

AIT/0810/83/2017-18/CQ/Proj

Date : 14 Feb 18

Due date : 28 Feb 18

**CALL FOR QUOTATION : PROVISION OF REDUNDANT 10G OPTIC FIBRE CONNECTIVITY AT OLD BOYS HOSTEL**

1. This Institute is interested in providing Redundant 10G Optic Fibre Connectivity at Old Boys Hostel as per the following specification:-

| Sr No | Item Descriptions   | Make /OEM   | UoM  | Qty | Rate Rs | GST Rs | Total Rs |
|-------|---|---|------|-----|---------|--------|----------|
| 1.    | 50 $\mu$ , 6 core <b>50/125<math>\mu</math></b> Outside Plant Cable- ECSS armored, Multi mode OM4 corrugated steel-tape armored, loose tube, gel filled cable as per ISO/IEC-11801              | TYCO, Comm scope, Panduit (Pan net ), Siemon, Legrand | Mtrs | 500 |         |        |          |
| 2.    | Fiber Optic LC style fully loaded Patch Panel (FOPP), 19" Rack Mount with 24F nos. of OM4 50/125 $\mu$ Fully Loaded with Pigtails, Splice tray, loaded with adapter plates & splice protectors. | TYCO, Comm scope, Panduit (Pan net ), Siemon, Legrand | Nos  | 01  |         |        |          |
| 3.    | Fiber Optic LC style fully loaded Patch Panel (FOPP), 19" Rack Mount with 12F nos. of OM4 50/125 $\mu$ Fully Loaded with Pigtails, Splice tray, loaded with adapter plates & splice protectors. | TYCO, Comm scope, Panduit (Pan net ), Siemon, Legrand | Nos  | 01  |         |        |          |
| 4     | Fiber Optic Patch Cable (LC-LC), 3 Mtrs. Long, ISO/IEC-11801-OM4 50 $\mu$ Duplex, LSZH  | TYCO, Comm scope, Panduit (Pan net ), Siemon, Legrand | Nos  | 04  |         |        |          |
| 5.    | LC to MPO Patch Cord  | TYCO, Comm scope, Panduit (Pan net ), Siemon, Legrand | Nos  | 02  |         |        |          |
| 6.    | HDPE Pipe 1 inch  | -   | Mtrs | 450 |         |        |          |
| 7.    | Fibre Laying  | -   | Mtrs | 450 |         |        |          |
| 8     | Splicing Charges  | -   | Nos  | 12  |         |        |          |

|                         |  |   |     |       |  |  |  |
|-------------------------|--|---|-----|-------|--|--|--|
| 9                       | 9 U Rack with STD Accessories (1-PDU 5 socket, 1-metal clamp, 1nos-Hardware packet | - | Nos | 01    |  |  |  |
| 10                      | Misc items - Shedder 1/2" , Screw Box, Cable Tie                                   | - | Nos | 1 JOB |  |  |  |
| 11.                     | Commissioning, Installations and Labours   | - |     | 1 JOB |  |  |  |
| <b>Total</b>            |  |   |     |       |  |  |  |
| <b>Amount in Words:</b> |  |   |     |       |  |  |  |

**Important Note :-**

(A) Digging and construction of chambers for laying of Fibre Optic cable will be done by AIT itself.

(B) Fibre Optic Cable should meet minimum specifications as given below :-

- Water blocked E-glass yarn construction to prevent water absorption and consequent damages.
- Unitube type of cables.
- Suitable for using in the building shaft and outdoor laying
- Comply standards ANSI/TIA-568-C.3 / Telcordia GR-409 / EN 50173
- Meet MAX.LINK LENGTH FOR 10 GBit/s @ 850nm (10GBase-SR & SW)- 550 Mtrs / @ 1300nm (10GBase-LX4)- 300 Mtrs.
- Meet optic attenuation parameters - @ 850nm  $\leq 2.7$  dB/Km (MAX) , @ 1300nm  $\leq 0.7$  dB/Km (MAX)
- Tensile load should be 1250 Newton or higher and crush resistance should be 3000 Newton or higher
- Operating Temperature, deg. – 20 to + 70 °C
- Overall Cable diameter (Nominal) should not exceed 10 mm
- Cable Weight (Nominal ) Should not exceed 100 Kg/Km
- Fiber cable shall be RoHS Compliant

(C) Fibre Optic Patch Panel (FOPP) should meet minimum specifications as given below :-

- ISO/IEC-11801-OM4 Pigtailed with LC Type Connectors.
- All accessories including coupler plates pre-loaded with duplex LC couplers (OM4), pigtailed for terminating fibers on the FOPP
- Front Patching Type, 1U high and rack mountable on standard 19" rack with mounting arrangements
- Supplied with fusion splicing sleeves for termination of fiber.
- Made of powder coated steel or aluminum
- Slide-out type drawer enclosure for Easy access to splicing tray, Easy access to back side of the connector and have labels for better identification
- Trays which facilitates easy Fiber management and greater access during installation and rework
- All necessary accessories for fiber management inside such as Fiber guides, radius controls, splice protector sleeves & secure tie downs within the FOPP

(D) Fiber Optic Patch Cable (FOPC) should meet minimum specifications as given below :-

- Shall conform to EIA/TIA-568C.3 and ISO/IEC-11801
- Duplex Multi Mode Fiber Optic Patch Cords OM4 50 $\mu$
- Tight buffer with Zirconia ferrule
- LC Connector connectors at both the ends
- Factory terminated and packed.
- RoHS Compliant
- Low-Smoke & Zero-Halogen

2. Please send your lowest quotation in two bid system format (**separate sealed envelops for Technical Bid & Commercial Bid enclosed in a sealed single envelop**) addressed to Director AIT so as to reach this institute on or before 28 Feb 18. Late quotations shall not be considered.

3. Envelope should be subscribed as '**PROVISION OF REDUNDANT 10G OPTIC FIBRE CONNECTIVITY AT OLD BOYS HOSTEL**'

5. **Terms and Conditions.**

(a) The price quoted should be inclusive of all taxes and delivery at Army Institute of Technology, Dighi, Pune-411015.

(b) Discount offered if any, should be indicated as percentage of rates quoted, separately.

(c) Payment will be made after completion of work and on verification by a Board of Officers detailed by AIT, that the work is satisfactory.

Sd/-xxx  
(KE Vijayan)  
Col (Retd)  
Jt Director  
for Director