Power Distribution Centers

A Power Distribution Center (PDC) is a prefabricated, modular, skid-mounted outdoor housing for switchgear and auxiliary equipment. All enclosed equipment is shipped fully installed, interconnected and tested by the manufacturer. This approach provides the benefits of single-point responsibility, coordination and accountability for a complete unit substation or other electrical distribution system. It greatly reduces installation and ownership costs, while improving application flexibility for sensitive electrical equipment for harsh outdoor environments.

ISO 9001 Certified





STANDARD FEATURES

- ➤ Self-contained unit is completely coordinated, assembled and tested in a controlled factory environment.
- ▶ Walls and ceilings are constructed from double-walled, interlocking, galvanized steel panels on 16-inch centers, fastened to a heavy structural steel base.
- Exterior and interior surfaces are thoroughly cleaned, primed and coated with polyurethane enamel or other finish coating systems as specified for unusual environments.
- ➤ Gaskets or caulking with 30-year life ratings are used on all exterior seams and joints.
- Epoxy mastic primer and coal tar epoxy are used for underside coating.
- Supplied with two pedestrian doors equipped with locks and interior panic hardware.

OPTIONS AND ACCESSORIES

- ► Environmental control options include wall insulation, vent fans, heating and air conditioning systems and pressurization.
- ➤ Choice of station electric service, battery and charging systems, panelboard, interior and exterior lighting and power outlets
- ► Emergency equipment (eyewash fountains, fire suppression systems)
- Optional convenience facilities (work areas, toilets)
- ▶ When ABB supplies a PDC with arc-resistant, SafeGear metal-clad switchgear, a fully tested plenum is provided across the top of the switchgear to cover all arc exhaust flaps. This sealed duct allows for unobstructed opening of the flaps in the event of an internal arc fault, and exhausts the hot gases and other arc by-products away from the PDC while protecting the PDC ceiling, cable trays and auxiliary equipment inside the PDC.

APPLICATIONS

Common PDC applications include switchgear and motor control center enclosures, relay panel enclosures, and RTU and SCADA enclosures. With integral transformers, close-coupled to switchgear or with bus duct connections, a PDC can serve as a complete, enclosed primary or secondary unit substation.

The PDC is a convenient and economical alternative to on-site building construction (often concrete block), which usually requires separate acquisition and installation of the building and various electrical sub-systems. A PDC is also an attractive alternative to purchasing, installing and connecting outdoor types of loose electrical sub-systems.

