Series RD

Panel meter 96x48 mm size for parallel BCD code



RD50 5 digits

RD40S 4 digits and negative sign

RD40 4 digits

RD30S 3 digits and negative sign

RD30 3 digits

RD20S 2 digits and negative sign

RD20 2 digits

Panel meters for signals in parallel BCD code. Meters with 2, 3, 4 and 5 digits, with optional negative sign and selectable decimal point. Independent "Hold" function for multiplexing the control signals to several meters. Positive logic. Standard 14mm display height. Multiple power options available both in AC and DC.

Series RD

Panel meter 96x48 mm size for parallel BCD code

Panel meters with parallel BCD code control, with 5, 4, 3 or 2 digits, with optional negative sign. Decimal point fixed, selectable by solder jumpers. Independent «HOLD» control for each digit, allows multiplexing of the BCD control signals. Several power options available both in AC and DC. The instrument includes both male and female connectors.



Order Reference

Model Power **RD** 50 Н -0 (230 Vac) -50 5 digits -40S 4 digits and sign -1 (115 Vac) -40 4 digits -2 (24 Vac) -30S 3 digits and sign -3 (48 Vac) -30 3 digits -6 (15 a 30 Vdc isolated) 2 digits and sign -20S -8 (24 a 65 Vdc isolated) -20 2 digits

Technical Data

Digits 5, 4, 3, 2 depends on model

Type 7 segments, red

Height 14 mm

Display maximum depends on model Display minimum depends on model Decimal point selectable 8.8.8.8.

by solder jumpers

<u>Signals</u> accepted BCD parallel

Type positive logic

Levels for "1" 5Vdc, 12Vdc, 24Vdc

Levels for "0" <3Vdc

Consumption per input 570 uA at 24 Vdc

212 uA at 12 Vdc 38 uA at 5 Vdc

HOLD independent for each digit

<3Vdc</p>
570 uA at 24 Vdc
Operating temperat

<u>Power</u>

Power option in AC 230Vac, 115Vac, 48Vac, 24Vac

Power option in DC 15-30Vdc, 24-65Vdc

Consumption <5.5VA en AC <3.5W en DC

<u>Mechanical</u>

Mounting pane

Power connections plug-in screw terminal

Signal connections SUB-D 37 pins male (female SUB-

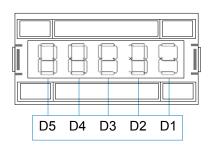
D terminal included)

Weight <350 grams
Front size 96x48mm
Panel cut-out 92.5x44.5mm

Operating temperature 0 to 50°C Storage temperature –40 to +80°C

Front View

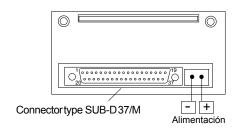
The connections indicated are for the 5 digit instrument, and each digit is labeled with D5, D4, D3, D2 and D1 based on its position. For units with negative sign, all BCD codes that will light the central segment of the 7 segment display, will light the sign.



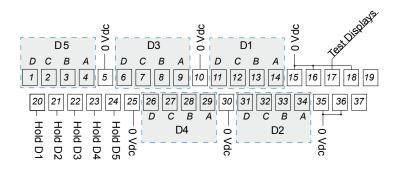
Function «HOLD»: Each digit has an independent terminal assigned to control its «Hold» function. This «Hold» function is aimed to multiplex the BCD data channels of the 5 digits. The «Hold» function is activated by changing its logical state from «0» to «1». If the «Hold» function is deactivated («0») the display will visualize continuously the data received.

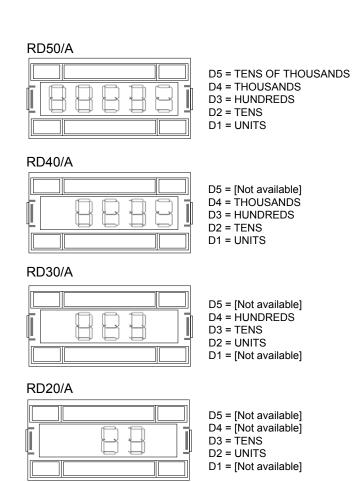
Function «TEST DISPLAYS»: This function tests the functionality of the segments of the displays. It activates when connecting terminal 17 to negative («0»). All displays will light all the segments.

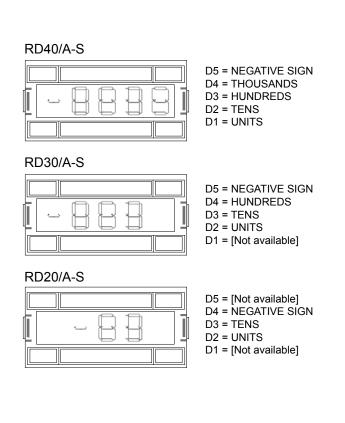
Rear View



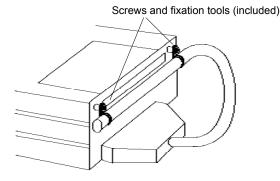
Signal Connections







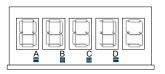
Fixing the signal cable



NOTE: To avoid damages on the connectors and the printed circuit board, do not let the weight of the cables fall free onto the connectors. It is recommended to fix the cables to the housing as indicated in the image above, using the tools provided with the instrument.

Decimal point selection

Select the decimal point to light by closing the solder jumpers indicated below. To access the jumpers take out the instrument from the housing and unlock the front side.



 $A = X \cdot XXXX$

B = XX . XXX

 $C = XXX \cdot XX$

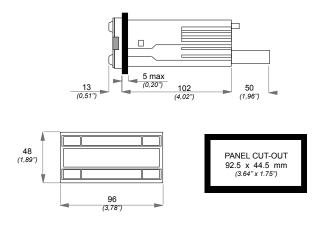
 $D = XXXX \cdot X$

Power fuses

The RD instruments allow different power options, both in AC and DC. The instrument does not have fuse protection. The value and type of the recommended protection fuses is indicated below for each power type.

F	Ref.	Power	Re	ecommended Fuse
«	0»	230 Vac	50/60 Hz	50 mA Time Lag
((1»	115 Vac	50/60 Hz	100 mA Time Lag
«	2»	24 Vac	50/60 Hz	300 mA Time Lag
«	3»	48 Vac	50/60 Hz	150 mA Time Lag
«	6»	24 Vdc	(15/30 Vdc Isolated)	350 mA Fast Fuse
«	8»	48 Vdc	(24/65 Vdc Isolated)	200 mA Fast Fuse

Mechanical dimensions (mm / inch)



CE Declaration of conformity

Manufacturer FEMA ELECTRÓNICA, S.A. Altimira 14 - Pol. Ind. Santiga

Altımıra 14 - Pol. Ind. Santıga E08210 - Barberà del Vallès BARCELONA - SPAIN

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Products - RD50, RD40S, RD40, RD30S, RD30, RD20S, RD20

The manufacturer declares that the instruments indicated comply with the directives and rules indicated below.

Directive of electromagnetic compatibility 2004/108/CEE Directive of low voltage 73/23/CEE

Security rules 61010-1 Emission rules 50081-1 Immunity rules 50082-2

Barberà del Vallès October 2009 Daniel Juncà - Quality Manager