

Programmable Process Indicator TC660



- ◆ From 20 to 45 mm high digits
- ◆ Universal programmable input
- ◆ Two programmable alarm relays
- ◆ Programmable digital filter
- ◆ Calibration and Self-calibration
- ◆ Isolated current output
- ◆ RS485 serial interface option

TC660 is a multifunctional and cheap programmable process indicator for panel mounting, based on the COMECO model RT384. It has a **universal input** for the most common thermoresistances, thermocouples and linear signals. The input has a built-in automatic software compensation of line resistance and cold junction temperature as well as automatic software compensation of temperature drift. The operator can **calibrate the input** manually. TC660 is also equipped with a **programmable input filter** and a 4-digit display with programmable refresh rate. Available are various options for **access restriction**. The device has two programmable alarm relay outputs and an **isolated current output** as option. TC660 can be also equipped with an isolated **RS485 option**. The device can be ordered with 20mm or 45 mm LED display providing excellent visibility in many applications.



TI

Technical specifications

Input - universal

Pt100 (w=1.385); 3-wire	-100 to +600 °C
Pt100 (w=1.391); 3-wire	-100 to +600 °C
Cu100 (w=1.426); 3-wire	-50 to +200 °C
Cu100 (w=1.428); 3-wire	-50 to +200 °C
Thermocouple "J"	0 to +1000 °C
Thermocouple "K"	0 to +1300 °C
Thermocouple "S"	0 to +1700 °C
Thermocouple "R"	0 to +1700 °C
Thermocouple "B"	+100 to +1800 °C
Thermocouple "L - GOST"	0 to +600 °C
Linear voltage <sup>(1)</sup>	0 to 50 mV (-1999 to +9999)
Linear current	0 to 20 mA (-1999 to +9999)
Linear current	4 to 20 mA (-1999 to +9999)
Input type selection	through keyboard
Decimal point selection	through keyboard
Digital filter	programmable
Input calibration	through keyboard

Outputs

Relay electromechanical	2 x 5A/250V with NO/NC contact
Solid state relay (optional)	SSR – 1A/250 VAC
Transistor gate (optional)	Open collector - 40mA/40V or TTL
Operation modes	manual and automatic
Alarms	programmable
Current output (optional)	4(0) to 20 mA, isolated
Serial interface (optional)	RS 485, isolated

<sup>(1)</sup> Other voltage ranges can be obtained using two external resistors

Accuracy

Measurement error	0.3 % from span
Temperature drift	negligible
Self-calibration	Automatic software
Cold junction compensation	Automatic software
RTD line compensation	Automatic software

Power supply

Supply voltage	220(110)VAC or low-voltage
Consumption	Max. 3 VA

Indication and keyboard

Display digit height [mm]	20(D-model) or 45(E-model)
Operating LED	one for each relay
Keyboard	4 membrane keys

Operating conditions

Operating temperature	-10 to 65 °C
Operating humidity	0 to 85 %RH

Construction

	Model "D"	Model "E"
Mounting cut-out	93x45 mm	140x68 mm
Front dimensions (W x H x D)	96x48x120 mm	144x72x105 mm
Maximum weight	300 g	400 g
Mounting	Panel mounting	
Wiring	Screw terminals	
Case material	Plastic	
Protection front/terminals	IP-54 / IP-20	

Ordering code



TC660\* - G1.G5G5.G9.G11

Code	Feature or option	Code values
*	Variant (model)	D - 20mm display height, E - 45mm display height
G1	Power supply	A - 220 VAC, B - 110 VAC, D - low-voltage DC <sup>(2)</sup> , E - low-voltage AC <sup>(2)</sup> ,
G5	Relay output type	C - relay NO/NC, D - SSR, E - open collector NPN, G – TTL
G9	Interface <sup>(3)</sup>	X - none, B - RS 485
G11	Analog output <sup>(3,4)</sup>	X - none, E - 0...20 mA, F - 4...20 mA

<sup>(2)</sup> Specify the exact voltage when order!

<sup>(3)</sup> Contact COMECO for availability. Not available with low-voltage power supply!

<sup>(4)</sup> Instead of alarm relay G5\_ \_!

For detailed instructions on ordering coding see chapter "ORDERING CODES"!

COMECO reserves the right of changing specifications without prior notice!