should be ready to modify the programme as required.

The interface should be user friendly with built in fail-safe features.

This should include, but not limited to the following:



**4.1.27.1 LED Display:** It should have 20-25 Programmable LED indications to indicate the various conditions of MBBTS. The MBBTS should have programmable LED target on the front panel. The programmed annunciators should be provided. These annunciators are the minimum requirement. The Bidder should incorporate other required annunciators for the MBBTS. The lamp test provision should be provided to check healthiness of LED's should be provided.

**4.1.27.2 LEDs should be provided, minimum for the following:**

- i) To indicate that the MBBTS is in ready condition.
- ii) To indicate that the MBBTS is in Test Mode.
- iii) To indicate that the MBBTS is in "service".
- iv) To indicate that the previous transfer was successful.
- v) To indicate that the MBBTS is not ready.
- vi) To indicate that the MBBTS is blocked.

4.1.27.3 It should be provided with Minimum 20 character, 3 line, wide angle, high temperature, backlit LCD for menu display.

4.1.27.4 To view and to change the settings, it should have Soft keys for Menu selection and also for navigation of Menu items.

4.1.27.5 It should have selection arrangement for taking MBBTS IN/OUT from service.

4.1.27.6 It should have RS-232 Data port for communication.

4.1.27.7 In case there are some fixed functions in offered scheme, it should have fixed Function Pushbuttons with LED Indications.

4.1.27.8 It should have Indication to indicate whether MBBTS is in service or not.

4.1.27.9 It should have Test Transfer switching arrangement.

4.1.27.10 It should have arrangement for manual transfer of one bus to another bus.

4.1.27.11 It should have MBBTS Readiness Disable Fuse.

MBBTS Readiness condition means it should perform several external (customer provided) and internal system checks to determine the MBBTS logic readiness for initiating automatic transfer. It should not allow the transfer to be initiated if any of the readiness condition is not satisfied.

4.1.27.12 **MBBTS Selection:** Selection should be possible for enabling/disabling the MBBTS through a selection switch.

4.1.27.13 the digital, programmable, LCD should have a key initiated metering display that should include but not limited to the following:

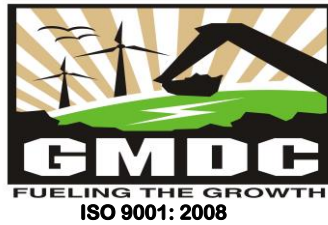
- i) To indicate Unit Auxiliary transformer side voltage.
- ii) To indicate Unit Auxiliary transformer side Frequency
- iii) To indicate Startup transformer side voltage.
- iv) To indicate Startup transformer side Frequency
- v) To indicate Bus Voltage
- vi) To indicate Bus Frequency
- vii) To indicate Bus  $\phi$  (Phase difference between two buses)
- viii) To indicate Bus V (Magnitude of phasor. difference between two buses).

**4.1.28 Hardware Standards requirements in MBBTS transfer relay:**

The MBBTS transfer relay should comply the following hardware requirements:

**4.1.28.1 Environmental testing:**

- i) Environmental withstand: As per IEC 60068-2-30
- ii) Vibration test: As per IEC 255-21-1
- iii) Bump & shock Test: As per IEC 60255-21-2
- iv) Cold temperature test: As per IEC 60068-2-1



- v) High temperature test: As per IEC 60068-2-2
- vi) Humidity test: As per IEC 60068-2-30

#### **4.1.28.2 Electromagnetic compatibility:**

- i) Surge withstand: As per IEC 61000-4-5
  - ii) Electrostatic discharge: As per IEC 60255-22-2
  - iii) Power Frequency Voltage withstand test: As per IEC 60255-5.
  - iv) DC Supply Interruption Test: - As per IEC 60255-11
  - v) Conducted Emission & Radiated Emission:- As per EN 55022
  - vi) Radiated Radio Frequency Electromagnetic Field Immunity Test :- As Per IEC 61000-4-3
  - vii) Radiated immunity test: 80 MHz 1 GHz: As per EN 61000-4-3, IEEE C37.90.2 penetration: As per IEC 60529, IP3X
- 4.1.28.3 **Contact ratings:** As per IEEE C37.90

#### **4.2 Computer Interface Requirements**

The LAPTOP with relevant legal software and laser printer required for the MBBTS should be supplied along with the MBBTS. Total software of the MBBTS with all settings should be provided in the interface for alteration, modification. The comprehensive testing of the features of the scheme and the analysis under varying

MBBTS conditions should be provided. The contractor should arrange training of the site Engineers for familiarization of the MBBTS with computer interface.

The software in computer interface should have the following minimum features:-

- 4.2.1 User Friendly Graphical User Interface
- 4.2.2 Multiple Login Levels for different uses – eg. Administration, Operator etc
- 4.2.3 Provision of settings change for qualified users.
- 4.2.4 Provision of Scheme Update Downloading for Administrative Users.
- 4.2.5 Provision for Virtual Testing / Simulation of Scheme under various User Settable System and Breaker conditions.
- 4.2.6 Sequence of Event Recording for log of various Inputs and Outputs.
- 4.2.7 Provision for Application Diagram with SCADA like MIMIC.
- 4.2.8 Facility for Online Viewing of Internal Data.
- 4.2.9 Data Profiler for logging relevant data at regular intervals
- 4.2.10 Event Recording and Playback Facility with Time stamped Oscillography of Voltage, Phase Angle, Frequency, Breaker Operations, and Control Signals etc.

