

Supply and installation of passive network infrastructure for New Computer Centre Tender No. DM1PL18001

Closing date/time of submission of Bid 26.06.2018 /14:00 hrs

And

Opening Date/time 26.06.2018 / 15:00 hrs

Office of In-Charge Infocom
Oil & Natural Gas Corporation Ltd
Institute of Reservoir Studies
Chandkheda
IRS,Ahmedabad-380005



OIL & NATURAL GAS CORPORATION LIMITED INSTITUTE OF RESERVOIR STUDIES Office of In-Charge-Infocom



CHANDKHEDA: AHMEDABAD-380005.
Phone No. 079-23295777/850/810,Fax No. 079-23291662
Email: pathak prerna@ongc.co.in

NOTICE INVITING TENDER

1.0 The Oil and Natural Gas Corporation Ltd. (ONGC) is engaged in the activities for exploration/drilling/production of Crude oil and natural gas in various regions of the country and has its registered office at Pandit Deendayal Upadhyaya Urja Bhawan, 5, Nelson Mandela Marg Vasant Kunj, New Delhi-110070. The I/c Infocom, IRS, Oil and Natural Gas Corporation Limited, Ahmedabad -380005,(Gujarat), India, invites bids under Single bid system through e-procurement in the prescribed tender form, from the prospective bidders having similar experience for "Supply and installation of passive network infrastructure for New Computer Centre at IRS"

The bidding documents/Terms & conditions are available at Part I. The prescribed Bid Forms for submission of bids are available in the tender document folder.

The general details of tender can be viewed in the 'Technical Rfx' in Bid invitation screen. The details of items tendered can be found by clicking to 'Items'.

2.0 Brief Description of the tender:

i)	Tender No.	DM1PL18001
ii)	Type of tender	Limited Tender (Single bid)
iii)	Description of Work	"Supply and installation of passive network infrastructure for New Computer Centre at IRS"
iv)	Closing date/time of submission of bids	26.06.2018/ 14:00 hrs IST
v)	Opening Date/time	26.06.2018/ 15:00 hrs IST
vi)	Closing date/time of submission of documents required in physical form	26.06.2018/14:00 hrs IST
vii)	Work Completion Schedule.	Within 45 days from placement of NOA
viii)	Bid Validity	60 days from the date of opening of Bid.
ix)	Security Deposit / Performance Bank Guarantee (To be	12.2% of PO value

	submitted by successful bidder/	
	Contractor	
x)	Address of Correspondence	OFFICE OF I/C-INFOCOM
	1	OIL & NATURAL GAS CORPORATION LTD.
		Institute of Reservoir Studies, Chandkheda
		Ahmedabad- 380005
xi)	Competent Purchase Authority	Shri S N Paranjape, DGM(E&T)
xii)	Officer In-charge/Leave reserve	Ms. Prerna Pathak, CE(E&T),
	Officer at Purchaser's office	Shri S N Paranjape, DGM(E&T)

- 3.0 Please note that all tender forms and supporting documents are to be submitted through ONGC's E-Procurement site only, before the scheduled date and time for the tender closing. Such documents submitted through e-bidding portal should be as per requirements of the tender, valid and legally operative as on the date fixed for opening of bids. However, the documents required in physical form (as indicated in the tender terms & conditions), should be submitted to the purchaser's office up to 1400 hrs of the closing date specified for submission of bid through e-bidding portal, in sealed envelope super scribed with tender no. and due date to Office of I/c-Infocom, ONGC, IRS, Chandkheda, Ahmedabad-380005(India).
- 4.0 All documents submitted in physical form should be signed on all pages by the authorized signatory of the bidder and submitted in duplicate (except Bid Bond).
- 5.0 The tender will be governed by the "General Terms & Conditions" at Part-I with Appendices 1 to 3, "Scope of Work with Special Terms and Conditions", & "Technical Specifications" at Part-II & "Price Bid Format" at Part-III.
- 6.0 The Certificates/Undertakings to be submitted by the bidders should be on the bidder's letter head.
- 7.0 Tenders will be opened on 26.06.2018 at 1500 hrs (IST). In case of an unscheduled holiday being declared in Ahmedabad on the prescribed closing / opening day of the tender, the next working day will be treated as the scheduled prescribed day of closing / opening of the tender.
- 8.0 ONGC reserves its right to accept/reject any/all the bids and cancel the tender at its sole discretion.
- 9.0 Details of the tender notice and the tender document are available on ONGC's website http://etender.ongc.co.in and all the bidders will have access to online help document which is available on login. This help document should be used for participating in e-procurement tenders.

