

# Flexible current transformer

## Main features

- Set comprising 2 components: The 1A measurement transducer and a Rogowski coil with 300 or 600 mm length (depending on model).
- The diameter of the measurement coil is 95 or 190 mm once installed (depending on model).
- The Rogowski coil serves for AC current measurement for conductor rails and heavy current lines.



Description	Item no.	Diameter	Length	Weight
Flex-CT-1A-300mm (with measurement transducer)	<b>15.03.600</b>	95 mm	300 mm	190 g
Flex-CT-1A-600mm (with measurement transducer)	<b>15.03.601</b>	190 mm	600 mm	195 g
Rogowski coil 300mm (without measurement transducer)	<b>15.03.602</b>	95 mm	300 mm	190 g
Rogowski coil 600mm (without measurement transducer)	<b>15.03.603</b>	190 mm	600 mm	195 g

Technical data	
Measurement transducer supply	
Rated supply voltage	24 V DC -20% ... +25 %
Rated supply voltage range	19,2 V DC ... 30 V DC
Maximum power consumption	190 mA
Power consumption	4 W
Input data for measurement coil	
Frequency measuring range	10 Hz ... 5000 Hz
Position error	< 1 % (the measurement coil is located at a right angle to the live conductor) < 1.5 % (the measurement coil is positioned across the live conductor at an angle)
Linearity error	0,1 %
Input data for measurement transducer	
Metering ranges (current)	100 A, 250 A, 400 A, 630 A, 1000 A, 1500 A, 2000 A, 4000 A
Phase angle	< 1 °
Rated power	1,5 VA
Signal input for measurement transducer	
Input signal (at 50 Hz)	100 mV (1000 A)
Signal output for measurement transducer	
Burden	0 Ω ... 1,5 Ω
General data for measurement coil	
Length of the signal line	3000 mm
Conductor design for signal line	2 x 0.22 mm (signal (tin-plated)) 1 x 0.22 mm (shielding (tin-plated))
Rated insulation voltage	1000 V AC (rms CAT III) 600 V AC (rms CAT IV)

General data for measurement transducer	
Linearity error	< 0.5% (from the range final value)
Maximum transfer error	≤ 0.5% (from the range final value)
Frequency range	45 Hz to 65 Hz
Power consumption	< 190 mA (at 19.2 V)
Housing material	Polyamide
Protection class	IP20
Test voltage	1.5 kV AC (supply / input and output: 50 Hz, 1 min)
General data	
Standards/Regulations	IEC 61010-1, IEC 61010-031, IEC 61010-2-031, IEC 61010-2-032
Overvoltage category	III (1000 V, to the neutral conductor) IV (600 V, to the neutral conductor)
Connection data	
Connection name	Measurement transducer side
Min. conductor cross-section (flexible)	0,2 mm <sup>2</sup>
Max. conductor cross-section (flexible)	2,5 mm <sup>2</sup>
Min. conductor cross-section (rigid)	0,2 mm <sup>2</sup>
Max. conductor cross-section (rigid)	2,5 mm <sup>2</sup>
Dimensions	
Width	22,50 mm
Height	70,40 mm
Depth	85,00 mm
Environmental conditions	
Ambient temperature (during operation)	-30 °C to 80 °C (measurement coil) -20 °C to 70 °C (measurement transducer)
Ambient temperature (storage/transport)	-40 °C to 90 °C (measurement coil) -25 °C to 85 °C (measurement transducer)

## FLEX-CLAMP bracket

### Firm seating of the Rogowski coil

The optional holding fixture provides firm seating for the Rogowski coil on busbars with a thickness of 5 to 15 mm. During installation, the coil housing is pushed onto the flange of the holding fixture and locks into place automatically.



Type	Description	Dimensions in mm (W x H x D)	Weight (kg)	Item no.
FLEX-CLAMP	Holding fixture for Rogowski coil on busbar (15.03.600, 15.03.601, 15.03.602, 15.03.603)	Approx. 37 x 45 x 37	Approx. 0.5	<b>15.03.606</b>