#### **4.3 Panel Enclosure:**

4.3.1 The enclosure should be free standing type and should be fabricated from rigid welded structure frame completely covered by cold rolled sheet metal enclosure of minimum thickness 2 mm. The bottom plate and removable gland plate should be minimum 2.5 mm thick. The cable entry should be from bottom.

4.3.2 The enclosure should be dust and vermin proof confirming to IP-42. Gaskets should be used between adjacent units and underneath all covers for dust proof panel. The enclosure should be supplied with suitably drilled foundation frame and anchor bolts for mounting.

4.3.3 Separate 19" rack Panel for two systems pertaining to Individual Unit should be provided.

4.3.4 Transparent front door of poly-fiber or glass should be provided for visualizing the parameters without opening the door. Suitable cooling arrangement inside the panel, if required, should be provided for maintaining the internal temperature.

4.3.5 The panel should be painted with powder coating with 40 microns minimum thickness with light grey shade.



#### **4.4 Secondary Wiring:**

4.4.1 All components of the MBBTS should be completely wired up-to the terminal block to facilitate external cable connection. Wiring should be complete in all respect to ensure proper functioning of control, protection, interlocking, and annunciator scheme. All spare contacts should be wired up-to terminal block.

4.4.2 1100V grade, single core, flexible, heat resistant, PVC insulated stranded copper conductor should be used for switchboard wiring. Size of wiring should be 1.5mm<sup>2</sup> for voltage and control circuit. Number of strands per conductor for secondary wiring should not be less than seven.

4.4.3 Each wire connected to equipment terminal and the terminal block should be fitted with self-locking plastic ferrules at both ends. Plastic ferrules should have engraved identification corresponding to wiring diagram. All wire terminations should be made with crimping type tinned, insulated copper lugs.

4.4.4 All wires should be suitably grouped and neatly arranged with each bunch adequately supported along its run to prevent sagging. Suitable wiring trenches and channels should be used for this purpose. Not more than two wires should be connected to any terminal.

4.4.5 All wiring should conform to colour code in accordance with the following:

#### **COLOR CIRCUIT PARTICULAR**

Red First phase connection in voltage circuit

Yellow Second phase connection in voltage circuit

Blue Third phase connection in voltage circuit

Green Connection to earth

Grey Connection to DC circuit

Black AC neutral connection, AC connections other than those specified above.

#### **4.5 Terminal Block:**

4.5.1 Terminal block of secondary wiring should be of one-piece moulded construction with stud type terminals. Insulating barriers of adequate height and thickness should be provided between adjacent pair of terminals to provide adequate protection to the terminals and allowing easy access to the same. Terminal block should be of 650V grade and terminal should be rated for 10Amp.

4.5.2 Terminal block should have separate terminals for incoming and outgoing terminations. Termination for PT secondary circuits should be provided with test links and isolating facility.

4.5.3 Terminal block should be grouped according to circuit function and should have 20% spare terminals uniformly distributed throughout the terminal block.

4.5.4 Separate terminal block of adequate rating should be provided for terminating AC and DC auxiliary power supply. Terminal block should be adequately shrouded.

#### **4.6 Isolating Switches and Fuses:**

4.6.1 Two nos. DC feeders of adequate rating should be made available for the DC control supply of the panel. Facility for manual/auto changeover of DC supply should be made. Isolating switch fuse unit of adequate rating should be provided for incoming

DC supply feeders. Each sub circuit should be provided with a set of fuses.

4.6.2 Availability of DC control supply should be supervised by auxiliary relay with adequate number of NO and NC contacts for DC supply healthy indication on the panel and on failure annunciation on remote panel.

4.6.3 Each panel should have facility for receiving, distributing, isolating and fusing of DC and AC supplies for various controls, signaling, lighting and space heating circuit.

4.6.4 All AC incoming and its sub circuits should be provided with separate switch fuse units / MCB's.



4.6.5 Selection of main and sub circuit fuse rating should be properly graded to ensure selective clearance of sub circuit fault (voltage circuit for relays and meters should be protected with separate fuse). Secondary AC and DC circuit should be protected by set of fuses or fuse and link.

4.6.6 Fuses should be HRC cartridge type of moulded insulating material and should preferably with operation indicator to indicate blown off condition. Fuse carrier bases should have imprints of fuse rating and voltage. All accessible line connections to fuse base should be adequately shrouded. Fuses should be grouped according to their function and adequately labelled to indicate the function. Fuses should be preferably link type with maximum interrupting capacity 16Amp

4.6.7 Use of MCB in place of Fuse in PT secondary circuit are acceptable, provided correct discrimination and protection can be ensured with adequate rating. Use of MCB in place of switch fuse or fuse in any other circuit is subject to approval.

#### **4.7 Interior Panel Illumination:**

MBBTS panel should have built in illumination facility. Intensity of illumination should be adequate enough to attend fault without any external aid. The cubicle should also be provided with three pin plug and socket with switch connected to single phase AC supply in the panel for connection of hand lamp. Lamp circuit should be tapped from single phase AC supply of the panel.