CE(E&T)

Email: pathak_prerna@ongc.co.in

INDEX
Part– I
General Terms & Conditions
Appendix-1 UNDERTAKING/DECLARATION
Appendix-2 Proforma for certificate regarding genuineness of documents
Appendix-3 ACCEPTANCE OF TERMS & CONDITIONS OF THE TENDER
Appendix-4 Details of the bidder

Part– II Technical Specifications

Part-III Price Format Uploaded separately under Notes & Price bid attachment

Part-I GENERAL TERMS & CONDITIONS

1. WARRANTIES AND GUARANTEES OF SUPPLIED MATERIAL

1.1 MATERIALS AND WORKMANSHIP

Supplier shall fully warrant that the stores, equipment and component supplied under the order shall be new and of first quality according to the specifications and shall be free from defects (even concealed fault, deficiency in design, Materials and Workmanship).

- 1.2 Should any defects be noticed in design, material and/or workmanship within 12 months after the goods or any portion thereof as the case may be have been delivered (and commissioned) to the final destination indicated in the contract or for 18 months after the date of dispatch whichever period conclude earlier unless specified otherwise in the condition of contract. ONGC shall inform supplier and supplier shall immediately on receipt of such intimation, depute their personnel within 14 days to investigate the causes of defects and arrange rectification/replacement/modification of the defective equipment at site, without any cost to ONGC within a reasonable period. If the supplier fails to take proper corrective action to repair/replace defects satisfactorily within a reasonable period, ONGC shall be free to take such corrective action as may be deemed necessary at supplier's risk and cost after giving notice to the supplier.
- 1.3 Damage to the machinery and/or replacement due to incomplete and erroneous instructions issued by supplier will be the responsibility of the supplier and will be treated according to the provisions of warranty clause. Normal wear and tear shall not come under purview of this clause.
- 1.4 In case defects are of such nature that equipment shall have to be taken to supplier's work for rectification etc. supplier shall take the equipment at his cost after giving necessary undertaking or security as may be required by ONGC. ONGC shall if so require by the supplier, dispatch the equipment by quickest mode on freight to pay basis to the supplier's work. After supplier shall deliver the equipment at site on freight pre-paid basis. All risks in transit to and fro shall be borne by the supplier.
- 1.5 Equipment or spare parts thereof replaced shall have further warranty for a period of 12 months from the date of acceptance.
- 1.6 If the repairs, replacement or modifications referred are of such nature as may affect the efficiency of the equipment ONGC shall have the right to give to the supplier within one month of such replacement/renewal, notice in writing to carry out test as may be required for acceptance of the equipment.

2. **REJECTION**

2.1 If ONGC finds that the goods supplied are not in accordance with the specifications and other conditions stated in the order or its sample are received in damaged condition (of which matter ONGC will be the sole judge), ONGC shall be entitled to reject the whole of the goods or the part as the case may be and intimate to the supplier the rejection without prejudice to the ONGC other rights and remedies to recover from the supplier any loss which ONGC may be put to, also reserving its right to forfeit the security deposit/performance bond if any made for the due fulfillment of the contract. The goods shall be removed by the supplier and if not removed within 14 days of the date of communication of the rejection ONGC will be entitled to dispose of the same on account and at the risk of the supplier and after recovering the storage charges at the rate of 5% of the value of goods for each month or part of a month and the loss and expenses if any caused to the ONGC, pay balance to the supplier.

3. **REPLACEMENT**

3.1 Rejected goods should be removed and replaced within 14 days of the date of communication of rejection.

4. **SUB-LETTING AND ASSIGNMENT:**

4.1 The contractor shall not save with the previous consent in writing of the Purchase Authority, sublet, transfer or assign the contract or any part thereof or interest therein or benefit or advantage thereof in any manner whatsoever. Provided nevertheless that any such consent shall not relieve the contractor from any obligation, duty or responsibility under the contract.

5. **BREAKAGE/SHORTAGE**

5.1 Claim in respect of breakage/shortages in any case shall be preferred on the supplier within thirty days from the date of receipt of stores by the consignee which shall be replaced/made good by the supplier at his own cost. All risk of loss or damage to the material shall be upon the supplier till it is delivered to the purchaser/consignee.

6. SECURITY DEPOSIT / PERFORMANCE BOND / CONTRACT SECURITY

6.1 For purchases exceeding Rs. 1.00 lakh, the successful bidder, within 15 days of receipt of order / letter of award, will be required to send security deposit in the form of Bank Draft (or in lieu thereof Performance Bond, in the form of Bank Guarantee as per ONGC's standard proforma) @ 12.2% of contract value.

