ArcShield

You can't predict when an arc blast will occur, which makes arc resistant designs an important topic. Greater emphasis has been placed on acknowledging arc flash dangers in standards such as the National Electrical Code (NEC), Standard for Electrical Safety in the Workplace NFPA, and the Institute of Electrical and Electronics Engineers (IEEE).

An arc blast can result from many factors, including dropped tools, accidental contact with electrical systems, buildup of conductive dust, corrosion, rodents or improper work procedures. When one of these occurs, ArcShield can help mitigate and protect from an arc flash incident.

ArcShield helps to reduce arc flash hazards while providing you with increased protection against internal electrical arcing faults.

Passing IEEE C37.20.7 Testing

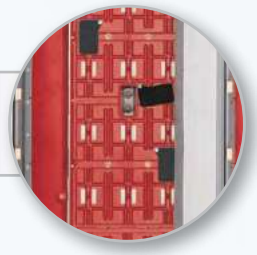
Any manufacturer that can not provide documentation that they meet this criteria does not have arc resistant equipment.

Number	Criteria Description
1	Doors and covers do not open (bowing allowed)
2	No parts are ejected from the equipment
3	The arc does not burn any holes in the exterior of the tested structure (in the applicable planes for the accessibility level)
4	Untreated cotton test indicators must not ignite or be perforated (equivalent to typical industrial work clothes)
5	The grounding connections remain effective

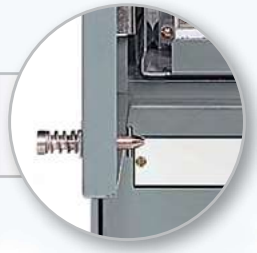
Increased Protection from Arc Flash Hazards

ArcShield is an enhanced version of the industry-leading CENTERLINE 2100 MCC and the first to offer arc resistant features. The CENTERLINE 2100 MCC with ArcShield has been tested in accordance with the IEEE C37.20.7 standard for Type 2 accessibility. Type 2 accessibility allows your personnel to be shielded at the front, rear and sides of the enclosure in the unlikely event of an arcing fault. Special door latches help to deliver an extra level of protection against accidental faults that may occur when the doors are closed and latched. The pressure relief system at the top of the CENTERLINE MCC with ArcShield, vents and redirects arc blasts out the top and away from personnel, adding additional protection.

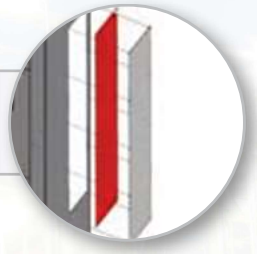
** Pressure relief system*



Automatic shutters



Arc-resistant latches on all doors



Reinforced back plates

Horizontal ground bus at top and/or bottom

Two Versions of ArcShield are Available:

1. **Device Limited –** The ArcShield MCC is designed to contain an arcing fault for the time it takes a pre-tested main protective device to clear the fault. The mains are chosen to limit the amount of available incident energy. Recommended for applications needing a wider variety of structural or unit options.

2. **Duration Limited (100 ms) –** The ArcShield MCC is designed to contain an arcing fault for up to 100 ms in duration. Any main protective device, either in the MCC itself or upstream through the use of main lugs, may be used. Recommended for applications needing high bus currents or specific mains, typically external to the MCC.

CENTERLINE 2100 with ArcShield		
Arc Resistant Rating	Device Limited	Duration Limited (100 ms)
Rated Voltage	Up to 600V	Up to 480V
Available Fault Current	Up to 65 kA	Up to 65 kA
Horizontal Bus Current Rating	600…1200 A	600…3000 A
***Top-plate Pressure Relief System** (Requires 12" minimum clearance above MCC)	Not Required	Required
Vertical Wireway Baffle	Not Required	Required
Arc Containment Latches	2 Latches/Door	All Latches
Unit Support Pans	Bolted	Bolted
Vented Units Allowed	Yes (Arc Resistant Baffles)	No
Door Mounted Devices Allowed (Control stations, HIMs, viewing widows, etc.)	Yes	Yes