#### **4.8 Anti-Condensation Heaters in Panel:**

4.8.1 Panel should be equipped for space heater suitable for 1-phase AC to prevent moisture condensation within the enclosure and should be complete with switch fuse unit of adequate rating for power supply. They should be located inside the cubicle and suitably shrouded not to cause injury to operating personnel or damage to equipment.

4.8.2 The space heaters should be controlled through a thermostat of adjustable setting to maintain cubicle temperature 5°C above the ambient. The thermostat should be preferably located in the instrument chamber.

#### **4.9 Panel and Equipment Earthing:**

4.9.1 All metal parts other than those, forming part of electrical circuit should be connected to earthing bus provided at the bottom and extended throughout the length of the panel. Earth bus conductor should have sufficient cross section to carry short time fault current of associated circuit without any deformation. Suitable conductor should be provided at two extreme ends for connection to plant earth bus.

4.9.2 Hinged door should be earthed through flexible Earthing braid. Metallic cases of all components mounted on the panel should be connected to the earth bus with copper conductor of not less than 2.5 mm<sup>2</sup>. VT secondary neutrals or common leads should be earthed at one point only. Earthing should be made through links so that Earthing may be removed from one group without disturbing continuity of Earthing for other group.

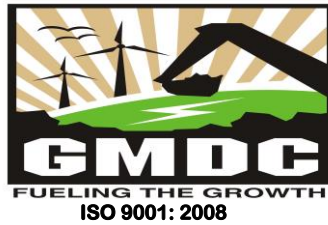
4.9.3 Wherever required detailed Earthing drawing should be prepared and submitted for approval.

#### **4.10 Equipment Labelling:**

4.10.1 Panel should be provided with designation nameplate, fixed at the top. The size of the plate and size of the letters should be such that it should be visible easily.

4.10.2 All components of the panel whether mounted inside or on the surface should have identifying labels, related to identifying reference of arrangement drawing and wiring diagram. The labels should be mounted on the side or below the respective element from inside and outside of the panel.

4.10.3 All labels should be made of non-hygroscopic, non-deteriorating material, matt or semi matt finish. Labels should have white lettering on black background. For secondary fuses, current rating should be indicated on the labels.



4.10.4 Special warning tag should be provided inside and outside the panel wherever considered necessary. Warning labels should have white letters on red background.

The labels should be securely fixed on the surface by the screws.

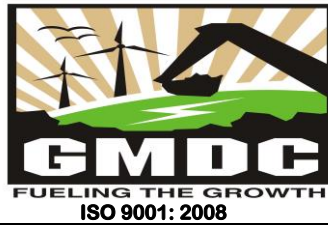
4.10.5 All labels and their inscription on feeder designation plate should be subjected to owner's approval

### ANNEXURE-1

#### **MINIMUM DETAILS OF THE MICROPROCESSOR BASED HIGH SPEED BUS TRANSFER SYSTEM (MBBTS SYSTEM) BEING OFFERED BY BIDDER**

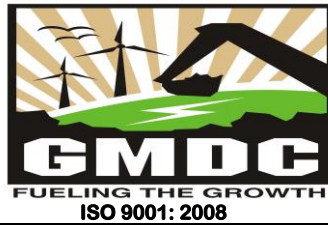
**TO BE FILLED BY BIDDER:**

Sr No	Description of specification MBBTS	Compliance of specification in the offered items (Status to be filled by bidder in Yes/No)	Any deviation in specifications (Status to be filled by bidder in Yes/No) / Remarks	Reference page no of document or catalogue where specified feature is indicated



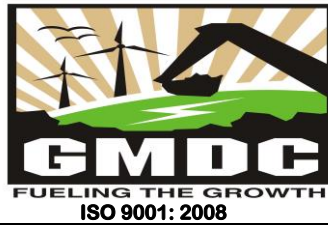
**1. Main Required Features in MBBTS transfer relay:**

Fast Transfer from faulty bus to healthy bus should be achieved within 2 cycles of dead bus time			
In Phase Transfer Mode -Transfer at first slip cycle phase, coincidence with 2nd Order Prediction Algorithm			
Residual Voltage and Slow Transfer Modes to transfer source of supply to affected bus			
It should have Momentary Paralleling Mode.			
Protective as well as other Intelligent Automatic Transfer			
Transfer Initiation by external initiation logic and internal logic generated voltage / frequency / rate of change of frequency mode etc.			
ANSI C50.41 Compliance.			
Online Testing feature to ensure healthiness of bus transfer system.			
It should be able to monitor the Breaker Trip and Close Circuit continuously.			
Integrated System Interlocks			
It should have multiple breaker scheme configuration features and Multiple transfer directions based on breaker Configurations.			
The communication protocols should be Standard.			
It should have Software arrangements for Virtual Testing, Transfer.			
It should have features of event recording, uploading, analysis & oscillography with sequence of events.			
It should have 20-25 Programmable LED indications to indicate the various conditions of MBBTS			
It should be provided with Minimum 20 character, 3 line, wide angle, high Temperature, backlit LCD for menu display.			
To view and to change the settings, it should have Soft keys for Menu selection and also for navigation of Menu items			
It should have selection arrangement fortaking MBBTS IN/OUT from service			



