

COMPACT $\frac{3}{64}$ DIN SIZE PROCESS METERS WITH FULL-SIZE LED DISPLAY

DPF50 Series

Starts at
\$145



Standard Features

- ✓ Zero and Span Adjustments of 2000 Counts Each
- ✓ ± 1999 Count Display Span
- ✓ 120 dB CMR, 56 dB NMR
- ✓ Bright, 14.2 mm (0.56") LED Display
- ✓ EMI/RFI Filter for AC Power
- ✓ Removable Screw-Clamp Connector
- ✓ Miniature DIN Case with 24 x 72 mm (0.94 x 2.83") Bezel

Options

- ✓ Isolated Transmitter Excitation Supply
- ✓ 4 to 20 mA, 1 to 5V, 0 to 10V Signal Ranges
- ✓ Red or Green LED Display
- ✓ 24 Vac Power Supply
- ✓ 25 x 75 mm (0.98 x 2.96") Bezel Adaptor
- ✓ NEMA 4 (IP65) Splashproof Lens Cover

Large Display, Small Case

The DPF50 Series process meters feature a full-size, 14.2 mm (0.56"), red or green LED display that is housed in a miniature case with a 24 x 72 mm (0.94 x 2.83") bezel. The case fits into a standard $\frac{3}{64}$ DIN cutout, 22.2 x 68 mm (0.87 x 2.68"), and requires a depth of less than 120 mm (4.72") behind the panel, including plug-in screw-clamp connectors (standard).

Shown actual size.



**62.5% Less Panel Space
Than $\frac{1}{8}$ DIN with the Same
Size Display!**

$\frac{3}{64}$ DIN
Meter

$\frac{1}{8}$ DIN
Bezel

Built-In Isolated Excitation

Model DPF52 is a low-cost $\frac{3}{2}$ digit (± 1999 count) process meter with a built-in, isolated excitation supply to power 2- or 4-wire transmitters, bridges, or active transducers. Output levels of 24 Vdc @ 20 mA or 10 Vdc @ 30 mA are jumper-selectable.

Easy to Scale

The DPF50 Series meters can be calibrated to meet a customer's specific requirements (DPF50-FSE). Five signal ranges can be selected via push-on jumpers, and precision potentiometers are readily accessible behind the lens to provide zero and span adjustments of 2000 counts each. Accuracy is 99.9% of reading.

Multiple AC Power Options

The DPF50 Series meters run on 24, 100, 115, or 230 Vac power. All power options provide EMI filtering so that power-line noise does not affect the reading.

SPECIFICATIONS

Accuracy at 25°C (68°F)

- Maximum Error:**
 $\pm 0.05\%$ of reading ± 1 count
- Zero Temp Coefficient:**
 $\pm 0.01\%$ of offset/ $^{\circ}\text{C}$
- Span Temp Coefficient:**
 $\pm 0.02\%$ of reading/ $^{\circ}\text{C}$

Full Scale Step Response: 1 s

Warm-Up to Rated Accuracy: 30 min

Noise Rejection

NMR, SIG HI to SIG LO: 56 dB, 50/60 Hz

CMR, SIG LO to PWR GND: 120 dB, 1/c to 60 Hz

CMV, SIG LO to PWR GND: 1500 Vp per HV test, 354 Vp per IEC spacing

Analog-to-Digital Conversion

Technique: Dual slope, average value

MONOGRAM[®] SERIES

Signal Integration Period: 100 ms

Read Rate: 2.5/s

Transmitter Excitation Supply

Output Voltage:

Selectable 10 or 24 Vdc

Output Current, Max:

30 mA at 10V, 20 mA at 24 V

Line Regulation:

$\pm 0.01\%$ /V of AC power

Load Regulation: $\pm 0.5\%$

Temp Coefficient: $\pm 0.02\%$ / $^{\circ}\text{C}$

Ripple at 50/60 Hz: $\pm 0.01\%$

Display

Type: 7-segment LED

Color: Red (standard), green (optional)

Digit Height: 14.2 mm (0.56")

Decimal Points: 3 positions, jumper-selectable

Overrange Indication:

3 least-significant digits blank

Power Options

AC Voltage: 24, 100, 115 or 230 Vac $\pm 15\%$ @ 2 W

AC Frequency: 49 to 63 Hz

Environmental

Operating Temperature:

0 to 60°C (32 to 140°F)

Storage Temperature:

-40 to 85°C (-40 to 185°F)

Relative Humidity:

