



Level



Pressure



Flow



Temperature



Liquid Analysis



Registration



Systems Components



Services

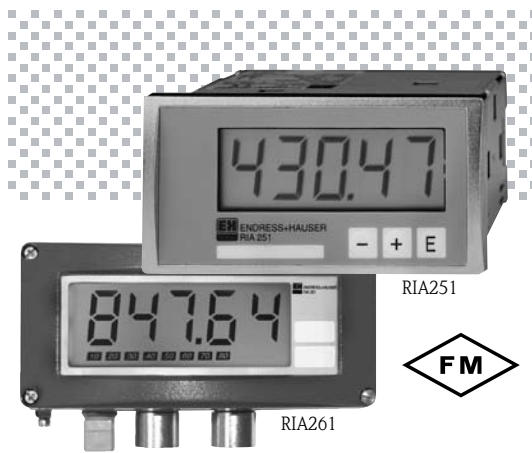


Solutions

Digital loop-powered displays RIA251 and RIA261

E-direct

www.e-direct.us



- 3-pushbutton operation
- Highly legible 5-digit display
- For connection to 4 to 20 mA circuits, no external power needed
- FM-IS approval, optional
- Measurement range -19999 to +99999
- RIA261 with backlit display and trend bargraph

Application

The RIA251/261 process display modules monitor measurement signals and displays them with high resolution and accuracy. They permit universal installation, e. g. in switch panels, with laboratory equipment, plant facilities, and fixed or mobile skids.

Measurement principle

The process display module is directly connected to the 4 to 20 mA measurement circuit. The power needed is drawn from the current loop. The voltage drop of < 2 V (RIA261: < 2.5 V) has only a negligible effect on the measurement circuit.

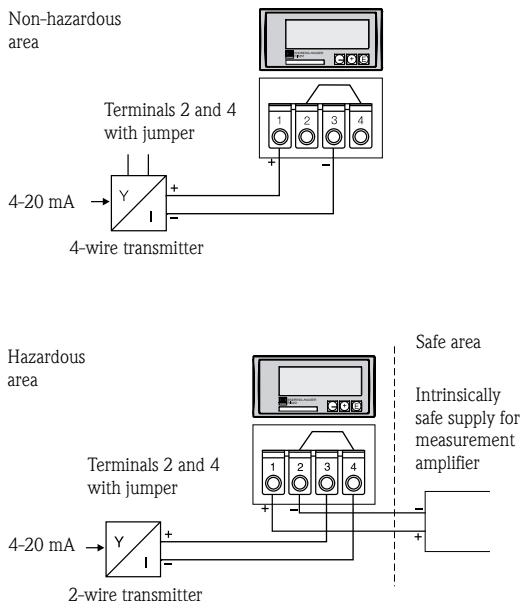
Parameters can easily be set for measurement range, decimal point and offset by three pushbuttons on the face of the unit. Parameter setting is possible during operation, thus allowing for adjustments at a later time.

The module is available with FM IS approval, so the RIA251/261 can be used as a local display directly in hazardous areas. The reading is given on a 5-digit, 7-segment LCD display. The field housing version (RIA261) also has a rear illuminated display.

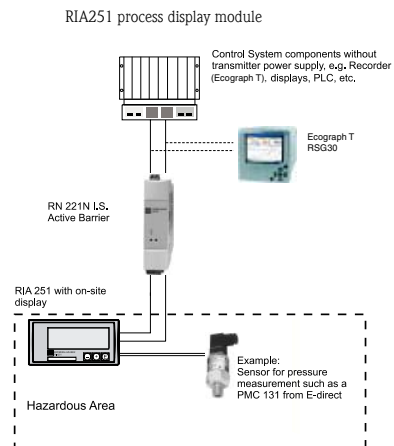
Voltage drop: RIA251: 2 V; RIA261: < 2.5 V	Display: 5 digit LC display
Protection: RIA251: Front NEMA 4, terminals NEMA 1 RIA261: NEMA 4X	Accuracy: < 0.1% of full scale

Application example

RIA261 process display module (field housing)



Application example



RIA251 and RIA261

Technical data

Input

- Input 4 to 20 mA (reverse-polarity protected)
- Measured parameter Current
- Max. input current 150 mA (short circuit current)
- Accuracy < 0.1% of full scale
- Temperature drift < 0.01%/10 k

Output

- Voltage drop RIA251: < 2 V; RIA261: < 2.5 V
- HART® The display allows transmission of the HART® communication protocol