	It should have RS-232 Data port for communication			
	In case there are some fixed functions in offered scheme, it should have Fixed Function Pushbuttons with LED Indications.			
	It should have Indication to indicate whether MBBTS is in service or not			
	It should have Test Transfer switching arrangement			
	It should have arrangement for manual transfer of one bus to another bus			
	It should have MBBTS Readiness Disable Fuse			
	It should have platform of minimum 32 bit microprocessor based RISC architecture.			
	It should be functional by Input control power supply of 220/110/48V DC $\pm$ 10%.			
	It should have Test and transfer illuminated pushbuttons with MBBTS service selection in/out toggle switch, readiness disable etc.			
	It should have system interface of Minimum 17 contact inputs, minimum 4 trip rated electromechanical contact outputs, 9 trips rated solid state contact outputs, 4 numbers 5A current inputs, 4 110V AC voltage inputs, front and rear RS-232 ports, RS-220/110/485 port/RJ-45 port, IRIG-B port. Note: Bidders should review the requirement and offer system accordingly.			
	It should have software Interface with graphical user interface (GUI) based scheme implementation, virtual test set simulation, modular object oriented programming, settings, online viewing, SCADA MIMIC application diagram, sequence of event recording, step-by-step replay, analysis, Oscillography, data profiler, remote control			
	<b>Hardware Standards:</b> Environmental withstand: As per IEC 60068-2-30			
	Vibration test: As per IEC 255-21-1			
	Cold temperature test: As per IEC 60068-2-1			

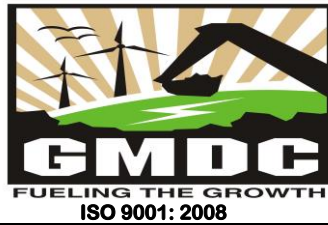
	High temperature test: As per IEC 60068-2-2			
	Humidity test: As per IEC 60068-2-30			
	viii) Surge withstand: As per IEC 61000-4-5 ix) Electrostatic discharge: As per IEC 60255-22-2 x) Power Frequency Voltage withstand test: As per IEC60255-5. xi) DC Supply Interruption Test :- As per IEC 60255-11 xii) Conducted Emission & Radiated Emission:- As per EN 55022 xiii) Radiated Radio Frequency Electromagnetic Field Immunity Test :- As Per IEC 61000-4-3 xiv) Radiated immunity test: 80 MHz 1 GHz: As per EN 61000-4-3, IEEE C37.90.2 penetration: As per IEC 60529, IP3X			
	Contact ratings: As per IEEE C37.90			
<b>2. Bus Transfer Initiation requirements:</b>				
	<b>Manual Transfer:</b> Manual transfer will be used for planned transfer during normal operation of the plant. This transfer should be initiated from the front of the panel and should be user friendly. Manual transfer should be possible in both UAT to SAT and vice versa as per requirement.			
	<b>Auto transfer:</b> MBBTS should have features for automatic transfer through continuous monitoring algorithms. These algorithms may be used in future if required to initiate and transfer under specified bus deterioration conditions like under voltage, bus under frequency or high df/dt with respect to their settings			
<b>3. Bus Transfer Modes required:</b>				
	The bus transfer should initiate in such a fashion so that it should attempt (i) fast (ii) in phase and (iii) slow for all transfers			



	with fixed priority			
	The fast transfer should be break before make type where old source breaker trips before new source breaker closes.			
	The in-phase transfer should also break before make type and safely transfer the bus when fast transfer is blocked			
	When both fast transfer and in-phase transfers fail, slow transfer should come to action			
	Additional preferable Feature: A Momentary paralleling transfer mode is also provided only during manual transfers that is make before trip transfer for a small duration of not more than 500ms.			
<b>4. Minimum LED Display's required:</b>				
	To indicate that the MBBTS is in ready condition.			
	To indicate that the MBBTS is in in Test Mode.			
	To indicate that the MBBTS is in "service			
	To indicate that the buses are fed by UAT Feeding Bus.			
	To indicate that the buses are fed by SAT.			
	To indicate that the previous transfer was successful.			
	To indicate that the MBBTS is not ready.			
	To indicate that the MBBTS is blocked.			
<b>5. Digital programmable LCD should have a key initiated metering display that should include but not limited to the following:</b>				
	To indicate Unit Auxiliary transformer side voltage			



	To indicate Unit Auxiliary transformer side Frequency			
	To indicate Startup transformer side voltage.			
	To indicate Startup transformer side Frequency			
	To indicate Bus Voltage			
	To indicate Bus Frequency			
	To indicate Bus Phase difference between two buses.			
	To indicate Bus Magnitude of phasor difference between two buses.			
	<b>6. Human Machine Interface compatible with MBBTS</b>			
	<b>7. Computer Interface compatible with MBBTS with following minimum requirements:</b>			
	User Friendly Graphical User Interface			
	Multiple Login Levels for different uses – eg. Administration, Operator etc.			
	Provision of settings change for qualified users			
	Provision of Scheme Update Downloading for Administrative Users.			
	Provision for Virtual Testing / Simulation of Scheme under various User Settable System and Breaker conditions			
	Sequence of Event Recording for log of various Inputs and Outputs			
	Provision for Application Diagram with SCADA like MIMIC			
	Facility for Online Viewing of Internal Data			



	Data Profiler for logging relevant data at regular intervals			
	Event Recording and Playback Facility with Time stamped Oscillography of Voltage, Phase Angle, Frequency, Breaker Operations, and Control Signals etc			
	<b>8. External Alarm Circuit</b>			
	<b>9. Experience/Certificates:</b>			
	The bidder should offer MBBTS systems which are already in use for nuclear power generating stations or large conventional power generating stations in India. Bidder should attach completion or other certificates from organization as a proof.			
	The bidder should furnish valid Real Time Digital Simulation (RTDS) test certificate for offered MBBTS, if already carried out by Government approved agencies such as CPRI/ERDA. If not carried out, bidder should be ready to carry out the same at Government approved agencies such as CPRI/ERDA at his own cost.			