7. **WORK COMPLETION PERIOD:** Within 45 days from placement of NOA

8. LIQUIDATED DAMAGES CLAUSE

Time is the essence of the Work Contract. If the Contractor fails to complete the entire work by the scheduled completion date, ONGC may without prejudice to any other right or remedy available to it as under the Contract /Law:

8.1 Recover from the Contractor as ascertained and agreed Liquidated Damages and not by way of penalty, sum equivalent to ½ % of the Total Contract Price for each week of delay occurred or part thereof beyond the scheduled completion date subject to a maximum of 10% of the Total Contract Price even though ONGC may accept delay in Completion of work after the expiry of the Scheduled completion date.

AND/OR

- 8.2 Terminate the Contract or a portion or part of the Work thereof. ONGC shall give 7 days' Notice to the Contractor of its intention to terminate the Contract and shall so terminate the Contract unless during the 7 days' notice period, the Contractor initiates remedial action acceptable to ONGC.
- 8.3 In case the Contractor is unable to complete the work by the schedule completion date, it may request ONGC before expiry of the scheduled completion date, to allow further time for performance of the Contract indicating its willingness to pay the LD amount as agreed at 8.1 above. ONGC may at its discretion allow further time as requested by the Contractor with or without levy of LD.
- 8.4 The parties agree that the amount of LD provided herein is a genuine pre-estimate of the loss/damage which will be suffered on account of delay on the part of the Contractor and the said amount shall be payable on demand without there being any proof of the actual loss or damage caused by such delay/breach.
- 8.5 LD will be calculated on the basis of contract value excluding duties and taxes, where such duties/taxes have been shown separately in the contract.
- 8.6 The applicable GST on the LD shall have to be borne by the contractor. Accordingly, the liquidated damages shall be recovered from the contractor along with applicable GST.

- 9 Conditions applicable if the offer is from a Micro or Small Enterprises (MSE) registered with District Industry Centers or Khadi and Village Industries Commission or Khadi and Village Industries Board or Coir Board or National Small Industries Corporation or Directorate of Handicrafts and Handloom or any other body specified by Ministry of MSME.
- (i) If bidder is a Micro or Small Enterprises (MSE) registered with District Industry Centers or Khadi and Village Industries Commission or Khadi and Village Industries Board or Coir Board or National Small Industries Corporation or Directorate of Handicrafts and Handloom or any other body specified by Ministry of MSME, it shall submit copy of valid Registration Certificate,. The Registration Certificate should clearly indicate the monetary limit, if any and the nature of jobs/services for which the bidder is registered with any of the aforesaid agencies.

In case bidding MSE is owned by Schedule Caste or Schedule Tribe entrepreneur, valid documentary evidence issued by the agency who has registered the bidder as MSE owned by SC/ST entrepreneur should also be enclosed.

(ii) In case participating MSEs quote price within price band of L1+15%, such MSE shall be considered for award of contract by bringing down their price to L1 price in a situation where L1 price is from someone other than a MSE. In case of more than one such MSE qualifying for 15% purchase preference, the contract shall be awarded to lowest eligible MSE amongst the MSEs qualifying for 15% purchase preference.

Tendered items and services cannot be procured from multiple sources and are absolutely non splitable and non-dividable, PO/Contract shall be placed for supply and installation of 100% quantity to lowest eligible bidder, if any, amongst the bidders qualifying for purchase preference.

- 10.0 The bid along with all appendices and copies of documents (except copies of the documents required in physical form) should be submitted through ONGC's e-bidding engine, before the scheduled date and time for the tender closing. Such documents submitted through e-bidding portal should be as per requirements of the tender, valid and legally operative as on the date fixed for opening of bids. However, documents required in physical form should be received at the purchaser's office (as indicated in "Invitation to Bid") on or before the closing date and time specified for submission of bid through e-bidding portal.
- 11.0 The following document should be submitted in physical form in a sealed envelope superscribed as "Physical documents against e-procurement Tender Number DM1PL18001, opening on 26.06.2018 at 15.00 hrs.", on the same day of opening of tender document so as to reach to the purchaser's office (as indicated in Invitation to Bid)

on or before the closing date and time specified for submission of bid through e-bidding portal .

(i) The "Power of Attorney" or authorization, or any other document consisting of adequate proof of the ability of the signatory to bind the bidder, in original, when the power of attorney is a special "Power of Attorney" relating to the specific tender of ONGC only.

A notarized true copy of the "Power of Attorney" shall also be accepted in lieu of the original, if the power of attorney is a general "Power of Attorney". However, photocopy of such notarized true copy shall not be accepted.

UNDERTAKING/DECLARATION

We declare that neither we nor any of our allied concerns, partners or associates or directors or proprietors involved in any capacity, are currently serving any banning orders issued by ONGC debarring us from carrying on business dealing with ONGC.

