



# TR/iTR sensors

## Split-core AC current sensors

used with DIRIS Digiware, DIRIS A-40 and DIRIS B

Current sensors



TR Split-core current sensors

### Function

The **split-core current sensors** in the **TR** and **iTR** ranges enable the current of an electrical installation to be measured. Used with power monitoring device DIRIS Digiware, DIRIS A-40, DIRIS B, they make it possible to perform measurements between 25 and 600 A, with guaranteed accuracy. The RJ12 connection provides quick connections, and the integrated intelligence prevents any configuration errors.

The sensors in the **iTR** range revolutionise the world of measurement and provide access to VirtualMonitor status monitoring technologies and to AutoCorrect automatic configuration.

### Advantages of the TR and iTR ranges

#### Smart sensors

- Sensors with an extended operational range.
- Automatic detection of rating.
- Secured disconnection of load.
- Quick connection via RJ12 and identification of cable by colour code.

#### Accurate

- Measurement precision guaranteed in acc. with standard IEC 61557-12 : class 0.5 (iTR) or 1 (TR) for the global measuring chain from 2 to 120% of  $I_n$ .

### Unique advantages of the iTR range

#### VirtualMonitor technology

VirtualMonitor technology makes it possible to monitor the status of protective devices:

- Throughout your electrical installation.
- Remotely and in real-time.
- Without additional hardware or wiring.

#### AutoCorrect technology

AutoCorrect technology guarantees that your measurement system will function properly through:

- Automatic installation verification (by checking phase sequencing and automatic configuration of the direction of current).
- Correction of errors.

### The solution for

- > Retrofit applications
- > Industry
- > Building
- > Infrastructure
- > Data centers



### Strong points

- > Smart sensors
- > PreciSense technology: Global accuracy in accordance with the IEC 61557-12 standard.
- > Easy installation and configuration.

### Integrated technologies<sup>(1)</sup>



<sup>(1)</sup> AutoCorrect and VirtualMonitor are only available with iTR sensors.

For more information, see page

### Compliance with standards

- > IEC 61557-12



- > ISO 14025



- > UL



### Create your project

- > Find the best DIRIS Digiware configuration:  
[www.meter-selector.com](http://www.meter-selector.com)



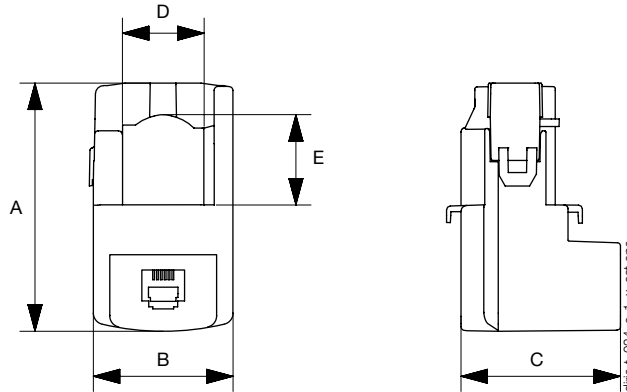
## Installation

Cable mounting



## Dimensions

TR-10 / TR-14 / TR-21 / TR-32



Model	Nominal current range (A)	Actual coverage range (A)	A (mm)	B (mm)	C (mm)	D (mm)	E (mm)	Ø (mm)
TR/iTR-10	25 ... 63	0.5 ... 75.6	44	26	28	-	-	10
TR/iTR-14	40 ... 160	0.8 ... 192	67	29	28	14	15	14
TR/iTR-21	63 ... 250	1.26 ... 300	65	37	43	21	23	21
TR/iTR-32	160 ... 600	3.2 ... 720	86	53	47	32	33	32

## Technical characteristics

Model	TR-10	iTR-10	TR-14	iTR-14	TR-21	iTR-21	TR-32	iTR-32
Nominal current range $I_n$ (A)	25 ... 63		40 ... 160		63 ... 250		160 ... 600	
Actual coverage range (A)	0.5 ... 75.6		0.8 ... 192		1.26 ... 300		3.2 ... 720	
Max. current (A)	75.6		192		300		720	
Weight (g)	74		117		211		311	
Max. voltage (phase/neutral)	300 V							
Rated withstand voltage	3 kV							
Frequency	50/60 Hz							
Intermittent overload	10 x $I_n$ for 1 s							
Measurement category	CAT III							
Global class used with Diris Digiware/A-40/B-10/B-30	Class 1	Class 0.5	Class 1	Class 0.5	Class 1	Class 0.5	Class 1	Class 0.5
Protection degree	IP20 / IK07							
Operating temperature range	-10 to +70°C						-10°...+55°C	
Storage temperature range	-25 to +85°C							
Relative humidity	95% RH non-condensing							
Altitude	< 2000 m							
Connection	Socomec RJ12 cable							

## References

Model	Nominal current range (A)	Actual coverage range (A)	Ø (mm)	Part number
TR-10	25 ... 63	0.5 ... 75	10	4829 0555
TR-14	40 ... 160	0.8 ... 192	14	4829 0556
TR-21	63 ... 250	1.26 ... 300	21	4829 0557
TR-32	160 ... 600	3.2 ... 720	32	4829 0558

Model	Nominal current range (A)	Actual coverage range (A)	Ø (mm)	Part number
iTR-10	25 ... 63	0.5 ... 75	10	4829 0655
iTR-14	40 ... 160	0.8 ... 192	14	4829 0656
iTR-21	63 ... 250	1.26 ... 300	21	4829 0657
iTR-32	160 ... 600	3.2 ... 720	32	4829 0658

RJ12 connection cables	Cable length (m)								
	0.1	0.2	0.3	0.5	1	2	5	10	50 m reel + 100 connectors
Number of cables	Part number	Reference	Reference	Reference	Reference	Reference	Reference	Reference	Reference
1	-	-	-	-	-	-	4829 0602	4829 0603	4829 0601
3	4829 0580	4829 0581	4829 0582	4829 0595	4829 0583	4829 0584	-	-	-
4	-	-	-	4829 0596	4829 0588	4829 0589	-	-	-
6	4829 0590	4829 0591	4829 0592	4829 0597	4829 0593	4829 0594	-	-	-