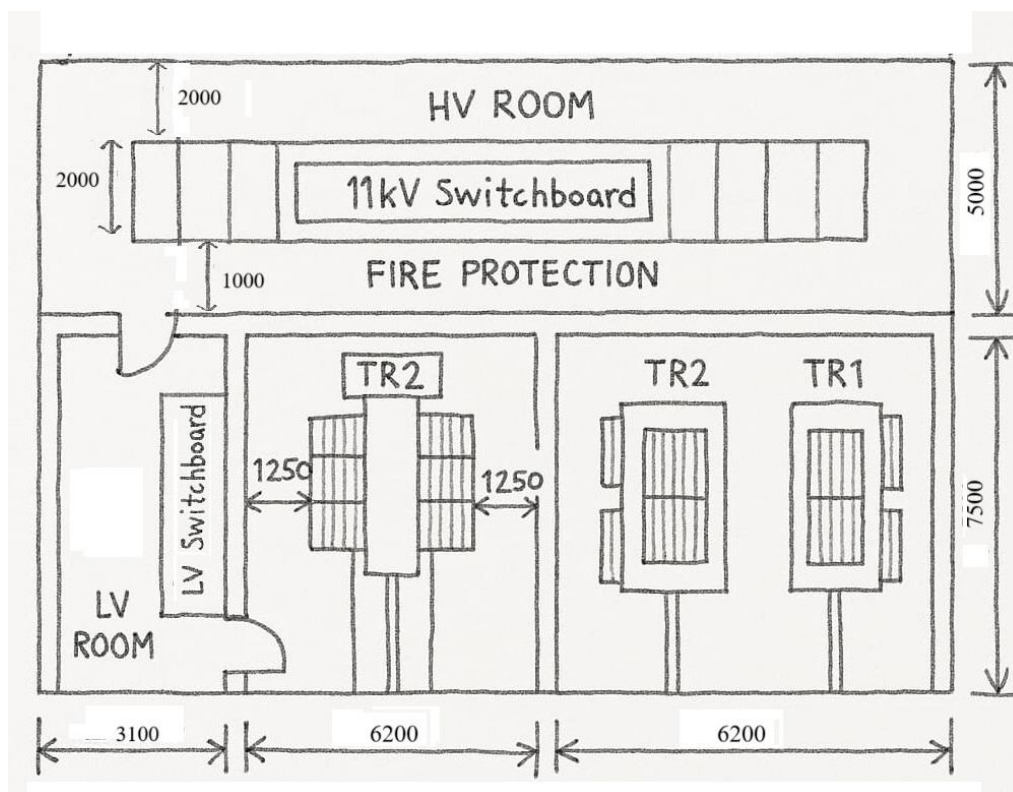


7. ELECTRICAL ROOM LAYOUT



The electrical room layout is designed to ensure safe operation, easy maintenance, and compliance with statutory norms. Based on the drawing provided, the following key features are included:

- Dedicated HV and LV rooms are provided for separation of high and low voltage equipment to enhance safety and operational clarity.
- 11 kV switchboard is centrally located in the HV room with minimum 1000 mm clearance in front and 2000 mm service space behind, as per safety standards.
- Transformers TR1 and TR2 are installed with 1250 mm clearance on both sides for maintenance and ventilation.
- LV Switchboard is placed in a separate LV room with appropriate access and working clearance.
- Fire protection zone is included between HV and transformer rooms as a safety barrier, meeting fire safety codes.
- Overall layout ensures statutory clearances of 1000–2000 mm around equipment and access doors for safe maintenance operations.
- This layout ensures compliance with electrical safety regulations (as per IS/IEC standards) and allows efficient energy distribution and emergency management.
- The electrical room layout is carefully designed to ensure safety, maintainability, and statutory compliance. Adequate space allocation, proper equipment placement, and fire protection measures help in creating a reliable and efficient electrical infrastructure suitable for modern IT park operations.