I/We undertake to provide all the necessary compliances / invoice / documents required under GST legislation for enabling ONGC to avail Input tax (GST) credit.

Proforma for certificate regarding genuineness of documents

The bidder is required to give the following undertaking on the <u>company's letter head</u> and duly signed by the signatory of the bid:

"All the documents/certificates/information submitted by them against the tender are genuine. In case any of the documents/certificates/information submitted by the bidder is found to be false or forged, action as deemed fit may be initiated by ONGC at its sole discretion."

ACCEPTANCE OF TERMS & CONDITIONS OF THE TENDER

(To be signed (Manual or Digital) by the bidder)

We hereby confirm acceptance of all instructions and conditions of the tender document as well as the instructions contained in the web site etender.ongc.co.in for "Supply and installation of passive network infrastructure for New Computer Centre" against Tender No: DM1PL18001

Details of the Bidder

Name of the Bidder	
Complete Address	
Bank Details	
Name and Complete Address of the Vendor as per Bank	
Records	
Name &Complete Address of the Bank with Branch	
details	
Bank Account Number (indicate 'Core Bank Account	
Number', if any).	
IFSC / NEFT Code (11 digit code) / MICR code, as	
applicable, along with a cancelled cheque leaf.	
Permanent Account Number (PAN) under Income Tax	
Act;	
GST Registration Number	
e-mail address of the vendor / authorized official (for	
receiving the updates on status of payments).	

SCOPE OF WORK AND TECHNICAL SPECIFICATIONS

1. Existing Local Area Network

The existing network in ONGC, IRS comprises of two separate LANs - "Business Network" and "G&G Network". The nodes on the Business LAN facilitate SAP, Web Ice, Internet, Intranet, etc. while the newly segregated "G&G network" caters to E&P/EPINET data and related applications. The entire network has been established recently on OM3 OFC backbone.

2. Proposed Networking job at NEW COMPUTER CENTRE, IRS

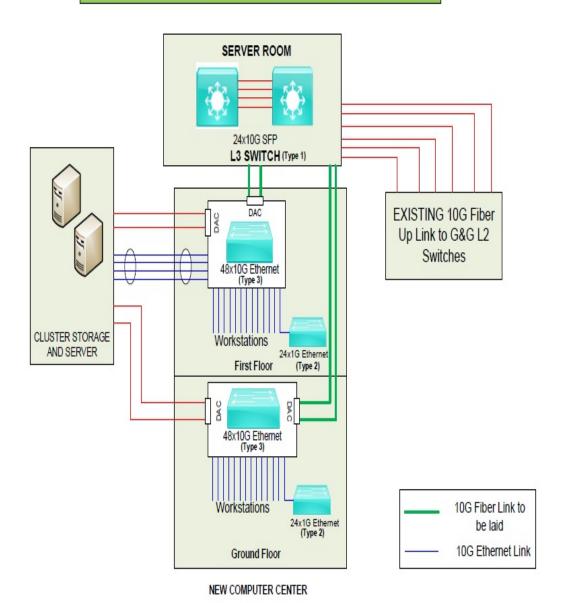
Structured LAN Cabling has to be carried out for the New Computer Centre Building which includes in general but not limited to Supply, installation, commissioning, testing of various passive components & their integration with the existing network as per Proposed Structured LAN Cabling, Description of Work, Bill of Materials & Works and Technical specifications mentioned elsewhere in this document. The newly constructed Computer Centre Building has few rooms in the Ground floor and few on the First Floor which will house around 50 nos. of workstations and Few PCs, printers, etc. on the designed modular furniture for the seating arrangement.

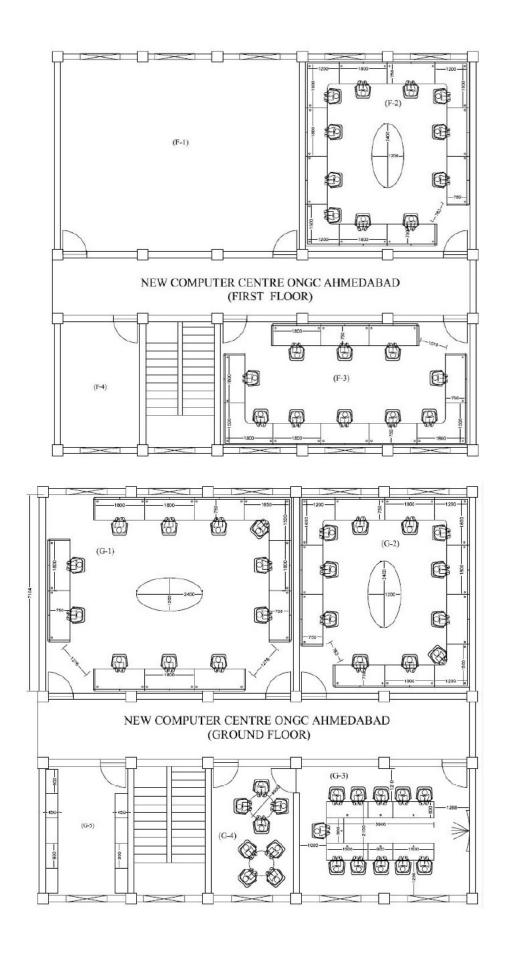
The vendor shall be required to provide all passive components with accessories as per BOM. Installation & Commissioning of the LAN cabling infrastructure shall be in accordance with the industry standards and supported by manufacturer and backed with certification / warranty. The Racks housing L2 & L3 Switches will be provided by ONGC for installation of LIU/Jack Panels. The vendor should ensure that the existing network functioning is not impaired during implementation any other passive components if required for completion of work shall be the responsibility of the vendor.