➤ **Scope of work (GMDC):-**

1. GMDC Ltd shall provide available drawing of Switchyard.
  2. GMDC Ltd shall provide available power supply to panels.
  3. GMDC Ltd engineer shall supervise and co ordinate the job.
  5. GMDC Ltd shall provide PTW permission at site and Gate pass on submission of your staff details.
  7. GMDC Ltd In charge engineer shall confirm all data after commissioning, testing and calibration.
  8. GMDC Ltd provide only lodging/Boarding to your staff on chargeable basis.
- GMDC will provide pick up-drop facilities for SK Varma-nagar, Panandhro to Akrimota TPS only. (vehicle support)



FUELING THE GROWTH  
ISO 9001: 2008

## **Annexure—C** **Technical Specifications and Requirements**

**As Above Annexure B**





## Annexure—D

### DECLARATION –I (On Company's letterhead)

Letter No.

Date

From:

To,  
THE MANAGING DIRECTOR,  
GUJARAT MINERAL DEVELOPMENT CORPORATION LTD.,  
“KHANIJ BHAVAN”, 132 FT. RING ROAD,  
UNIVERSITY GROUND,  
AHMEDABAD-380 052.

**SUB: -**

Dear Sir/ madam,

I/we have carefully gone through and clearly understood the Tender Notice and Tender Form and have tendered to execute and satisfactorily complete the whole of the work strictly in accordance with the said Tender Form.

I/we hereby solemnly declare that any of our partners severally and/or individually or our firm/company have not been put any time in the past on the black list either by the Government of India/Government of Gujarat/Government of India Undertaking / Government of Gujarat Undertaking/Any other State Government Undertaking. I/we hereby further agree that if the Corporation come to know subsequently, after awarding the work under this tender to me/us to our firm/our company that any of our partners either individually or severally, or our firm/company was black listed by any of the states agencies, the Corporation shall be entitled to take any actions against us severally or individually or our firm/company in this regard in any manner that may be deemed fit by the Corporation.

Yours faithfully,

Signature & Stamp of the Tenderer

Name: \_\_\_\_\_

Address: \_\_\_\_\_



## Annexure—E

### DECLARATION -II (On Company's letterhead)

Letter No.

Date:

From:

To,  
THE MANAGING DIRECTOR,  
GUJARAT MINERAL DEVELOPMENT CORPORATION LTD.,  
“KHANIJ BHAVAN”, 132 FT. RING ROAD,  
UNIVERSITY GROUND,  
AHMEDABAD-380 052.

**SUB: -**

Dear Sir/ Madam,

I/we having carefully gone through and clearly understood the Introduction, Tender Notice, documents to be enclosed and sent along with this tender, plans, specifications, conditions of contract etc. for the above mentioned work, do hereby tender to execute and complete the whole of the work strictly in accordance with the said plans and specifications and conditions of contract at the rates set out in the priced schedule and quantities attached hereto.

I/we have deposited as Earnest Money Rs. \_\_\_\_\_ (Rs. \_\_\_\_\_) by demand draft in your office which amount is not to bear any interest and I/we do hereby agree that this sum shall be liable to be forfeited by the Corporation at its sole discretion, in the event of your accepting my/our tender and I/we fail to execute the contract, when called upon to do so.

It is understood by me/us that the lowest or any tender will not necessarily be accepted and that no reasons shall be given for such non-acceptance.

I/we agree to keep our offer open for 120 days or for a further period as would be desired by the Corporation from the date of opening of the tender. We agree to all the terms and conditions of the tender.

Yours faithfully,

Signature & Stamp of the Tenderer

Name: \_\_\_\_\_

Address: \_\_\_\_\_



## Annexure—F

### ARTICLES OF AGREEMENT

(DRAFT)

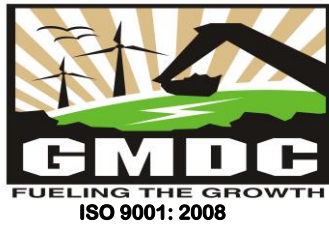
(NOTE: These Articles of Agreement shall be signed by the successful Tenderer (contractor) and the GMDCs on a Non-Judicial Stamp Paper of Rs.100/-; the Stamp Paper shall be bought by the Contractor).

ARTICLES OF AGREEMENT made at \_\_\_\_\_ on this \_\_\_\_\_ day of \_\_\_\_\_ BETWEEN \_\_\_\_\_ (hereinafter referred to as the GMDC which expression shall include his heirs, executors, administrators and assignees) of the one part and \_\_\_\_\_ (hereinafter referred to as the “Contractor” or the “Tenderer” which expression shall include his heirs, executors, administrators and assignees) of the other part.

