



TOOLBOX TALKS

Electrical Safety—Toolbox Talks # 7

ARC FLASH PROTECTION AND CONSIDERATIONS

- * Establish a written electrical safety program with clearly defined responsibilities covering all of your company's electrical safety policies, including lockout/tagout, internal safety policies and responsibilities for electrical safety.
- * Have an engineering firm conduct an electrical system analysis to determine the degree of arc flash hazard present at your workplace. The analysis will define the type of personal protective equipment (PPE) that your workers must use while performing any work when energized parts are exposed.
- * Conduct arc flash safety training for all employees. It should be specific to the hazards of arc flash, arc blast, shock and electrocution. Ensure adequate personal protective clothing and equipment is on hand.
- * Ensure the proper tools are on hand for safe electrical work. This includes insulated voltage-rated hand tools and insulated voltage sensing devices that are properly rated for the voltage application of the equipment to be tested.
- * Any electrical equipment that is likely to require examination, adjustment, servicing or maintenance while energized must have arc flash warning labels posted in plain view. Such equipment includes switchboards, panel boards, industrial control panels, meter socket enclosures and motor control centers.
- * Appoint an electrical safety program manager. This should be a well-organized, responsible person who is familiar with electrical code requirements and other safety issues.
- * Maintain all electrical distribution system components. Modern, properly adjusted over-current protective devices are able to detect an arcing condition almost instantly and clear the fault quickly. This capability significantly reduces the amount of incident energy that is released.
- * Finally, maintain and update all electrical distribution documentation. This is especially critical when expanding or revising facilities.

Sources: Square D and NFPA

This information has been developed by OSHA and its partners with the intent to assist employers, workers, and others as they strive to improve workplace health and safety. This information must be understood as a tool for addressing workplace hazards, rather than an exhaustive statement of an employer's legal obligations, which are defined by statute, regulations, and standards.