2.1 Broad Guidelines for Network cabling

2.1.1 The proposed LAN Cabling schematic and Furniture layouts for seating arrangement on the Ground and First Floor of the New Computer Building are given in the next few pages.

Network Cabling layout for New Computer Center





- 2.1.2 As depicted in the Network Cabling Layout, Laser Optimized Multimode Fiber (LOMMF) OM3 OFC cable shall be laid from the Layer 3 Core Distribution Switches at Server Room in Management Wing to Access Switches on First Floor and Ground Floor of New Computer Centre. PVC conduit pipes were already laid during the flooring of the New Computer Centre building in accordance with the Furniture layouts (depicted in above diagrams) for Ground and First Floor. The UFTP Cables shall be laid from the Access switches through these conduit pipes and finally routed to the I/O's in the modular furniture to provide connectivity to different user workstations.
- 2.1.3 The entire LAN cabling work should be carried out as per the broad Furniture layout shown in the diagram. Any changes in nodes, cabling, positioning of racks, switches etc. due to change in sitting arrangements or other reasons thereof shall be accommodated at the time of job.
- 2.1.4 OFC Cabling between the two racks, one on Ground Floor and the other on First Floor of New Computer center shall also be done, if required, in consultation with ONGC representative for use in case of emergency, when the main cable is cut or is faulty.
- 2.1.5 Cat 6A UFTP cable shall be laid in already laid PVC conduits in the floor and then shall be terminated on jack panels on switch side and I/O at user's side.
- 2.1.6 The LAN cabling works must be carried out following structured cabling methodology with proper labelling of cables at ends, crimping of cables, fixing of patch panels, and proper laying of LAN cables in PVC conduits or raceways along with necessary activities. The cabling/crimping must follow TIA/EIA 536-C standards or above.
- 2.1.7 OFC should be laid in a secure and safe manner to provide 100% protection from damage caused by rodents or other damage causing entities.
- 2.1.8 The vendor will supply and install LIU including fixing of the adapter plate and terminating pigtails in the LC modules of the adapter plate and splicing the pigtails with the cores of the optical fiber cable terminating in that LIU. Proper labelling of the adapter plate shall be carried out including dressing and labelling of the fiber cable and fiber patch chords terminating in the LIU. Dust plugs will be provided and maintained on all spare Fiber outlets and patch panel ports to protect connections from contamination.
- 2.1.9 The vendor will supply and install Jack panels including termination of the CAT 6A cable in compliance with T-568 C standard. Proper labeling shall be done on the jack panel by mentioning the number of the node (I/O box) from which the CAT 6(A) cable has been laid. The vendor will install horizontal cable manager and dressing of the high density patch cords coming from jack panel to layer 2/ layer 3 switch.
- 2.1.10 The vendor will lay the OFC cable through HDPE conduits without any naked spaces in between by using necessary accessories so that the cables are not exposed.
- 2.1.11 The gap present at both ends of the PVC pipe containing the UFTP cables should be sealed by using suitable accessories.
- 2.1.12 The gap between the PVC pipe and the casing capping should be filled by using the flexible PVC conduit to make sure that the UTP/STP cable are not exposed.
- 2.1.13 The quantity specified in the BOM is an estimated quantity, the actual quantity required at

- the site may vary depending upon the actual requirement.
- 2.1.14 The vendor is required to ensure that structured cabling work done under this contract shall be suitable for working for 10 years.
- 2.1.15 The vendor is responsible to repair/replace any existing cables & existing pipes, if damaged during the LAN cabling works at his cost and labor with prior approval of ONGC.
- 2.1.16 All the supplied components by the vendor shall be covered under standard OEM warranty.

