

Domestic Electrical Wiring Tips

1. The current rating of the conductor should be as per requirement of the load.
2. There should be a circuit breaker or a linked switch with a fuse on each live conductor of the supply mains at the point of entry.
3. The switch or fuse unit need not be on the neutral wire.
4. All main switches should either be of metal clad enclosed pattern or of any insulated enclosed pattern fixed near the point of entry of the supply.
5. The location of the main board should be such that it is easily accessible to fire-men and personnel to quickly disconnect the supply in case of emergencies.
6. Main switchboards should have the provisions for locking as a safeguard against tampering by unauthorized persons.
7. The switchboard should not be erected above gas stoves or sinks or within 2.5m of any washing unit in washing rooms.
8. Adequate illumination should be provided for all working spaces above the switchboard when installed indoors.
9. For small installations connected to a single phase 240V supply, wooden boards must be used as main boards or sub-boards.
10. Every circuit or apparatus should be provided with separate switches.
11. All the motor starters and switches should be accessible to the operator.

12. The circuit should be designed with a provision for 20% increase in load due to future modifications.
13. When the wiring in an installation has been completed it should be tested before giving the supply and any leakage in the wiring should not exceed 1/5000 of the maximum current of the load.
14. In any building, light wiring and power wiring should be kept separate.
15. All distribution boards in the circuit should be installed at a height of not more than 2m above the floor level.
16. In three phases, four wire installations, the load should be equally divided on all three phases.
17. Ceiling roses should not be used in a circuit where the voltage exceeds 250V
18. Ordinary socket outlets may be fixed at any place, at a height above 20cm from the floor level.
19. Each 15A socket outlet for the use of domestic appliance should be of the controlled type and should have its own individual fuse.
20. In an earthed system of supply, a socket outlet with plug should be of three pin type with the third terminal connected to earth.
21. All lamps, unless otherwise required should be suitably protected and hang at a height of not less than 2.5m above the floor level.
22. The control of a ceiling fan should be through its own regulator as well as through a switch in series.

Source: electricalpowerenergy.com