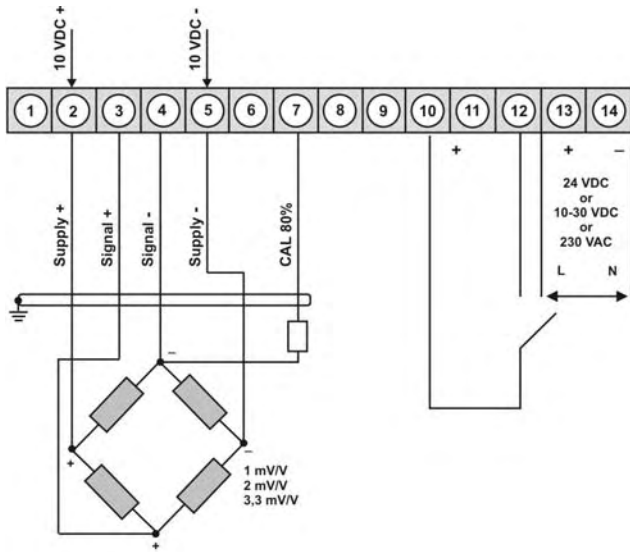




PM5 – 5-digit digital panel meter in 96x48 mm (BxD) Strain gauge amplifier with 80% calibration for 350 Ω melt pressure sensors

- red display of -19999...99999 Digits; 14 mm digit height
- installation depth: 134 mm without plug-in screw terminal
- DMS-4-wire measurement
- adjustable input amplification for 1 mV/V-, 2 mV/V- or 3.3 mV/V-sensors
- integrated bridge supply for standard 350 Ohm measuring bridges
- permanente wire breackage monitoring
- bipole input range for pressure and tractive forces
- integrated facoty calibration for preset weighing cells
- auto-sensor recognition for 1 mV/V, 2 mV/V and 3.3 mV/V-sensors
- measuring rate with up to 50 measurements/s (measuring time is adjustable from 0.02s...10.00s)
- 24 bit transducer resolution, of which 19 Bit are noiseless (500,000 / 0.0002% of measuring range)
- high long-term and temperature stability
- free selectable scaling and decimal point adjustment
- sensor alignment with up 30 additional support points
- taring-function for manual and automatic control
- fully automatic or semi-automatic calibration functions
- min/max memory with ajustable perment display
- display flashing at threshold exceedance /undercut
- flexible alarm system with adjustable delay times
- programming interlock via access code
- protection class IP54 at the front side
- optional: protection class IP65 at the front side
- optional: plug-in screw terminal
- optional: 2 or 4 relay outputs
- optional: independently scalable analog output
- optional: interface RS232 or RS485
- accessories: PC-based configuration-kit PM-TOOL with CD & USB-adapter

• 4-wire technology for strain gauge amplifier

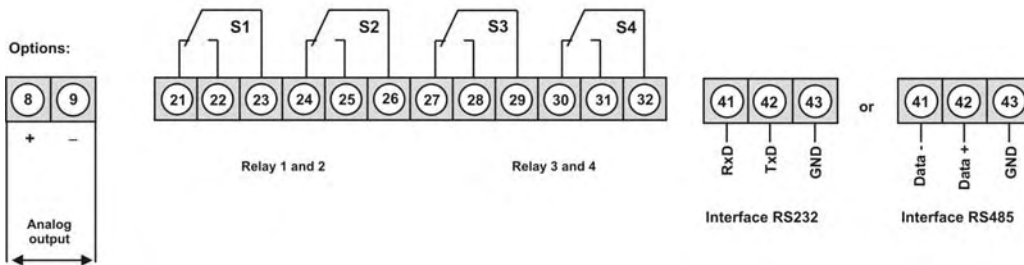


Supply 230 VAC

PM5.020X.1540B

Supply 24 VDC
(galv. insulated)