3. Testing & Documentation

- 3.1.1 The vendor shall demonstrate to ONGC the working of LAN structured cabling including passive components. To carry out the necessary tests on the installed cable network, the required tools/test equipment shall be arranged by the vendor.
- 3.1.2 In case, during the testing any passive components found not working, the same shall be repaired/replaced by the vendor.
- 3.1.3 The vendor has the responsibility to submit OFC cabling routing path and layout diagram of UFTP cables & I/O points.

4. BILL OF MATERIAL WITH TECHNICAL SPECIFICATIONS AND LIST OF SERVICES

The Tentative Bill of Material for the Networking job of New Computer Center is as follows:-

Sr. No.	Material Description	Qty	Unit
1	6 Core Multimode Outdoor Armoured OFC Cable (OM3) with HDPE	500	m
	jacketing, Preferred Make :- R&M, Belden, Finolex, Panduit		
2	12 port Multimode OFC Fully Loaded LIU with LC Coupler	3	No.
	Preferred Make :- R&M, Belden, Panduit, Molex	3	1,01
3	2 meter LC - LC OM3 MM OFC Duplex Patch Cord	20	No.
	Preferred Make :- R&M, Belden, Panduit, Molex	20	110.
4	4 pair CAT 6A UFTP LSZH 650 MHz cable	4000	m
	Preferred Make :- R&M, Belden, Panduit, Molex	4000	***
5	CAT 6 cable LSZH Jacket	305	m
	Preferred Make :- R&M, Belden, Panduit, D-link,etc.		111
6	Cat 6A 24-port loaded, Jack Panel, size 1U	5	No.
	Preferred Make :- R&M, Belden, Panduit, Molex, D-link	3	110.
7	Cat6A Patch Cords - 1 Mtr	80	No.
	Preferred Make :- R&M, Belden, Panduit, Molex	80	110.
8	Cat6A Patch Cords - 2 Mtr	80	No.
	Preferred Make :- R&M, Belden, Panduit, Molex	80	110.
9	CAT 6A 10 G Information Outlet	80	No.
	Preferred Make :- R&M, Belden, Panduit, Molex	80	110.
10	CAT 6A Dual Port Face Plate with dust cover protection	80	No.
	Preferred Make :- R&M, Belden, Panduit, Molex	00	INO.
11	Back Box for I/O Termination	80	No.
	Preferred Make :- R&M, Belden, Panduit, Molex	80	110.
12	32mm HDPE Pipe with Accessories of ISI Marked Make	300	m

The List of Services/Works required are:-

Sr. No.	Service Description	Qty	Unit
1	Laying Of 32mm HDPE Pipe on walls	300	m
2	Laying of Optical fiber cable in HDPE/ PVC Pipe	500	m
3	OFC splicing	48	No. of cores
4	LIU Fixing	3	No.
5	OTDR Testing	48	No. of cores
6	Laying of UFTP CAT6A Cable in conduit pipe	4000	m
7	CAT6A 24 Port Patch Panel installation and routing	5	No.
8	Termination of Cat 6A cable on the information outlet including fixing of Faceplate and SMB at user end	80	No.
9	Termination of CAT6A Cable at rack end	80	No.
10	Labeling and ferruling charges at both ends	80	No.
11	RCC cutting and covering	2	No.
12	Core cutting	2	No.
13	Excavation and Backfilling of Soft Soil 3ft Deep and 1.5ft Wide	20	m
14	Excavation and Backfilling of RCC/PCC road. Backfilling of soil and repairing	20	m

The material quantities mentioned in Bill of Material are approximate. Payments would be made on actual material deployed and actual services undertaken by the vendor for completion of work.

The vendor would have to get the measurements done in presence of ONGC representative for actual installed material at the time of execution.

5. SCHEDULE OF WORK

The vendor will complete the entire work within scheduled time of 40 days from the date of NOA/Work Order:

- (i) Supply of the structured LAN cabling components as per Bill of Materials (BOM) and Technical Specifications.
- (ii) Installation, commissioning, testing of the structured LAN cabling after connectivity with the L2/L3 switches

6. PAYMENT TERMS

Payment shall be made by Company after work completion and duly verified /certified by Infocom representative. Work completion Certificate shall be issued by Head-Infocom or his authorized representative. Payments would be made on actuals.

7. Special Conditions of the contract

- 7.1 Any other minor work/ supply required for work completion as per standard OEM practices, though not mentioned above shall be carried out / supplied without additional charges to ONGC.
- 7.2 Quality of material shall be consistent with accepted standard OEM practices.
- 7.3 The vendor has to supply, Install, commission and test all the offered items and accessories along with their interconnectivity / integration for fulfilling technical specs and SOW.

