OPTIMIZED LINE REACTORS

KDR line reactors are electrical components that help to protect 6-pulse rectifiers and power conversion devices such as variable frequency drives (VFDs). When used in conjunction with a VFD, a KDR line reactor can help reduce harmonics and protect the drive from harmful voltage spikes. KDR line reactors are recommended on the input of each VFD in multiple drive applications.

**Benefits of KDR Line Reactors:**
- Helps to meet IEEE 519-2014 requirements
- 208 V-690 V; 0.25HP-1250HP
- Available in Ultra Low, Low and High Impedance
- Strong durable design specifically for VFD applications
- Drive Lifetime Warranty
- UL Listed
- Made in the USA
- Same Day Shipping

**Output of a VFD**
KDR reactors are constructed with durability in mind and can be used on both the input and output of a VFD. When used on the output of a drive, KDR reactors reduce voltage distortion at the motor terminals extending the service life and minimizing insulation stress of any motor.

**Typical Applications with VFDs**
- HVAC Chillers
- Pumps
- Oil rigs
- Conveyors
- Sprinkler irrigation systems
**Technical Specifications**

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Voltage</td>
<td>208 - 690 VAC</td>
</tr>
<tr>
<td>Frequency</td>
<td>50/60 Hz</td>
</tr>
<tr>
<td>Power Rating*</td>
<td>0.25 - 1250 HP</td>
</tr>
<tr>
<td>Impedance</td>
<td>Ultra Low, Low, High Impedance</td>
</tr>
<tr>
<td>Short Term Overload Rating</td>
<td>Tolerate 200% rated I for a maximum of 3 minutes</td>
</tr>
<tr>
<td>Inductance Characteristics</td>
<td>Minimum 95% L at 110% Load</td>
</tr>
<tr>
<td></td>
<td>Minimum 80% L at 150% Load</td>
</tr>
</tbody>
</table>

**Environmental Conditions**

<table>
<thead>
<tr>
<th>Condition</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ambient Temperature</td>
<td>-40°C to 40°C enclosed</td>
</tr>
<tr>
<td></td>
<td>Enclosed: 40°C (104°F)</td>
</tr>
<tr>
<td>Operating Altitude</td>
<td>Up to 2,000 m (6,000 ft) without derating</td>
</tr>
</tbody>
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**Reference Technical Standards**

- Agency Approvals: cULus

**Warranty**

For the life of the drive with which the reactor is installed

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**Part Numbering**

- KDR Series: 
- Design Frame: 
- Sequence Code: 
- Impedance Rating: 
  - P - Ultra Low Impedance
  - L - Low Impedance
  - H - High Impedance
- Foot: 
  - (Blank if not MA/AA)
  - 1 - Side
  - 2 - Thin
- Enclosure: 
  - E01 - UL Type 1
  - E3R - UL Type 3R
  - E3R1 - UL Type 3R (MA/AA)
  - C1 - NEMA 1 (MA/AA)

*May vary based on voltage*