



5 Ways to Prevent an Electrical Room Fire

Electrical power is critical for all businesses—as is maintaining proper operating conditions for the electrical distribution system, which is often housed in its own dedicated electrical room. Use the following guidance on electrical room maintenance to help prevent an electrical fire and/or unexpected power interruptions.



1 Keep the Room Cool, Clean, Dry and Tight

Electrical equipment gives off heat, so keep the room temperature-controlled, well ventilated, clean and dry to prevent moisture and excessive temperatures that can degrade electrical materials. Additionally, keeping the room properly sealed will keep out dirt, dust, rodents and pesky bugs that can get into cabinets, degrade equipment and potentially start a fire. All panels should have covers to prevent any materials from entering the circuitry.



2 Practice Good Housekeeping

Simple housekeeping measures such as removing cobwebs and keeping floors and walls clean greatly reduce the odds for a fire. It is also important to keep combustible material away from electrical distribution systems. Too often, electrical rooms are used to store excess inventory or supplies, such as boxes, packaging materials or cleaning supplies. Note that direct contact with an electrical current is not the only way fires start—electricity can also arc or jump through the air as a path to the ground and ignite combustible material in the vicinity.



3 Install a Fire Protection or Detection System

Not all electrical rooms require overhead fire protection. At a minimum, install a fire-alarm monitored smoke detection system or other National Fire Protection Association (NFPA) acceptable detection method. To manually control an electrical fire, it is proper to use a carbon dioxide fire extinguisher; however, the best advice is to call the fire department and evacuate the building.



4 Inspect Equipment

Periodic inspections can help identify degraded equipment and potential fire hazards. NFPA 70B: Recommended Practice for Electrical Equipment Maintenance provides electrical contractors with guidance on visually and physically inspecting equipment such as switchgear, switchboards and panel boards, circuit breakers, fuses, disconnect switches, contactors and relays, protective relays, transformers, etc.



5 Resolve Hot Spots

To identify “hot spots” which may ignite a fire, point a hand-held infrared thermal camera at the electrical panel. These cameras can be purchased or a licensed electrical contractor can perform this service. If a hot spot is found, resolve the underlying cause which may include loose connections, corroded connectors or wires, overloaded circuits, short circuits, imbalanced electrical loading, and faulty fuses, breakers and switches.



Stay Safe!

Always implement lockout/tagout procedures when disabling electrical machinery of any kind. Learn more from the Occupational Safety and Health Administration’s (OSHA) lockout/tagout fact sheet at www.osha.gov/OshDoc/data_General_Facts/factsheet-lockout-tagout.pdf.