



DRF-PR Process Input Signal Conditioner

All Models
£114



- ✓ Process Signals Up to 10 Vdc and Up to 50 mA
- ✓ Accuracy 0.2%
- ✓ Response Time <70 ms
- ✓ Excitation Voltage for Transducers +15 Vdc (20 mA)
- ✓ Galvanic Isolation Between Input, Output, and Power

The DRF-PR signal conditioner accepts a DC process signal input and provides an isolated 0 to 10 Vdc or 4 to 20 mA output. Models are available with three different power options; 24 Vdc, 115 Vac, and 230 Vac.

The DRF-PR is ideally suited for industrial applications. All models mount on a standard 35 mm DIN rail and provide galvanic isolation between input, output, and power up to 3500 Veff (model specific). Module response time is 70 ms or less.

Specifications

Accuracy: <0.2% full scale

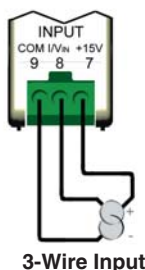
Linearity: <0.1% full scale

Thermal Drift: 150 ppm/°C typical (max <200 ppm/°C)

Response Time (DC Signal Input Models): <70 ms (90% of signal) at 20 Hz -3 dB

Input Impedance: 50 Ω for 4 to 20 mA and 0 to 20 mA ranges, 20 Ω for 0 to 5 mA and 0 to 50 mA ranges, 5 M Ω for ranges ≥ 1 V, 1 M Ω for ranges ≥ 10 V

Vexc Output for Transducers: +15 Vdc $\pm 10\%$ (22 mA max)



Range Code Table

Range Code	Range
0/5MA	0 to 5 mA
0/50MA	0 to 50 mA
0/20MA	0 to 20 mA
4/20MA	4 to 20 mA
0/1VDC	0 to 1 Vdc
0/10VDC	0 to 10 Vdc



DRF-PR-24VDC-0/10C-4/20, £114, shown larger than actual size

Impedance and Overvoltage Table

Range Code	Impedance	Overvoltage (max)
4 to 20 mA	50 Ω	3.5 Vdc
0 to 20 mA	50 Ω	3.5 Vdc
0 to 50 mA	20 Ω	2.5 Vdc
0 to 5 mA	20 Ω	2.5 Vdc
0 to 10 Vdc	5 M Ω	150 Vdc
0 to 1 Vdc	1 M Ω	15 Vdc



AVAILABLE FOR FAST DELIVERY!

To Order (Specify Model Number)		
Model No.	Price	Description
DRF-PR-(*)-(**)-(***)	£114	Signal conditioner for DC process input
CS-3790	13.50	Reference Book: McGraw-Hill Dictionary of Electrical and Computer Engineering

* Specify power: "24VDC" for 24 Vdc power, "115VAC" for 115 Vac power or "230VAC" for 230 Vac power.

** Specify range code from the Range Code Table.

*** Specify output: "4/20" for 4 to 20 mA output or "0/10" for 0 to 10 Vdc output.

Ordering Example: DRF-PR-24VDC-0/10VDC-4/20, signal conditioner for process input with a 0 to 10 Vdc input range, 4 to 20 mA output and 24 Vdc power, £114.



omega.co.uk®

Your One-Stop Source for Process Measurement and Control!

Freephone 0800 488 488 | International +44(0) 161 777 6622 | Fax +44(0) 161 777 6622 | Sales@omega.co.uk

www.omega.co.uk



UNITED STATES

www.omega.com
1-800-TC-OMEGA
Stamford, CT.

CANADA

www.omega.ca
Laval(Quebec)
1-800-TC-OMEGA

GERMANY

www.omega.de
Deckenpfronn, Germany
0800-8266342

UNITED KINGDOM

www.omega.co.uk
Manchester, England
0800-488-488

FRANCE

www.omega.fr
088-466-342

CZECH REPUBLIC

www.omegaeng.cz
Karviná, Czech Republic
596-311-899

BENELUX

www.omega.nl
0800-099-33-44



More than 100,000 Products Available!

• Temperature

Calibrators, Connectors, General Test and Measurement Instruments, Handheld Instruments for Temperature Measurement, Ice Point References, Indicating Labels, Crayons, Cements and Lacquers, Infrared Temperature Measurement Instruments, Recorders, Relative Humidity Measurement Instruments, PT100 Probes, PT100 Elements, Temperature & Process Meters, Timers and Counters, Temperature and Process Controllers and Power Switching Devices, Thermistor Elements, Probes and Assemblies, Thermocouples, Thermowells and Head and Well Assemblies, Transmitters, Thermocouple Wire, RTD Probes

• Flow and Level

Air Velocity Indicators, Doppler Flowmeters, Level Measurement, Magnetic Flowmeters, Mass Flowmeters, Pitot Tubes, Pumps, Rotameters, Turbine and Paddle Wheel Flowmeters, Ultrasonic Flowmeters, Valves, Variable Area Flowmeters, Vortex Shedding Flowmeters

• pH and Conductivity

Conductivity Instrumentation, Dissolved Oxygen Instrumentation, Environmental Instrumentation, pH Electrodes and Instruments, Water and Soil Analysis Instrumentation

• Data Acquisition

Auto-Dialers and Alarm Monitoring Systems, Communication Products and Converters, Data Acquisition and Analysis Software, Data Loggers Plug-in Cards, Signal Conditioners, USB, RS232, RS485 and Parallel Port Data Acquisition Systems, Wireless Transmitters and Receivers

• Pressure, Strain and Force

Displacement Transducers, Dynamic Measurement Force Sensors, Instrumentation for Pressure and Strain Measurements, Load Cells, Pressure Gauges, Pressure Reference Section, Pressure Switches, Pressure Transducers, Proximity Transducers, Regulators, Pressure Transmitters, Strain Gauges, Torque Transducers, Valves

• Heaters

Band Heaters, Cartridge Heaters, Circulation Heaters, Comfort Heaters, Controllers, Meters and Switching Devices, Flexible Heaters, General Test and Measurement Instruments, Heater Hook-up Wire, Heating Cable Systems, Immersion Heaters, Process Air and Duct, Heaters, Radiant Heaters, Strip Heaters, Tubular Heaters