

By U.P.C.

Administration of
Dadra and Nagar Haveli, U.T.,
Electricity Department,
Silvassa.

No.DNH/ELE/DIV-II/59/10/833

Date:- 29/07/2010

C O R R I G E N D U M

The Tender for Establishment of 66/11, 2x15 MVA Sub-station at village Kala in the UT of DNH was invited vide this Office Tender Notice No. 06/2010-2011/622, dtd.10/06/2010, which is extended up to 11.08.2010. The following corrigendum therein may please be read:-

Item No.I

A) Item No.I (66/11kV Kala Sub-station)

1. General technical requirement of Control & Relay panel has been mentioned in the tender documents at 14 - Section-II & 15 - Section-II. Considering the requirement and specification in 14 - Section-II & 15 - Section-II, the Bidder has to design and incorporate the above requirement. If any addition required, may be suggested and mentioned separately. The design of Control & Relay panel preferably as per approved design of SEB's, which will be approved by the department.
2. General technical requirement with specification of 11kV Indoor VCB has been mentioned in the tender documents at 19 - Section-II, 20 - Section-II & 21 - Section-II. Further, total requirement of 11kV VCB is 11 Nos., which includes 2 Nos. of incomer, 8 Nos. of Outgoing feeders and 1 No. Bus-coupler panel. The same has been also mentioned in the Price Schedule at Sr. No.30.
3. Technical specification of 100-150-200/1/1/1 A Current Transformer is as under.

3.1 SCOPE:

- 3.1.1 This section covers the specific technical requirements, climatic and Isoceraunic conditions and systems particulars for which current transformers shall be offered as per the general technical requirements given under section - I of this specification and the schedule of requirements specified herein for various substations.

3.2 CLIMATIC & ISOCERAUNIC CONDITIONS:

3.2.1 The climatic conditions, under which the equipment shall operate satisfactorily are as follows:

- a) Maximum ambient temperature of air in Shade (C) 50°C
- b) Minimum ambient temperature of air in shade (C) 4°C
- c) Maximum daily average ambient temperature (C) 40°C
- d) Maximum yearly average ambient temperature (C) 30°C e)
- Maximum relative humidity (%) 95% f)
- Average number of thunderstorm (days / annum). 15
- g) Average annual rainfall (cm) 150 cm.
- h) Maximum wind pressure (kg/Mtr²) 150 kg/Mtr²
- i) Height above mean seal level (Mtrs) Not exceeding 1000M

3.2.2 All equipments offered shall be suitable for continuous satisfactory operation at the extended primary current of 120 % of full rated capacity, under the above climatic conditions.

3.2.3 Since the substations may be near seashore or industrial area, the equipment offered shall be suitable for heavily polluted atmosphere.

3.3 SYSTEM DETAILS:

Nominal system voltage	66 KV
Maximum rated voltage	72.5 KV
Minimum rated voltage	60 KV
Frequency	50 Hz.
Number of phases	3
Neutral earthing	Solidly Earthed

3.4 TYPE & RATING OF CURRENT TRANSFORMER:

3.4.1 The 66 KV Current transformer shall have the rating as given below:

- 1) CT Ratio a) 100-150 -200 / 1-1-1 A
- 2) Core Three

3) Purpose	Core -1 Core -2 Core -3	Metering Relaying Differential
4) Rated burden (VA) (Lowest Ratio) (at minimum tap)	:	15 (Core -1) 15 (Core -2) --- (Core -3)
5) Class of accuracy	:	0.5 (Core - 1) 5 P (Core - 2) P S (Core - 3)
6) i) Rated accuracy limiting factor (ALF)	:	10 at minimum ratio for all 66 KV CTS
ii) Instrument security factor. (ISF)	:	5 or less at minimum ratio for all 66 KV CTS.
7) Minimum knee point voltage (at highest ratio)	:	600V for (a) & (b) 650V for (c) & (d) 950V for (e)
8) Exciting current at knee point voltage	:	As per IS: 2705 (latest edition)
9) Resistance of secondary winding	:	As per IS: 2705 (latest edition)
10) 1.2/50 microsecond lightning impulse withstand voltage (kV peak)	:	350
11) Power frequency withstand voltage for one minute (kV rms)	:	140
12) Short time with stand current (kA) (corresponding to fault level in MVA for 3.0 sec.)	:	31.5
13) Minimum total for creepage distance for heavily polluted atmosphere: (mm)	:	1810

2.4.2 The ratings specified shall be guaranteed at all primary connections. Any changes in the particulars of the CTs that may be required for the protective relays (protective relays being procured separately) actually ordered shall have to be met by the supplier of

CTs without any extra cost.

