

USER INSTRUCTIONS

Universal High-Isolation 4-wire Transmitter

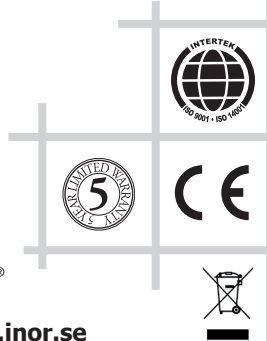


The manual must be read prior to adjustment and/or installation. All information subject to change without notice.

INOR

www.inor.com, www.inor.se

MEASURE OF SUCCESS



This product should not be mixed with other kind of scrap, after usage. It should be handled as an electronic/electric device.

INTRODUCTION

IPAQ-4L is a fully universal and programmable 4-wire (separately powered) transmitter. The high isolation provides safe and problem free measurements. Offering both current and voltage output, IPAQ-4L meets any process requirements. Designed for wall and DIN-rail mounting.

IPAQ-4L is intended to be used in industrial environment.

CONFIGURATION

The transmitter is configured from a standard IBM compatible PC by using the IPRO software (version 4.1 or later). IPRO 4.1 is compatible with Windows 98SE, Windows NT Workstation 4.0, Windows 2000 and Windows XP. When the transmitter is reconfigured by a PC no recalibration is needed.

Connect the IPRO communication cable between the serial port of a PC (with IPRO software installed) and the PC connection port on IPAQ-4L.

The IPAQ-4L must be powered, when you configure the transmitter.

If IPRO (the IPAQ software) isn't installed in your PC, install the software (follow the instructions in "IPRO"). Configuration from PC is "on-line", that is, the transmitter can be installed in the process with input connected during configuration. The output is frozen while transmission from PC to IPAQ take place. When transfer is done the transmitter uses the new parameters.

NOTE: The label on the transmitter indicate allowed power supply to the transmitter. By connecting false power supply the transmitter may be damaged.

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KROHNE Temperature Division INOR

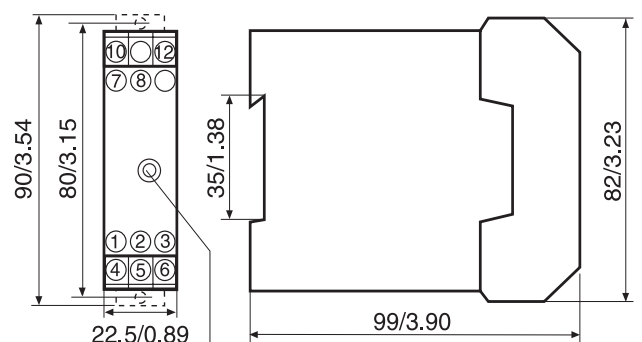
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FAX +1-978-535 3882
E-MAIL inor-info@krohne.com

CALIBRATION

Since IPAQ-4L is a precision instrument it's recommended to check the calibration once a year. Use equipment with an inaccuracy of at least 5 times better than the checked one, e.g. if you are checking a transmitter with an inaccuracy of 0.1% use instrument with an inaccuracy of maximum 0.02%.

You can either perform a full recalibration of the transmitters stored calibration parameters (Basic Calibration) or make a System Error Correction (recommended). In each case use the IPRO software and follow the instructions on the screen. When performing a System Error Correction, please note that this is only a compensation for errors at the measuring range in use.

DIMENSIONS



PC connection

mm/inches

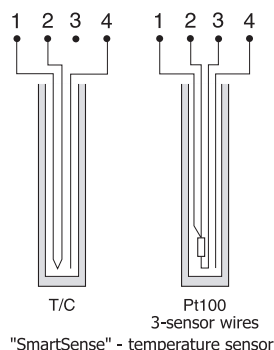
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DATA (shortform)

Power supply	90-250 VAC or 20-30 VDC (allowed power is indicated on the transmitter).
Power Consumption	< 1.5 W
Ambient temperature	-20 - 70 °C
Isolation /input/output /power	4000 VAC
Permissible output load	
Current	≤ 750 Ω
Voltage	≥ 10 kΩ
Typical accuracy	0.2 %
Mounting	Rail, DIN50022, 35 mm or wall mounting