Operating conditions

- Ambient temperature RIA251: 15 to 140°F (-10 to +60°C)
RIA261: -4 to +140°F (-20 to +60°C) (for hazardous areas, see FM certificate)
- Storage temperature -13 to +158°F (-25 to +70°C)
- Climate category RIA251: to standard EN 60654-1 class B2
RIA261: to standard EN 60654-1 class D1
- EMC Noise emission to EN 5011 Group 1, Class B
Noise immunity to EN 61000-4-2 up to 61000-4-6
- Protection RIA251: Front NEMA 4, terminals NEMA 1
RIA261: NEMA 4X

Mechanical construction

- Materials RIA251: Front of housing: Die cast alum.;
Casing: galvanized sheet steel;
Rear panel of housing: ABS plastic
RIA261: Housing: Die cast aluminum epoxy coated with glass window;
Pressure compensation: GORE-TEX® membrane
- Electrical connection Plug-in screw terminals, (can be made permanent), Terminal area 16 AWG, solid, 18 AWG strand with threaded sleeve

Many other models, versions and options are available. Please contact Endress+Hauser for more information.

Product	Version	Order no.	Price/piece in \$			we hereby order:	total price:
			1 to 5	6 to 15	16 to 35		
RIA251 (panel mount)	Standard (version for non-hazardous areas)	RIA251-A1	\$196.00	\$177.00	\$159.00	pcs	\$
	with FM IS approval	RIA251-C1	\$231.00	\$208.00	\$188.00	pcs	\$
RIA261 (field housing)	Standard (for non-hazardous areas)	RIA261-A21	\$255.00	\$230.00	\$207.00	pcs	\$
	with mounting kit (version for non-hazardous areas)	RIA261-A22	\$294.00	\$265.00	\$239.00	pcs	\$
	with FM IS approval	RIA261-C21	\$292.00	\$263.00	\$237.00	pcs	\$
	with FM IS approval and mounting kit	RIA261-C22	\$331.00	\$298.00	\$269.00	pcs	\$

Net excluding cost of shipping and taxes.

Acceptance per our Standard Terms and Conditions (find at www.e-direct.us).

Total price:

FOB Greenwood, IN; shipped pre-paid; shipping charges and applicable taxes added to invoice.

\$ _____

E-direct catalog (free)

Shipping method

Ground

Priority One Day

Priority Two Day

E-direct

(For customers in the USA only)

Online Shop www.e-direct.us

Order: by phone 888-EH DIRECT (343-4732)

by fax 800-321-7754

For special requests, e-mail us: e-direct@us.endress.com

E-direct
Endress+Hauser, Inc.
2350 Endress Place
Greenwood, IN 46143

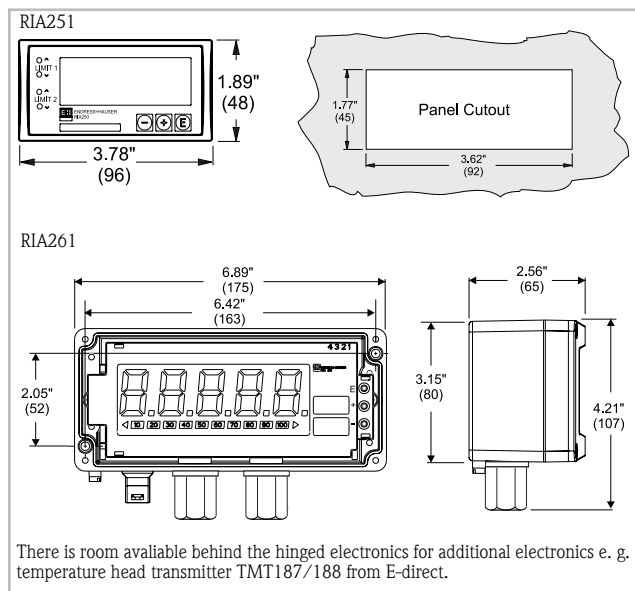
Warranty

Should an instrument fail during the 1 year warranty period, a replacement unit will be provided.

Delivery

Shipment from receipt of order for quantities 1-3 within 2 business days.

Dimensions in inches (mm)



User interface

- Display 5-digit LC Display; RIA251: 0.66" RIA261: 1" with rear illumination and trend bargraph in 10% steps; range of display: -19999 to +99999
- Operation 3 pushbuttons on front panel

Power supply

- Cable entry (RIA261) Two 1/2" NPT conduit entry
- Supply via 4 to 20 mA input

Accessories

Wall/pipe mounting kit with tension strap installation, 304 stainless steel (only for RIA261)

Approvals

- FM RIA251: FM IS, Cl. I; Div. 1; Gr. A-D
RIA261: FM IS, Cl. I; Div. 1; Gr. A-D

Endress+Hauser

People for Process Automation