- 7.4 All accessories not manufactured by vendor should be of reputed make. Where ONGC feels that the material is not confirming to requisite standard, ONGC reserves right to reject the material without assigning any reasons and this will be binding to the vendor.
- 7.5 Pipes, RCC / core-cuttings etc. will be back-filled and restored to the original condition immediately after laying of the conduits / cables. The vendor shall plug conduits and entrance holes where the cabling has been installed with suitable material.
- 7.6 The contractor should take all precautions during cable laying and avoid any damage to personnel and property of ONGC. Any damage due to carelessness of the contractor personnel will be the sole responsibility of the contractor and cost of damage shall accordingly be recovered.
- 7.7 Clarifications regarding the job shall be obtained from Engineer-in-charge or his authorized representative. Any instruction / clarification provided by Engineer in charge or his authorized representative shall be final and binding on the contractor.
- 7.8 The contractor shall arrange to obtain all necessary entry permits for personnel for the iob.
- 7.9 All tools and equipment required to carry out the contract job shall be arranged / provided by the contractor.
- 7.10 The contractor must arrange safety footwear and other safety devices for the laborers, the safety shall be sole responsibility of the contractor.
- 7.11 The contractor shall provide security for all the materials stored in his custody at the site.

 ONGC will not entertain any claim for loss of material.
- 7.12 The contractor need to clear the site in all respect from surplus/ leftover materials brought for the job after completion of the work.
- 7.13 Completion certificate will be issued by the engineer in charge or his authorized representative after satisfactory completion of the entire job as per scope of work.
- 7.14 Full and final payment will be made after successful completion of the job. i.e. after issue of completion certificate by EIC.
- 7.15 The job shall be attended by personnel having adequate experience in performing similar iobs.
- 7.16 ONGC will not own any liability towards the workman engaged by the contractor.
- 7.17 For execution of contract, it is contractor's responsibility to arrange for all necessary tools/ testing equipment including safety kit to carry out the jobs in time.
- 7.18 Security pass: Contractor has to arrange ONGC security pass for entry of their personnel to be engaged for job prior to the start of execution as required by IRS, ONGC security.
- 7.19 The contractor shall comply with all central, state and local government regulations applicable to the work and ensure that the personnel engaged under this contract follow all safety and security requirements of ONGC.

8. Project Warranty

The project shall be covered under One-year comprehensive onsite warranty in addition to standard OEM warranty of material supplied for LAN infrastructure.

Technical Specifications of UFTP/ OFC cables, components and accessories

The minimum specifications for UTP and OFC cable, components and accessories to be supplied are as mentioned should be as per Table 1.

Table 1

1.0	Copper UFTP Cable, Components and Accessories:
	The structured cabling shall meet TIA/EIA-568-C.2 Category 6A and ISO/IEC 1801 Class E _A performance requirements.
	Shall meet IEEE 802.3 and 10 Gigabit Ethernet over UTP requirements.
	The 4 Pair-shielded 100 Ohm installation cable with individual pair foiled with AL, suitable for transmission frequencies of up to >650 MHz, 4 x 2 (AWG 23). Compliant with standards ISO/IEC 11801 standards, 10GBASE-T in acc. with IEEE 802.3™, tested and certified. Should be certified (by independent test i.e. 3P/Delta lab) for 10G Gigabit Ethernet Performance up to 100 meters, 23 AWG solid bare copper. Cable shall be LSZH/RoHS compliment. Category 6A patch cords shall be ETL/UL Listed/Certified and LSZH/RoHS compliant,
	Cat 6A Patch Cord- Should have RJ-45 plugs with matching color molded boot at both the ends. It should be factory crimped and packed. Patch cord should support network line speeds up to 10G. The conductor should be stranded copper for flexibility of the patch cable and should be RoHS compliant.
	The RJ-45 type information outlets (in single and dual form) should support 10 Gigabit Ethernet.
	Faceplate of the outlets should have shutter to prevent dust and dirt getting into the outlet for single and dual outlets. The I/Os must have clear label for identification.
	The RJ-45 outlets should have integral hinged dust cover if not available on the face plate and suitable wire management unit for cable entry to protect against any loose joints, strain etc.
	The Work Area Patch cord and Mounting Cord should have factory fitted snag less boots to maintain the bend radius at both ends.
	The Patch Panel (wire termination module) should be UL or ETL Certified to meet EIA/TIA 568-B/C and IEC 11801 Class E_A standard. The panel shall fit in 19" rack and have 24 ports.
2.0	Optical Fiber Cable, Components and Accessories:
	The Fiber cable shall be multimode Outdoor armored 850 nm, laser-optimized 50/125 µm, OM3 type with 6 cores. It should conform or exceed 10 Gigabit performance up to 800m with suitable terminations and connectors. Cable shall meet IEEE 802.3ae 10 Gigabit Ethernet over Fiber requirements.
	All patch cords shall conform to EIA/TIA-568C.3 and ISO/IEC-11801. Patch cords shall have Factory Terminated LC connectors at both the ends.
	The OFC Trunk cable shall be ETL/UL Listed/Certified and LSZH/RoHS compliant.
	The LC couplers and pigtails should also meet IEC standards