WHERE AS the GMDC is desirous of constructing/Executing the work and have caused drawings, Specifications and Bills of Quantities describing the work to be done, to be prepared by or under the guidance and WHEREAS the said Tender Documents (as detailed in Para 13 of Instructions to Tenderers) inclusive of the Specifications and the Priced Bills of Quantities have been signed by or on behalf of the parties hereto, and WHEREAS the Contractor has agreed to execute upon and subject to the conditions set herein, the works shown upon the “said drawings” and described in the “said Specifications” and the “said Priced Bills of Quantities” (all together hereinafter referred to as “The Conditions”). AND WHEREAS the Contractor has submitted the Initial security deposit of Rs. \_\_\_\_\_ (Rupees: \_\_\_\_\_ only) in the form of Cheque/DD/B.G.

#### **NOW IT IS HEREBY AGREED AS FOLLOWS:**

- 1 In consideration of the payment to be made to the contractor as hereinafter provided, he shall upon and subject to the said conditions execute and complete the works shown upon the said drawings and described by or referred to in the said Specifications, the Priced Bills of Quantities and such further detailed drawings and/or instructions as may be furnished to him by the GMDC/Consulting Engineer.
- 2 The GMDC shall pay the Contractor such sums as shall become payable to him in terms of the Conditions at the time and in the manner specified in the Conditions.
- 3 The terms Engineer in charge for the purpose of this Contract such other person as shall be nominated for the purpose by the GMDC not being a person to whom the Contractor shall object for reasons considered to be sufficient by the GMDC. Provided always that no person(s) subsequently appointed to be the Engineer in charge under this Contract shall be entitled to dis-regard or overrule any decision or approval or direction given or expressed in writing by the (previous) Architect/Consulting Engineer/Engineer for time being.
- 4 The Contract or the work is as referred to in Para of Instructions to Tenderers and all other subsidiary works connected herewith within the same site as may be ordered to be done



from time to time by the Engineer in charge for the time being although such works may not be shown on the said drawings or described in the said Specifications or the Priced Bills of Quantities.

5. All disputes arising out of or in any way connected with this contract shall be deemed to have arisen in Ahmedabad and only the Court at Ahmedabad shall have jurisdiction to determine the same.
6. The several parts of this Contract have been read and fully understood by me, the undersigned. IN WITNESS WHEREOF the parties hereto have hereunder set their hands this \_\_\_\_day of \_\_\_\_\_, 200\_\_.

Signed by the said GMDC  
In Presence of

Name: -----

Address: -----

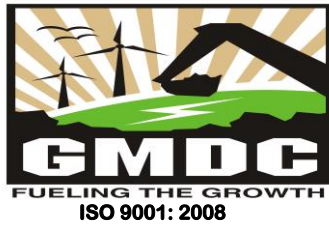
Occupation: -----

Signed by the said Contractor  
In Presence of

Name: -----

Address: -----

Occupation: -----



**Annexure—G**  
**Indemnity declaration form**  
(On letter head of the bidder)

**UNDERTAKING**

Ref. No.

DATE:

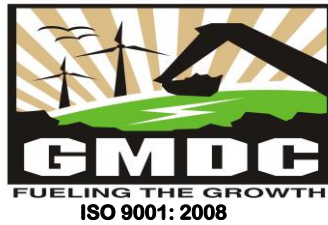
To,  
The MANAGING DIRECTOR,  
M/S. GUJARAT MINERAL DEVELOPMENT CORPORATION LTD,  
“KHANIJ BHAVAN”, 132, FT. RING ROAD,  
NR. UNIVERSITY GROUND, VASTRAPUR,  
AHMEDABAD–380 052.

Dear Sir,

We M/s \_\_\_\_\_ hereby undertake that, we shall at all times, indemnify and keep indemnified that GMDC Limited from any and all liability for damages resulting from or arising out of or in any way connected with the operations covered by the tender No GMDC: \_\_\_\_\_ . We shall be responsible for all risk arising in connection with or on account of the operations covered by the contract covered by above tender and shall make good all losses and damages arising there from. In case, the GMDC Limited shall incur any cost or expense or suffer any loss on account of any claim demand or course of action brought against us and arising out of the operation covered by the Bidder/ Tenderer, the GMDC Limited shall have the power (Without being bound to do so) to define, contest or compromise any such claim demand or cause of action. Any amount that may become payable by GMDC Limited and any cost expense etc. that may be incurred by GMDC Limited in this behalf, shall also be recoverable from us, without prejudice to your other rights.

Yours Faithfully,  
For \_\_\_\_\_

SEAL & SIGNATURE OF AUTHORITY



## Annexure—H

To be typed on Stamp Paper of Rs. 100.00

Same format for both the orders.

### BANK GUARANTEE FOR SECURITY DEPOSIT

BG No. \_\_\_\_\_ For Rs. \_\_\_\_\_

#### IRREVOCABLE BANK GUARANTEE

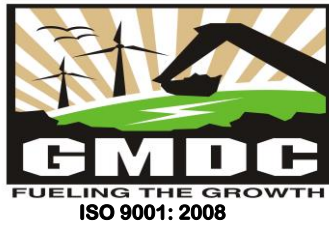
This deed of Guarantee is made this day \_\_\_\_\_ between Gujarat Mineral Development Corporation Limited having registered office at Khanij Bhavan, Near University Ground, Behind Gandhi Labour Institute, 132ft Ring Road, Vastrapur, Ahmedabad- 380 052 (India) hereinafter called Corporation and \_\_\_\_\_ (Bankers) \_\_\_\_\_ for an amount of Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_) for and on behalf of M/s. \_\_\_\_\_ having registered office at \_\_\_\_\_ hereinafter called Contractor/Vendor/Agency. (Which expression shall unless excluded by or repugnant to the context, included its successors and assigns of the concerned Parties.)

