Department of Electrical Inspectorate Office of the Chief Electrical Inspector to Government of Kerala

No.B1/33727 / 2000 / CEL

Thiruvananthapuram Dated: 22 / 7 / 2002

From

The Chief Electrical Inspector

To

The Deporty Chief Electrical Imspector
Ermerten lem.

Subject:

Approval of Unitised Sub-Stations -regarding.

Reference:

Minutes of Electrical Inspectors Conference

As per para 2.2 of the combined minutes of the Zonal Electrical Inspectors Conference held at Thiruvananthapuram and Kozhikode, schemes involving Unitised Sub-stations will be approved by the Chief Electrical Inspector. It is now decided that schemes of Unitised Sub-stations with transformer capacity below 500kVA will be approved from the Elistrica Offices. Inspection and issue of sanction for energisation of Unitised Sub-stations will be as a second elegation of power issued by the Government.

Guidelines for issuing approval and for conducting inspection and issue of sanction for energisation is appended herewith. The guidelines should be followed strictly.

The receipt of this letter shall be acknowledged.

Yours faithfully,

For Chief Electrical Inspector.

Guidelines pertaining to Unitised Sub-Stations.

(Appendix to letter no: B1-33727 /2000 /CEI / dated 22.7.2002)

- Transformer shall be of dry type
- Switchgears attached to the unit shall not be oil filled type.
- Transformer shall be of approved make, If not, CPRI / ERDA test certificates for dynamic short circuit current and impulse voltage withstand capability shall be called for.
- 11kV ABSF Unit attached to the unit shall be of approved make. If not CPRI/ERDA test certificates for short circuit current and impulse voltage withstand capability shall be called for.
- Transformer and control gears in the Unitised Sub-Stations shall be clearly segregated using metallic / FRP barriers.
- Earthing switch if any attached to the 11kV ABSF. Unit shall be at the outgoing side. This
 earthing switch and the 11kV ABSF. Units shall be properly interiocked to prevent accidental
 closing of earthing switch when ABSF Unit is in the ON position.
- There shall be proper interlocking to prevent opening of enclosure of the unit when the 11kV control gear is in the 'ON position.
- There shall be metallic / FRP barrier between supply incoming live parts and HRC fuse units in ABSF. Unit.
- 9. The incoming supply shall meterably be connected to the fixed contact of 11kV ABSF Unit.
- The interconnection between transformer and control gear shall be with rigid strips of adequate normal current rating and snort-time current rating
- Phase to phase clearance of 11kV interconnecting strips shall be minimum 13cm and phase to earth clearance shall be minimum 8cm
- 12. 11kV control gear and tap changer of the transformer shall be properly interlocked to prevent changing of tap position when 11kV control gear is in the ON position
- If potential transformer is provided in the unit, separate chamber shall be provided for housing the same.
- Seal off busings shall be provided when 11kV buses passes from one chamber to another chamber.