PRICE FORMAT

SUPPLY OF MATERIAL

Sr. No.	Item Description	Qty	Unit	Offered Make and model	Basic Rate Per Unit (Rs.)	GST (applicable %age) (Please mention clearly)	Total cost
1	6 Core Multimode Outdoor Armored OFC Cable (OM3)	500	m				
2	12 port Multimode OFC Fully Loaded LIU with LC Coupler	3	No.				
3	2 meter LC - LC OM3 MM OFC Duplex Patch Cord	20	No.				
4	4 pair CAT 6A UFTP LSZH 650 MHz cable	4000	m				
5	CAT 6 cable LSZH Jacket	305	m				
6	Cat 6A 24-port loaded, Jack Panel, size 1U	5	No.				
7	Cat6A Patch Cords - 1 Mtr	80	No.				
8	Cat6A Patch Cords - 2 Mtr	80	No.				
9	CAT 6A 10 G Information Outlet	80	No.				
10	CAT 6A Dual Port Face Plate	80	No.				
11	Back Box for I/O Termination	80	No.				
12	32mm HDPE Pipe with Accessories	300	m				
				Total cost of material including	g GST (1 + 2 + 3 +	+ 12) - "A" →	

Packing and Forwarding Charges for above material , if any, "B" \rightarrow

INSTALLATION CHARGES

Sr. No.	Service Description	Qty	Unit	Per Unit Basic price (Rs.)	GST (applicable %age) (Please mention clearly)	Total cost (Rs.)
1	Laying Of 32mm HDPE Pipe on walls	300	m			
2	Laying of Optical fiber cable in HDPE/ PVC Pipe	500	m			
3	OFC splicing charges	48	No. of cores			
4	LIU Fixing charges	3	No.			
5	OTDR Testing Charges	48	No. of cores			
6	Laying of UFTP CAT6A Cable in conduit pipe	4000	m			
7	CAT6A 24 Port Patch Panel installation and routing	5	No.			
8	Termination of Cat 6A cable on the information outlet including fixing of Faceplate and SMB at user end	80	No.			
9	Termination of CAT6A Cable at rack end	80	No.			
10	Labeling and ferruling charges at both ends	80	No.			
11	RCC cutting and covering	2	No.			
12	Core cutting	2	No.			
13	Excavation and Backfilling of Soft Soil 3ft Deep and 1.5ft Wide	20	No.			
14	Excavation and Backfilling of RCC/PCC road. Backfilling of soil and repairing	20	No.			
15.	Any other Miscellaneous charges					
	Total cost of	installatio	n including	GST (1 + 2 + 3 +	······+ 14) - " C" →	

LUMP-SUM CHARGES (TOTAL OF "A"+ "B"+ "C" ABOVE) →

Note:

- 1. Rates should be quoted on FOR Destination, ONGC, IRS, Ahmedabad-380005 basis.
- 2. Discount: Bidders are advised not to indicate any separate discount. Discount, if any, should be merged with the quoted prices.
- 3. The rates must be quoted in figures as well as in words without any cutting or overwriting. In case any discrepancy in the rates quoted in figure and words, the rates quoted in words shall be considered as final and authentic.
- 4. NOA/ Work Order will be issued to the bidder in case the bid has been determined to be in full conformity to the bid documents and has been determined as the lowest evaluated bid as per the evaluation criteria, economically feasible and responsive.
- 5. Payment terms:
 - a) Payment shall be made by Company after work completion and duly verified /certified by Infocom representative. Work completion Certificate shall be issued by Head-Infocom or his authorized representative. No advance payment will be made.
 - b) Payments would be made on actuals.
 - c) 100% payment will be made within 21 calendar days from the date of receipt of clear and undisputed invoice/bill subject to satisfactory Inspection at Destination by Indentor & QAD.
 - d) The invoice/bill is to be raised in the name of "Manager (F&A), I/C-Pre-audit, IRS, ONGC, Ahmedabad".
 - e) The invoice/bills along with copy QCC issued by ONGC is to be submitted in a sealed cover addressed to "IMS Desk, ONGC, IRS, Ahmedabad-380005". The following information should be given on the envelop:
 - Vendor Code
 - NOA No.
 - Invoice No. & date
 - E-mail ID of the vendor where tracking number will be sent.

Signature

(Seal of bidder)