The Corporation entered in to contract with the contractor and issued tender No. \_\_\_\_\_ to them, a Purchase/Work Order for the supply/work of \_\_\_\_\_ for the GMDC Site / Project/ Office \_\_\_\_\_ as per terms and conditions contained in Tender No. \_\_\_\_\_ L.O.I/Purchase/Work Order No. \_\_\_\_\_ dated \_\_\_\_\_ and whereas clause No. \_\_\_\_\_ of the said contract Provided that the Contractor/Vendor/Agency is required to produce a irrevocable Bank Guarantee in favor of the Corporation for sum of Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_ Only) as Security Deposit for the due performance of the contract.

And whereas at the request of the Contractor/Vendor/Agency, the Bank has agreed to execute this guarantee.

IT IS HEREBY AGREED AND DECLARED BY THE BANKERS HERETO AS FOLLOW :

- 1). The Bank hereby guarantee to the Corporation the observance and performance by the Contractor/Vendor/Agency of the various terms and conditions obligations as provided in the said contract and further undertakes to pay to the Corporation a sum of Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_) on demand and without any demur in the event of the Contractor/Vendor/Agency failing or refusing to perform the various duties and obligations under the said contract or otherwise committed breach of any of the terms and conditions of the said contract and it is hereby declared that the decision of the Corporation that the Contractor/Vendor/Agency has to failed and neglected to perform any of the duties and obligations indicated in the said contract shall be final and binding on the Bank.



- 2). That the Guarantee herein shall not be affected by any change in the Constitution of the Bank.
- 3). That the Guarantee shall not be revoked without consent of the GMDC.
- 4). That the Bank further declares that on completion of the contract, the Corporation may retain such amount of the Guarantee as may be sufficient to cover any incorrect or excess payment made on the bill of the Contractor/Vendor/Agency till the Audit and defect liability period is completed.
- 5). NOTWITHSTANDING anything contained herein before our liability under this guarantee is restricted to Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_).

The Guarantee will remain in force for a period of \_\_\_\_\_ from the date of LOI/Purchase/Work Order i.e. up to \_\_\_\_\_ unless a demand or claim is made on us in writing on or before \_\_\_\_\_ all your rights under this guarantee shall be forfeited and we will be relieved and discharged from all our liabilities therein under.

#### **SIGNATURE & SEAL OF BANKERS**



FUELING THE GROWTH

ISO 9001: 2008

## Annexure—I

Sr. no.	Details of Bidders to be filliped are as under.	
	Supplier Name ( Vendor Name)	
1	URL(Website Name)	
2	Address Line1	
3	Address Line2	
4	Address Line3	
5	Address Line4	
6	City	
7	State	
8	Postal Code	
9	Address Name( Site)	
10	Phone Area Code	
11	Phone Number	
12	Fax Area Code	
13	Fax Number	
14	Email Address	
15	CONTACT PERSON NAME	
16	Mobile no. of Contact Person	
17	VAT NUMBER	
18	CST NUMBER for parties situated outside of gujarat	
19	PAN NUMBER	
20	TAN NUMBER (Optional)	
21	VENDOR TYPE (Material supplier OR service provider?)	
22	Product Code (Please select from the Sheet - Product Code)	
23	Product Code description (Please select from the Sheet - Product Code)	



**Annexure—J**

PROFORMA FOR EARNEST MONEY DEPOSIT  
On Tenderer's Letter Head

REF. NO.

DATE:

TO,

MANAGING DIRECTOR,  
M/S. GUJARAT MINERAL DEVELOPMENT CORPORATION LTD,  
“KHANIJ BHAVAN”, 132, FT. RING ROAD,  
NR. UNIVERSITY GROUND, VASTRAPUR,  
AHMEDABAD-380 052.

**SUB.** : E.M.D. for Tender No.

DEAR SIR,

WITH REFERENCE TO THE ABOVE AND AS PER TERMS & CONDITIONS OF TENDER,  
WE ARE SENDING HERewith D.D./PAY ORDER NO: \_\_\_\_\_ DATED \_\_\_\_\_ FOR  
RS. \_\_\_\_\_ DRAWN ON \_\_\_\_\_ BANK \_\_\_\_\_  
BRANCH IN FAVOUR OF M/S. GUJARAT MINERAL DEVELOPMENT CORPORATION  
LTD. PAYABLE AT AHMEDABAD, BEING THE AMOUNT OF E.M.D.

KINDLY ACKNOWLEDGE THE RECEIPT AND SEND YOUR STAMPED RECEIPT FOR  
THE SAME.