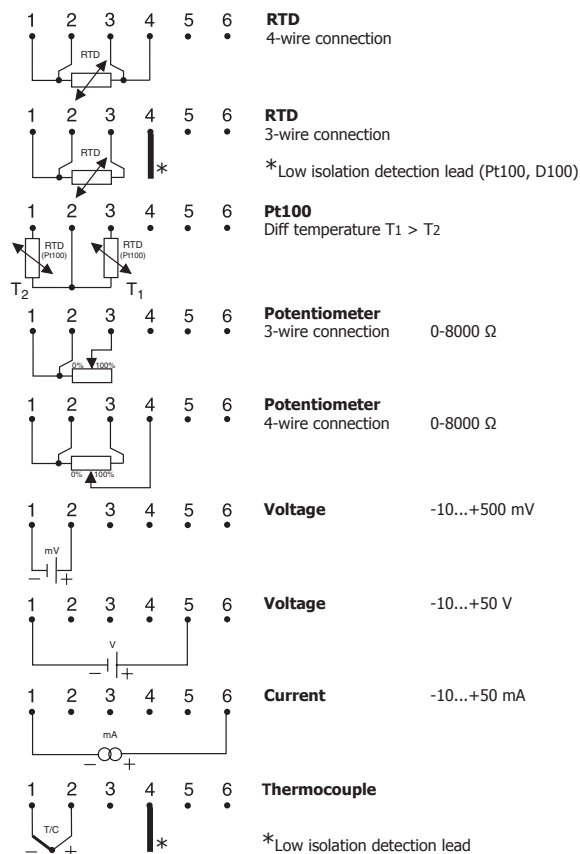
SMART SENSE (Low isolation detection)

The transmitter continuously supervises the isolation resistance in thermo-couples and 3-wire-connected Pt100/D100 including the connection wires. If the isolation resistance is low it causes error in the measurements and consequently a faulty output. The transmitter indicates low isolation resistance by forcing the output to a preprogrammed value. This function requires setting by the PC-program IPRO and the use of a temperature sensor with an extra wire.



CONNECTIONS

Input connections



LIMITED WARRANTY

INOR Process AB, or any other affiliated company within the Inor Group (hereinafter jointly referred to as "Inor"), hereby warrants that the Product will be free from defects in materials or workmanship for a period of five (5) years from the date of delivery ("Limited Warranty"). This Limited Warranty is limited to repair or replacement at Inor's option and is effective only for the first end-user of the Product. Upon receipt of a warranty claim, Inor shall respond within a reasonable time period as to its decision concerning:

1. Whether Inor acknowledges its responsibility for any asserted defect in materials or workmanship; and, if so,
2. the appropriate cause of action to be taken (i.e. whether a defective product should be replaced or repaired by Inor).

This Limited Warranty applies only if the Product:

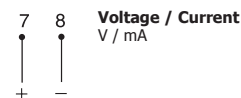
1. is installed according to the instructions furnished by Inor;
2. is connected to a proper power supply;
3. is not misused or abused; and
4. there is no evidence of tampering, mishandling, neglect, accident damage, modification or repair without the approval of Inor or damage done to the Product by anyone other than Inor.

This Limited Warranty is provided by Inor and contains the only express warranty provided.

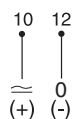
INOR SPECIFICALLY DISCLAIMS ANY EXPRESS WARRANTY NOT PROVIDED HEREIN AND ANY IMPLIED WARRANTY, GUARANTEE OR REPRESENTATION AS TO SUITABILITY FOR ANY PARTICULAR PURPOSE, PERFORMANCE, QUALITY AND ABSENCE OF ANY HIDDEN DEFECTS, AND ANY REMEDY FOR BREACH OF CONTRACT, WHICH BUT FOR THIS PROVISION, MIGHT ARISE BY IMPLICATION, OPERATION OF LAW, CUSTOM OF TRADE OR COURSE OF DEALING, INCLUDING IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. EXCEPT AS PROVIDED HEREIN, INOR FURTHER DISCLAIMS ANY RESPONSIBILITY FOR LOSSES, EXPENSES, INCONVENIENCES, SPECIAL, DIRECT, SECONDARY OR CONSEQUENTIAL DAMAGES ARISING FROM OWNERSHIP OR USE OF THE PRODUCT.

Products that are covered by the Limited Warranty will either be repaired or replaced at the option of Inor. Customer pays freight to Inor, and Inor will pay the return freight by post or other "normal" way of transport. If any other type of return freight is requested, customer pays the whole return cost.

Output connections



Power supply



ORDERING INFORMATION

IPAQ-4L (Power supply 90-250 VAC/110-220 VDC)	70IP4L0001
IPAQ-4L (Power supply 20-30 VDC)	70IP4L0002
PC Configuration Kit	70CFG00092
Configuration	70CAL00001
Software IPRO upgrade	www.inor.com