

Newport Skills Centre IT Room

CLIENT: VicTrack

WORKS: Switchboard replacement and
Earthing Upgrade

Date: March 2014



Scope of Works

- Various electrical works were required at new Skills center demountable building.
- Client wanted immediate changes from scope to make layout and operation more practical.
- Review plans and requirements, make recommendations and redraft scope of works

The Challenges

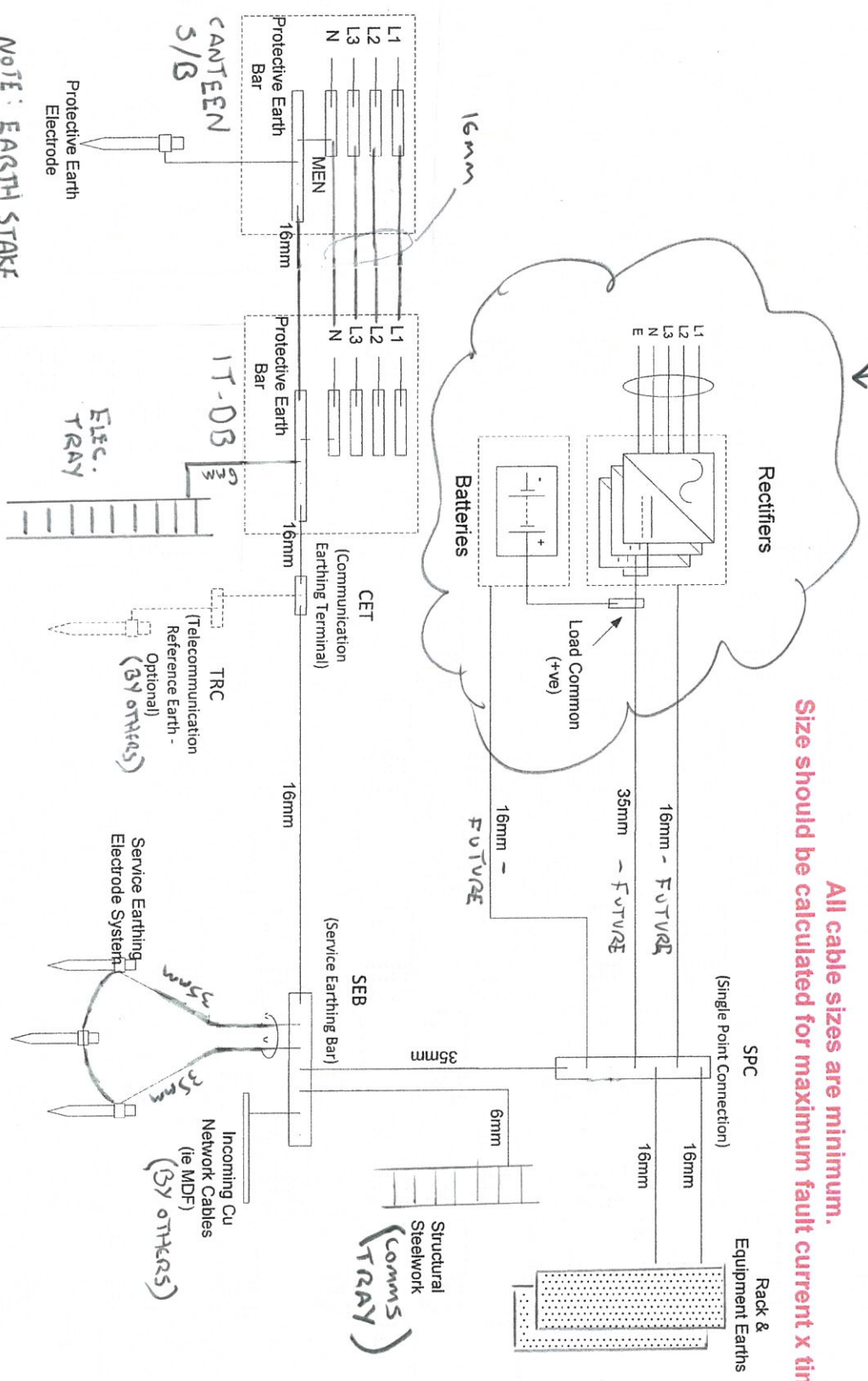
- To advise and recommend appropriate works as required too provide electrical services and adequate protection to new IT skills center at Newport.
- Revise earthing system to make more practical and cost effective for client.
Recommended:

- 16mm earth from canteen main switchboard to new IT Room switchboard (no separate CET)
- 16mm earth from IT room switchboard to SPC (Comms Equipment Earth Bar)
- 3x earth electrodes (still requires civil contractor for installation)
- 35mm earth from Earth Electrodes directly to SPC bar
- 16mm earths from SPC to Equipment Racks (5)
- 6mm Earth to bond cable trays (2)

Earthing Schematic

All cable sizes are minimum. Size should be calculated for maximum fault current x time

Potential Future Stage



NOTE: EARTH STAKE & MEN POINT MAY BE SITUATED AT UPSTREAM SWITCHBOARD