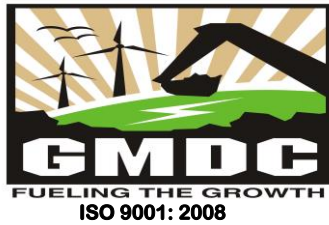
THANKING YOU,

YOUR'S FAITHFULLY,

Signature & Stamp of the Tenderer

Name: \_\_\_\_\_

Address: \_\_\_\_\_



## Annexure—K

### SOLVENCY CERTIFICATE -PROFORMA (If Applicable) (ON BANK LETTER HEAD)

Date:

This is to state that to the best of our knowledge and information,  
M/s. \_\_\_\_\_,

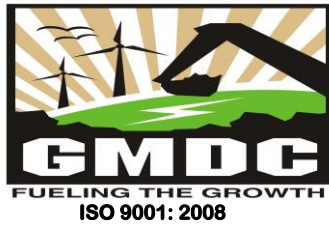
a Customer of our Bank is respectable and can be treated as solvent up to a sum of  
Rs..... (Rupees.....).

It is certified that this information is furnished without any risk and responsibility on Bank or its  
Officers in any respect whatsoever more particularly either as Guarantor or otherwise. This  
certificate is issued at specific request of the Customer.

Signature & Stamp of the Tenderer

Name: \_\_\_\_\_

Address: \_\_\_\_\_



## Annexure—L

### B.G. for an Advance Payment against Supply On Rs. 100/- Stamp Paper

Gujarat Mineral Development Corporation Limited,  
“ Khanij Bhavan “, Near University Ground,  
Behind Gandhi Labour Institute, 132ft Ring Road,  
Vastrapur, AHMEDABAD – 380 052

Dear Sir,

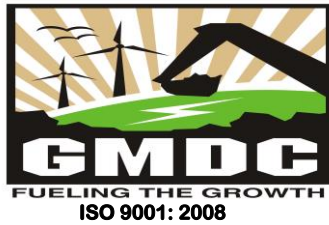
Guarantee No. :  
Amount of Guarantee :  
Guarantee cover from : to  
Last date for lodgment of claim :

This deed of Guarantee executed by \_\_\_\_\_ ( Bank Name and Address ) (hereinafter referred to as the “BANK “) in favour of M/s Gujarat Mineral Development Corporation Limited (hereinafter referred to as the “OWNER”) for an amount not exceeding Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_) at the request of M/s. \_\_\_\_\_(Name & Address of Contractor)( hereinafter referred to as the “CONTRACTOR”).

This guarantee is issued subject to the condition that the liability of the bank under this Guarantee is limited to a maximum of Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_) and the guarantee shall remain in full force up to \_\_\_\_\_(Date of expiry) and cannot be invoked other than by a written demand or claim under this guarantee served on the bank on or before \_\_\_\_\_(Last date of Claim).

In consideration of the “OWNER” which expression shall unless repugnant to the context or meaning thereof include its successors, administrators and assign having awarded to the “CONTRACTOR” which expression shall unless repugnant to the context or meaning thereof include its successors, administrators, executors and assign the LOI/Purchase/ Work Order No. \_\_\_\_\_ dated \_\_\_\_\_ Valued at Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_). The scope of Purchase/Work Order covers \_\_\_\_\_ etc. at GMDC Site/ Office \_\_\_\_\_ (hereinafter referred to as “CONTRACT”) and the “OWNER” having agreed to make an advance payment against supply to the “CONTRACTOR” for performance of above “CONTRACT” amounting to 10% (Ten Percent) of contract value as an advance against a Bank Guarantee to be furnished by the “CONTRACTOR”.

We, \_\_\_\_\_(Name of the Bank) having its Central/Head Office at \_\_\_\_\_ the “BANK” which expression shall unless repugnant to the context or meaning thereof include its successors, administrators, executors and assigns do hereby irrevocably guarantee and unconditionally undertake to pay to the “OWNER” immediately on first demand any or all money payable by the “CONTRACTOR” to the extent of Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_) as aforesaid at any time without any demur, reservations, recourse, contest or protest and/or without any reference to the Contractor. Any such demand made by the “OWNER” on the “BANK” shall be conclusive and binding notwithstanding



any difference between the “OWNER” and the “CONTRACTOR” or any dispute pending before any Court, Tribunal, Arbitrator or any other authority.

“The Bank further agrees that the “OWNER” at its option shall be entitled to enforce this guarantee against the “BANK” as principal debtor in first instance without proceeding against the “CONTRACTOR” and notwithstanding any security or other guarantee the “OWNER” may have in relation to the contractor’s liabilities.

Notwithstanding anything contained hereinabove, our liability under this advance payment guarantee is restricted to Rs. \_\_\_\_\_ (Rupees \_\_\_\_\_) and comes into force only upon receipt by the “CONTRACTOR” of the advance payment.

This guarantee will automatically be reduced proportionately against progressive invoices relevant to the value of work done and certified by the “OWNER” for the reduced amount and shall remain in force up to \_\_\_\_\_ unless a claim in writing is received by us before and up to \_\_\_\_\_, we shall be discharged from the liability under the guarantee.

Notwithstanding anything contained herein:

- a) Our liability under this Bank Guarantee shall not exceed Rs.\_\_\_\_\_. (Rupees \_\_\_\_\_)
- b) This Bank Guarantee shall be valid up to \_\_\_\_\_ and
- c) We are liable to pay the guaranteed amount or any part thereof under this Bank Guarantee only and only if you serve upon us a written claim or demand on or before \_\_\_\_\_.

**WITNESS:**

**BANK STAMP & SIGNATUR**

Signature & Stamp of the Tenderer

Name: \_\_\_\_\_

Address: \_\_\_\_\_