PM5.020X.1740B



• Product key options

P	M	5.	0	2	0	X.	1	5	4	0	B
P	M	5.	0	2	0	X.	1	7	4	0	B

EUR

2	2 relay outputs
4	4 relay outputs
1	Protection class IP65 at the front
7	Protection class IP65 at the front and plug-in terminal
9	Plug-in terminal
4	115 VAC voltage supply
1	Analog output 0-10 VDC with 230 VAC / 115 VAC Analog output 0-10 VDC with 24 VDC
2	Analog output 0-20 mA with 230 VAC / 115 VAC Analog output 0-20 mA with 24 VDC
3	Analog output 4-20 mA with 230 VAC / 115 VAC Analog output 4-20 mA with 24 VDC
2	Interface RS232 without galvanic insulation
3	Interface RS232 with galvanic insulation with 230 VDC / 115 VAC Interface RS232 with galvanic insulation with 24 VDC
4	Interface RS485 with galvanic insulation with 230 VDC / 115 VAC Interface RS485 with galvanic insulation with 24 VDC

On demand state dimension unit on order, e.g. kN.

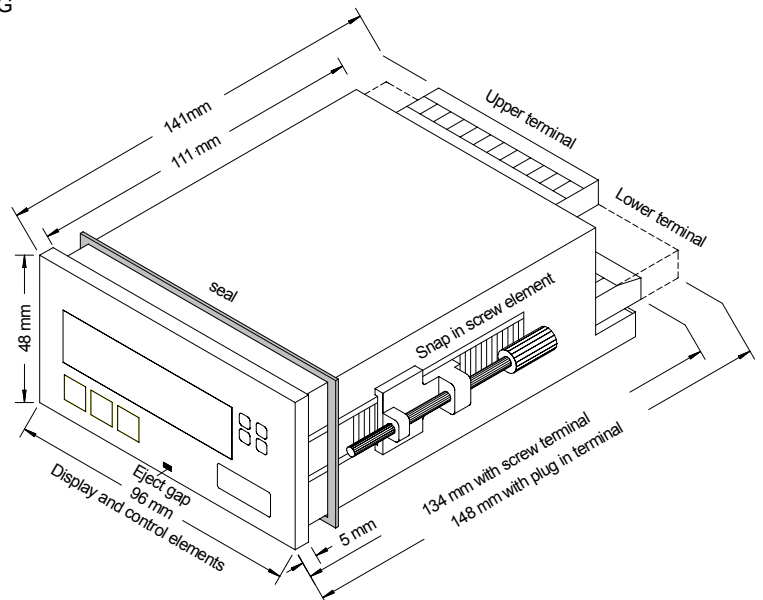
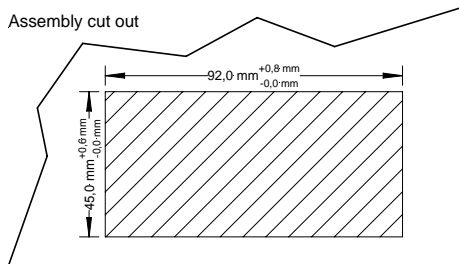
• Parameterisation software

PC based configuration software PM-Tool for devices without keypad, for a simple adjustment of standard devices, incl. CD & USB-adapter. Programming is made via an interface on the back.