2.4.3 All current transformers shall meet the requirements of this specification for $\pm 3\%$ variation in rated system frequency of 50 Hz.

2.4.4 EARTH QUAKE & WIND DESIGN LOADS:

Each CT, including its supporting structure shall be designed to withstand repeated earthquake acceleration of 0.08 x 2g with wind loads of 150 kg/m² on the projected area (non-simultaneous) without damage to component parts and without impairment of operation.

-
4. At present the department is not providing SCADA system in the Sub-station and the same may be regretted.
 5. In 14 - Section-II - 66kV Control & Relay Panel and Point ii) of e) Terminal Block of Clause No. 28.15 Control Cabinet of Clause No.28.5, - POWER TRANSFORMER PRINCIPLE PARAMETERS, "**Communication**" may be read as "**Telemetric Data transfer using external modem**".
 6. The size of Control Room is 30 Mtrs. x 12 Mtrs. including 2 Mtrs. Verandah and Switch Yard is 65 x 50 Mtrs, Security cabin 3x3 Mtrs.
 - a. Boundary wall of Sub-station having height of 2 Mtrs. for Sub-station area of approximate 125x90 Mtrs.
 - b. Internal road of Sub-station should be RCC concrete of about 150 running Mtrs. with 6 Mtrs. in width.
 - c. Bidder has to provide 6" Φ bore well for water supply arrangement of Sub-station with required size of overhead storage tank.
 7. The bidder has to design and provide layout of the cable trench suitable to the proposed Control room with switch yard and as per site situation. The general size of cable trench will be 1000x600 mm with two part GI coated cable tray of approximate 750 running Mtrs. in length.
 8. The clause No. **16.1** of "**16.0 FINANCIAL RESOURCES & EXPERIENCES**"

"The tenderer is requested to submit a statement of facts in details as to his previous experiences in performing similar comparable work and of the business and technical organization financial resources and manufacturing facilities available. The tenderer is also further requested to furnish the list of important electrical Sub Station laying or underground distribution system for which materials were supplied and / or erected in India or elsewhere and also testing facilities available at contractor's work. The details of list of similar work in hand should also be furnished in clause 28 and N.I.T. Form No.6."

May be read as

"The tenderer is requested to submit a statement of facts in details as to his previous experiences in performing similar comparable work and of the business and technical organization financial resources and manufacturing facilities available. The tenderer is also further requested to furnish the list of important electrical Sub Station laying or underground distribution system for which materials were supplied and / or erected in India or elsewhere and also testing facilities available at contractor's work. The details of list of similar work in hand should also be furnished."

9. In the Clause 10.2 of **10. Bidding** under *Section - I, General Terms & Condition* an addition of point k) will be as under.
 - k) 1% of labour welfare cess to be deposit by successfully bidders on works items.
10. Point A - 1 "66/11.55KV, 15MVA Transformer including oil filtration." of Schedule of Work of Item No.1 may be regretted.

The other terms & condition will remain unchanged.

- Sd -

Superintending Engineer (Power),
Electricity Department,
Dadra and Nagar Haveli,
Silvassa.

To,

All suppliers as standard list available in department.

- The District Informatics Officer/PSA, National Informatics Center, Silvassa for information and publicity.
- The Chief Publicity Officer, Dadra & Nagar Haveli, Silvassa for publish in Hindi, Gujarati & English News paper for vide publicity.
- The Editor Tender Trade, 18, 2nd Floor "KADAMBAM" Opp. Govt. Press, Near Kothi Char Rasta, VADODARA-1 for publication of the Tender Notice.