95% @ 40°C (104°F), non-condensing

Mechanical

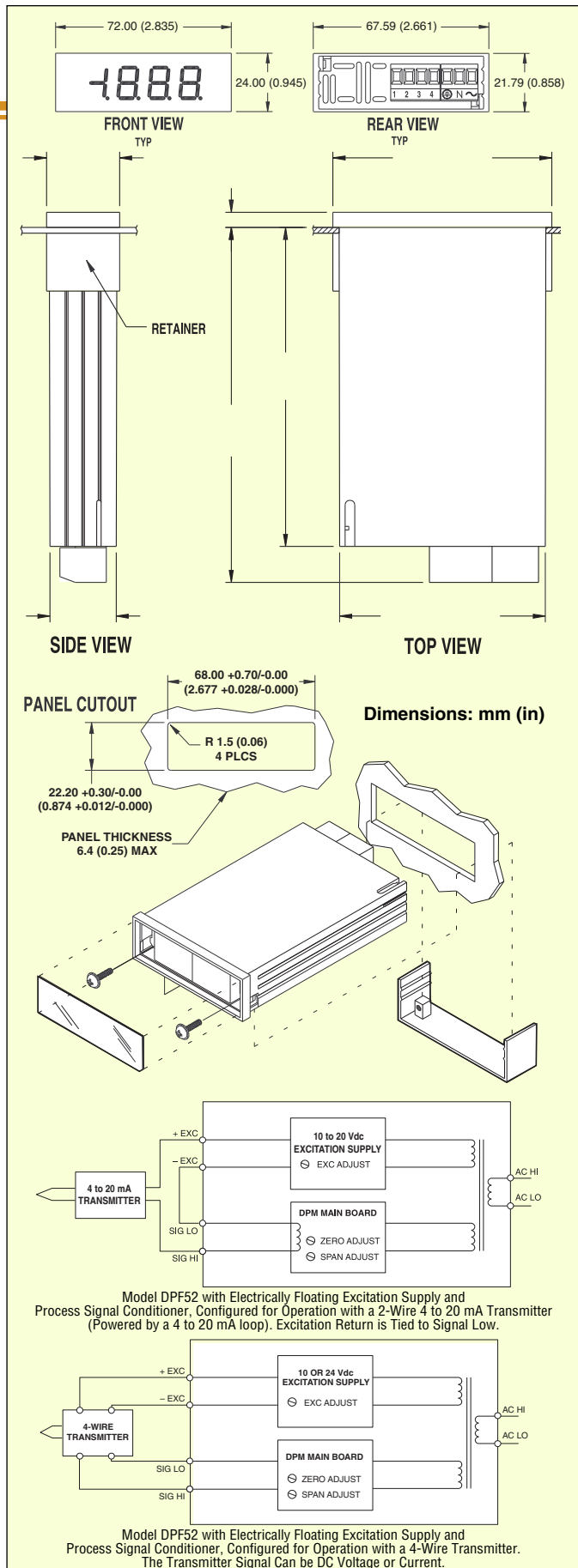
Dimensions: 24 H x 72 W x 47 mm D (0.94 x 2.84 x 4.6")

Panel Cutout: 22.2 x 68 mm (0.87 x 2.68")

Weight: 200 g (7 oz)

Case Material: 94 V-1 UL-rated Noryl SE-1

COMPACT 3/64 DIN INDICATORS



MOST POPULAR MODELS HIGHLIGHTED!

To Order (*Complete Model Number)

DPF52	(*)	(*)	(*)	SCALABLE, 24 Vdc EXCITATION	PRICE
	EA1			4 to 20 mA DC = 000 to 100	\$195
	EV2			0 to 199.9 mV = 000 to 100	195
	EV3			1 to 5 Vdc = 000 to 100	195
	EV4			0 to 10 Vdc = 000 to 100	195
	EV5			0 to 100 Vdc = 000 to 100	195
	FSE			Customer specified	215
DPF51	(*)	(*)	(*)	SCALABLE WITHOUT EXCITATION	
	PA1			4 to 20 mA DC = 000 to 100	\$145
	PV2			0 to 199.9 mV = 000 to 100	145
	PV3			1 to 5 Vdc = 000 to 100	145
	PV4			0 to 10 Vdc = 000 to 100	145
	PV5			0 to 100 Vdc = 000 to 100	145
	FSP			Customer specified	165
DPF53	(*)	(*)	(*)	FIXED-RANGE VOLTMETER	
	AV2			±199.9 mV = ±199.9	\$145
	AV3			±1.999V = ±1.999	145
	AV4			±19.99V = ±19.99	145
	AV5			±199.9V = ±199.9	145
				Red display (standard)	N/C
		GR		Green display	N/C
				115 Vac, 50 to 60 Hz (standard)	N/C
			-230V	230 Vac, 50 to 60 Hz	N/C
			-7/32*	7 to 32 Vdc	N/C
			-100V	100 Vac, 50 to 60 Hz	N/C
			-24VAC	24 Vac, 50 to 60 Hz	N/C

*Note: 7 to 32 Vdc power supply option is not isolated from signal. Not available on DPF52 Series.

Ordering Examples: DPF52-EA1, DC process meter with 4 to 20 mA input range, 24 Vdc excitation, red LED display and 115 Vac power, \$195.

DPF53-AV5-24VAC, DC voltmeter with 199.9 Vdc input range, 24 Vac power, red LED display and no excitation, \$145.

DPF51-PV1-230V, DC process meter with 4 to 20 mA input range, red LED display and 230 Vac power, \$145.

ANALOG INPUT (DPF51 AND DPF52)					
Range	4 to 20 mA	0 to 0.2V	1 to 5V	0 to 10V	0 to 100V
Input Resist.	13 Ω	1 MΩ	1 MΩ	1 MΩ	1 MΩ
Bias Current	50 pA	50 pA	10 pA	5 pA	1 pA
Max Input	55 mA	250 Vp	250 Vp	250 Vp	250 Vp
ANALOG INPUT (DPF53)					
Range	±199.9 mV	±1.999V	±19.99V	±199.9V	
Input Resist.	1 GΩ	1.1 MΩ	1.0 MΩ	1 MΩ	
Bias Current	50 pA	5 pA	1 pA	1 pA	
Max Input	130 Vp	250 Vp	250 Vp	250 Vp	

ACCESSORIES

MODEL NO.	PRICE	DESCRIPTION
SPC364	\$30	NEMA 4 (IP65) splashproof lens cover
TP2	30	25 x 75 mm (0.98 x 2.95") bezel adaptor
TP3	30	Bezel adaptor, 3/64 DIN to 1/8 DIN
RP23	50	19" rack panel for two 3/64 DIN meters
RP43	55	19" rack panel for four 3/64 DIN meters



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