DYNISCO MODEL DPC535
Differential Pressure Controller

Description
The DPC535 differential pressure controller for the extrusion market offers the option of utilizing 350 Ohm strain gage transducers. It offers the ability to control the differential pressure and to display and alarm at independently settable upstream and downstream setpoints. Retransmission of the differential can be configured. Digital communications via a RS485 port is optional.

Features
- Plug-in output capabilities directly
- Latching alarm function
- Versatile alarm strategy
- RS485 option
- Highly visible 3 line vacuum fluorescent display
- NEMA 4X rated
- On-board PID/self-tuning

Benefits
- Pressure signals to the operator or to the machine
- Shuts down an extruder at dangerous pressure levels
- Provides variety of interlocks and signals
- Communicates information to and from PCs
- Eliminates display "washouts"
- Useable in hostile environments
- Adaptable to a variety of applications

Specifications

Performance Characteristics
Power supply: Universal 90 to 250 Vac, 48 to 62 Hz

Electrical Characteristics
Primary input:
Selectable via jumper and keyboard:
6 RTD ranges: DIN, JIS or SAMA calibrations
2 DC current ranges: 4 to 20 mA, 0 to 20 mA
2 DC voltage ranges: 0 to 5 V, 1 to 5 V
5 millivolt ranges: 0 to 10 mV, 0 to 30 mV, 0 to 60 mV, 0 to 100 mV, -25 to 25 mV
350 Ohm strain gage with 10 Vdc power supply: DPC535-x-x-x-xK instruments only

Secondary input:
Selectable via jumper and keyboard:
6 RTD ranges: DIN, JIS or SAMA calibrations
2 current ranges: 4 to 20 mA, 0 to 20 mA
2 voltage ranges: 0 to 5 V, 1 to 5 V
5 millivolt ranges: 0 to 10 mV, 0 to 30 mV, 0 to 60 mV, 0 to 100 mV, -25 to 25 mV
350 Ohm strain gage with 10 Vdc power supply: DPC535-x-x-x-xK instruments only

Input impedance:
Current: 250 Ohms
Thermocouple: 10 megohms
Voltage: 1 megohms
RTD: 10 megohms

Temperature Characteristics
Operating: 32°F to 122°F (0°C to 50°C)
Storage: -40°F to 158°F (-40°C to 70°C)

Humidity: 10 to 90% noncondensing

Serial Communications (optional)
Serial interface: RS-485
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Ordering Guide

<table>
<thead>
<tr>
<th>Model</th>
<th>Control Output</th>
<th>2nd Output</th>
<th>3rd Output</th>
<th>4th Output</th>
<th>Input Type</th>
<th>Power</th>
</tr>
</thead>
<tbody>
<tr>
<td>DPC535</td>
<td>1 Relay</td>
<td>1 Relay</td>
<td>1 Relay</td>
<td>2 Analog mA</td>
<td>K</td>
<td>350 Ohm SG</td>
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<td>0-20, 4-20</td>
<td>90 to 250</td>
<td>90 to 250 Vac</td>
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<td>Loop power</td>
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<td>24 Vdc</td>
<td>24 Vdc</td>
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Ordering Example: DPC535 - 1 - 1 - 1 - 2K
• Differential pressure controller with 350 Ohm strain gage input, mechanical relay control output, two additional relay outputs and analog mA output operating from 90 to 250 Vac, 48 to 62 Hz

Ordering Example: DPC535 - 1 - 1 - 1 - 5
• Differential pressure controller utilizing amplified transducer input, mechanical relay control output, two additional relay outputs, 24 loop power supply operating from 90 to 250 Vac, 48 to 62 Hz

Plug-in Modules (available separately)

<table>
<thead>
<tr>
<th>Model</th>
<th>Description</th>
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<tbody>
<tr>
<td>DPC535-600</td>
<td>Mechanical relay 5A @120/240 Vac; 0.5A @ 24 Vac (output 4 only)</td>
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<tr>
<td>DPC535-601</td>
<td>Analog, mA</td>
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<tr>
<td>DPC535-602</td>
<td>Triac, 1A @ 120/240 Vac; 0.5A @ 24 Vac (output 4 only)</td>
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<tr>
<td>DPC535-603</td>
<td>SSR drive, “ON” voltage 1.7 Vdc; “OFF” voltage less than 0.5 Vdc</td>
</tr>
<tr>
<td>DPC535-604</td>
<td>Loop powered supply 24 Vdc (nominal) 40 mA</td>
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<tr>
<td>DPC535-705</td>
<td>RS-485</td>
</tr>
</tbody>
</table>

Delivery

Please call for specific delivery information.