

MP-1 Hall transmitter for RCDL flow meters

- Transistor output - fits PLC inputs
- Immersible, IP68, can be installed into manholes
- Eliminates condense water problem
- Switch-able LED indicator of pulses
- High temperature tolerance
- Reverse polarity protection
- Low cost
- Applicable to all RCDL PVC and Bronze meters, of low and high temperature versions as well.
- It is built up with a A1468 Hall effect chip.



Technical data:

Power Supply: 20...24VDC, 30mA

Minimum load resistance: 1kohm

Applicable pull up resistor: 1...10 kohm, 0,25...1W

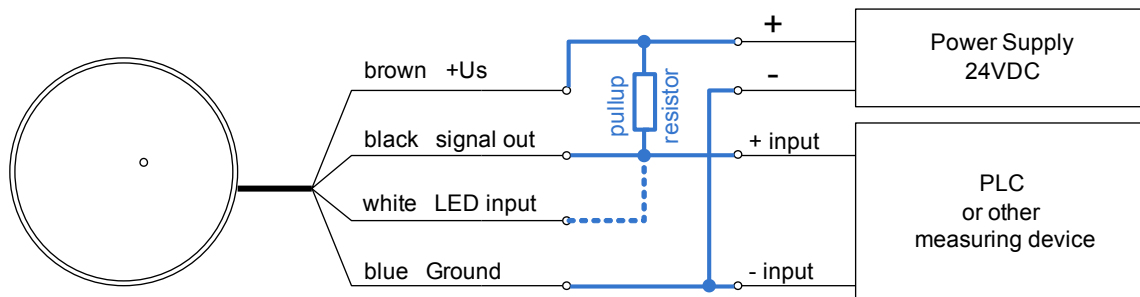
Body material options:

POM ERTACETAL C, up to 80°C

Epoxi, up to 50°C



Wiring connections:



The connection is done based on the drawing above. The dashed line connects the LED drive input to the output, if you intend to indicate pulses on the meter itself.

Selecting pull-up resistor:

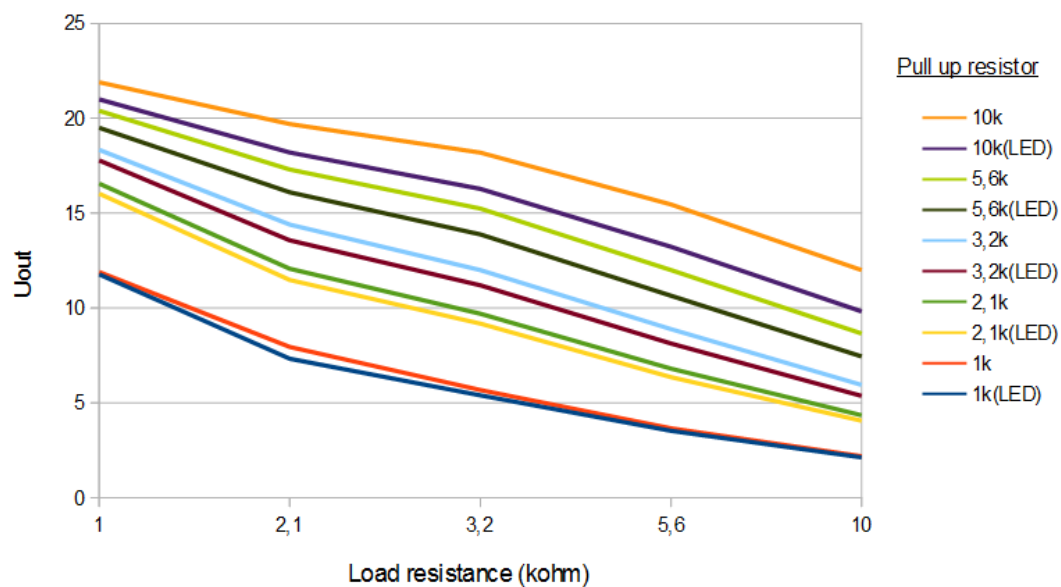
You must select the appropriate pull-up resistor to adjust the sensor to your measuring device:

- What are the voltage levels of the ideal pulse your measuring device accepts as low and high values?
- What is the approximate input resistance of the device?

The low level of the output will always be under 1V, in most cases under 0,5V, and most measuring devices have 1V or higher low level threshold.

If you know the high level threshold and the input resistance of you device you can easily select the right pull-up resistor value from the following diagram. The diagram shows the high output voltage versus load resistance at different pul-up resistors, with LED or without LED applied, measured at $U_s = 24VDC$.

Selecting pull-up resistor knowing the load resistance (input resistance of measuring device)



If you do not know the levels and the input resistance, use 2,2kohm pull-up resistor, that will work in most of the cases. If you select 1k pull-up resistor you must know that it can lead 24mA current in off state which is more than 0,5W dissipation!

PPL values for different RCDL meters:

Meter type	PPL	PPG
M25	26,2	99,15
M35	16,75	63,35
M40	11,85	44,9
M70	6,15	23,4
M120	3,15	11,85
M170	1,9	7,3

Manufacturer:
Metport Ltd. www.metport.hu