The MC83-2DE diode coupling card is suitable for applications where a redundant power supply is needed. Two 24 VDC loads with a maximum current of 5 A can be switched in parallel. The residual current on the output of the coupling card may not exceed the total residual current value of both power supplies combined.

For safety reasons, the input power supplies must be isolated from each other to ensure uninterrupted operation as a short-circuit of one input power supply may destroy other parallel loads.

In systems with built-in redundancy the loss of a single input can remain undetected for some time. The diode isolating amplifier card therefore provides a separate alarm output to indicate the loss or failure of a power source.

The alarm output consists of one relay (one SPDT contact) and one transistor output (pnp, 50 mA). Two green LEDs are used to indicate if both operating voltages are present.

- Used in applications where redundant power supplies are required
- Power supply monitoring
- Relay and transistor output for alarm indication
- Relay with hard gold-plated contact
### Power Supplies and Monitors

**Type**
MC83-2DE/24VDC

**Ident-No.**
90 896

### Input Circuits

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Input voltage</td>
<td>19.2...28.8 VDC</td>
</tr>
<tr>
<td>Maximum current load (total)</td>
<td>≤ 5 A</td>
</tr>
<tr>
<td>Voltage drop</td>
<td>≤ 0.75 V</td>
</tr>
</tbody>
</table>

### Output Circuits

- **alarm outputs**
- Transistor output
  - Switching voltage: input voltage
  - Switching current: ≤ 50 mA
  - Voltage drop: ≤ 3 VDC (50 mA)
- Relay output
  - Contacts: one SPDT contact, silver-alloy + 3 µm Au
  - Switching voltage: ≤ 250 VUC
  - Switching current: ≤ 2 A
  - Switching capacity: ≤ 500 VA/60 W

### LED Indications

- Power "ON" green (2 x)

### Eurocard

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Material</td>
<td>glass-fiber reinforced epoxy resin, quality class FR4</td>
</tr>
<tr>
<td>Front panel</td>
<td>plastic, 4TE = 20.32 mm individually interlocking</td>
</tr>
<tr>
<td>Connection</td>
<td>connector per DIN 41612, type F, 32-pole (series z+d)</td>
</tr>
<tr>
<td>Operating temperature</td>
<td>-25...+60 °C</td>
</tr>
</tbody>
</table>