27 kV MASTERCLAD® Medium Voltage Metal-Clad Switchgear with Type VR Vacuum Circuit Breakers

Class 6055

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Product Description

RATINGS
- 16.5 to 27 kV
- 1200-2000 Amperes Continuous Ratings
- 16, 25 and 40 kA Symmetrical Interrupting Capacity
- 125 kV BIL, peak (impulse) dielectric withstand
- 60 kV, rms 1 minute 60 Hz dielectric withstand
- NEMA Type 1 – Indoor enclosure

APPLICATIONS AND STANDARDS
MASTERCLAD® medium voltage metal-clad switchgear is used in a wide variety of switching, control and protective applications including electric utility generation and distribution systems, industrial plants, commercial buildings, hospitals, municipal pumping stations, wastewater treatment plants, transportation systems and pipeline stations.

MASTERCLAD offers a standard two-high breaker arrangement, incorporating a series of basic modular units, control packages and instrumentation that can be assembled in combinations as needed to satisfy user application requirements.

MASTERCLAD switchgear with VR circuit breakers meets or exceeds the design standards of ANSI, IEEE, NEMA and IEC. The switchgear is tested in accordance with both ANSI C37.20.2 and IEC 298. The VR circuit breakers are tested per ANSI C37.09 and IEC 56.

STANDARD FEATURES
Metal-Clad Switchgear as defined by ANSI C37.20.2 includes:
- Removable (Drawout) Circuit Breaker
- Fully Compartmented Construction
- Grounded Metal Barriers enclose all live parts
- Automatic Shutters over primary contacts
- Fluidized-Bed Epoxy Insulated Bus
- Mechanical Interlocks
- Disconnect Type Voltage Transformers
- Fixed Control Power Transformer with Drawout Primary Fuses
- Grounded Breaker Truck in and between Test-Disconnected and Connected Positions
- Low Voltage Instrument/Control Compartment isolated from primary voltage areas
Dimensions

27 kV LAYOUT DIMENSIONS/CONFIGURATION GUIDE
Vertical sections are 36" wide

1200/2000 A, 2000/1200 A Circuit Breaker Section

AUX VT/Circuit Breaker Section

Blank/Circuit Breaker Section

AUX VT/AUX VT Section

Blank/AUX Section

AUX CPT Section

Dimensions are in inches (millimeters).
### VR 27 kV Vacuum Circuit Breakers Rating Table on Symmetrical Current Rating Basis

<table>
<thead>
<tr>
<th>Description</th>
<th>Preferred Ratings per ANSI C37.06-1997</th>
</tr>
</thead>
<tbody>
<tr>
<td>VR 2701612</td>
<td>750 1200 16 27 1.0 3 60 125 2 51 105</td>
</tr>
<tr>
<td>VR 2701620</td>
<td>750 2000 16 27 1.0 3 60 125 2 51 105</td>
</tr>
<tr>
<td>VR 2702512</td>
<td>1250 2000 25 27 1.0 3 60 125 2 51 105</td>
</tr>
<tr>
<td>VR 2702520</td>
<td>1250 2000 25 27 1.0 3 60 125 2 51 105</td>
</tr>
<tr>
<td>VR 2704012</td>
<td>2000 1200 40 27 1.0 3 60 125 2 51 105</td>
</tr>
<tr>
<td>VR 2704020</td>
<td>2000 2000 40 27 1.0 3 60 125 2 51 105</td>
</tr>
</tbody>
</table>

| **Also tested per IEC 56** |
| **These values apply with circuit breaker in or out of enclosure.** |
| **Close and Latch Rating (Momentary) Amperes rms = 2.7 k (Rated Short Circuit Current)** |

### Breaker Identification

- **Continuous Current Rating**
- **kA Rating**
- **Voltage Rating**
- **Circuit Breaker Type**

### Weight (Approximate)

<table>
<thead>
<tr>
<th>Section (less circuit breaker)</th>
<th>1200 A circuit breaker</th>
<th>2000 A circuit breaker</th>
</tr>
</thead>
<tbody>
<tr>
<td>2600 lbs. (1179 kgs.)</td>
<td>600 lbs. (272 kgs.)</td>
<td>630 lbs. (286 kgs.)</td>
</tr>
</tbody>
</table>

Dimensions are in inches (millimeters).