PM-TOOL-PX5U5B

• **Technical data**

Dimensions	Housing	B96 x H48 x D143 mm, including plug-in terminal	
	Panel cut-out	92.0 ^{+0.8} x 45.0 ^{+0.6} mm	
	Fixing	latchable screw element for a wall thickness up to 50 mm	
	Housing material	PC/ABS-blend, black, UL94V-0	
	Protection class	at the front IP54 standard, at the back IP00	
	Weight	approx. 450 g	
Display	Connection	plug-in terminal; wire cross-section up to 2.5 mm ²	
	Display	5-digit	
	Digit height	14 mm, segment colour: red	
	Display range	-9999 to 99999	
	Switching points	one LED per switching point	
	Overflow	horizontal bars at the top	
Measuring input	Underflow	horizontal bars at the bottom	
	Display time	0.1 to 10.0 seconds	
	Measuring range (adjustable)	± 6 mV/V ± 3.3 mV/V ± 2 mV/V ± 1 mV/V	
	Measuring accuracy (at 1s measuring time)	0.002% of measuring range 0.1% of measuring range 0.75% of measuring range	} Under laboratory conditions in controlled electromagnetic environment in industrial areas.
	Measuring bridge	200 Ω...500 Ω	
	Bridge supply	approx. 10 VDC	
Input resistance signal	approx. 5 kΩ		
Drift of temperature	20 ppm/K		
Measuring principle	Sigma/Delta		
Output	Measuring rate	0.01s...10.00s	
	Resolution	24 bit, max. 19 Bit RMS	
	Relay	with change-over contact 250 V / 5 AAC, 30 V / 5 ADC	
	Switching cycles	30 * 10 ³ at 5 AAC, 5 ADC ohm resistive burden, 10 * 10 ⁶ mechanically	
	Analog output (galv. insulated)	Division according to DIN EN50178 / Characteristics according to DIN EN 60255 0-10 VDC (12 bit) burden ≥ 100 kΩ, 0-20 mA (12 bit) burden ≤ 500 Ω 4-20 mA (12 bit) burden ≤ 500 Ω	
	Sensor supply	10 VDC / 20 mA; 24 VDC / 50 mA	
Digital input	Input galv. insulated	< 2,4 V OFF; 10 V ON; max. 30 VDC, R _i ~ 5 kΩ	
Interface	Protocol	ASCII manufacturer-specific	
	RS232	9.600 Baud, no parity, 8 DataBit, 1 StopBit, wire length max. 3 m	
	RS485	9.600 Baud, no parity, 8 DataBit, 1 StopBit, wire length max. 1000 m	
Power pack	Supply	230 VAC 50/60 Hz/± 10 % (max. 15 VA) 115 VAC 50/60 Hz/± 10 % (max. 15 VA) 24 VDC /± 10 % galv. insulated (max. 15 VA)	
	Memory	EEPROM	Data life ≥ 100 years at 25°C
	Ambient conditions	Working temperature	0 to + 50 °C
Storing temperature		-20 to + 80 °C	
Weathering resistance		relative humidity 0-85% on years average without dew	
CE-sign	Conformity according to directive 2004/108/EG		
EMV	EN 61326, EN 55011		
Safety standard	EN 61010		



• Ordering code

	P	M.	5	0	2	0	X.	1	5	9	0	B	
Processor device													Version <input type="checkbox"/> B Version B
Base 4-wire technology		<input type="checkbox"/> M											Setpoints <input type="checkbox"/> 0 no setpoint <input type="checkbox"/> 2 2 relay outputs <input type="checkbox"/> 4 4 relay outputs
Number of digits 5 digits				<input type="checkbox"/> 5									Mechanical options <input type="checkbox"/> 1 IP65, foil keyboard, screw terminal <input type="checkbox"/> 4 IP54, foil keyboard, screw terminal <input type="checkbox"/> 7 IP65, foil keyboard, plug-in terminal <input type="checkbox"/> 9 IP54, foil keyboard, plug-in terminal
Interface no interface RS232 RS232 (galv. insulated) RS485 (galv. insulated)													Power supply <input type="checkbox"/> 4 115 VAC <input type="checkbox"/> 5 230 VAC <input type="checkbox"/> 7 24 VDC (galv. insulated)
Sensor supply Bridge supply 10 VDC												<input type="checkbox"/> 2	Size of housing <input type="checkbox"/> 1 96x48 mm (BxH)
Outputs no output 0-10 V 0-20 mA 4-20 mA													Measuring input <input type="checkbox"/> X 1 mV/V, 2 mV/V, 3.3 mV/V