Rail Mount Meters (Class 1)


EC320CM


EC330CM


EC320CD


EC330CD

Ecolec Rail Mount Meters									E2
Type	**Phase**	**Voltage**	**Frequency**	**Max Rating***	**Escutcheon**	**No. Of Modules**	**Std. Pack**	**Price Ea.** excl. VAT	**Order No.**
EC320CM	1 + N	230 V	50	80 A	57 mm	2	6	R 936.00	EC320CM
EC320CD	1 + N	230 V	50	80 A	45 mm	2	6	R 936.00	EC320CD
EC330CM	3 + N	415 V	50	80 A	57 mm	4	3	R 2 644.00	EC330CM
EC330CD	3 + N	415 V	50	80 A	45 mm	4	3	R 2 644.00	EC330CD

*** Note: Anything above 80 A - CT needed**

Rail Mount Meter

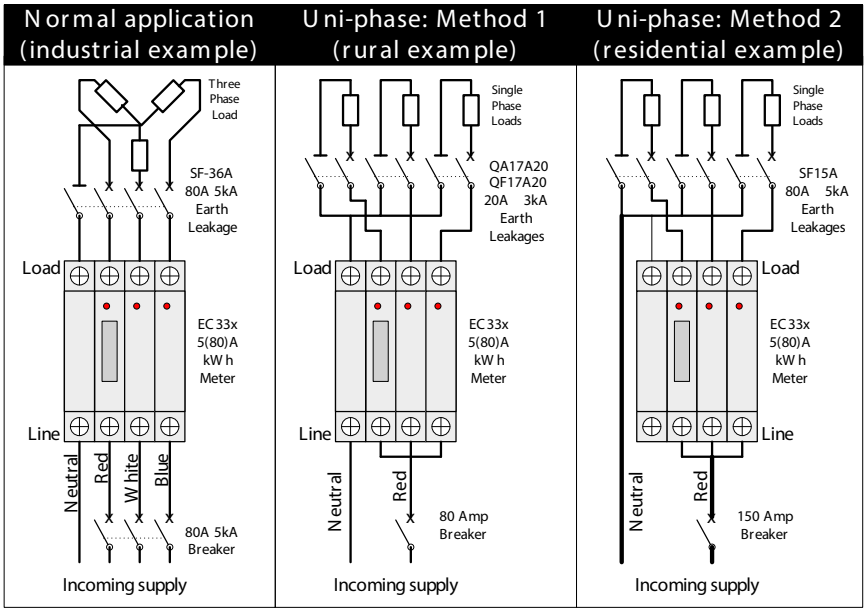
Rail mount meters are based on a meter module width of 13 mm with the single phase being 2 modules and the three phase 4 modules. The meter uses an integral current transformer as a measuring element and will count positive no matter from which direction the current is drawn. The display is a conventional cyclometer. The range included mini and DIN rail mounting, 230 V, 50 Hz.

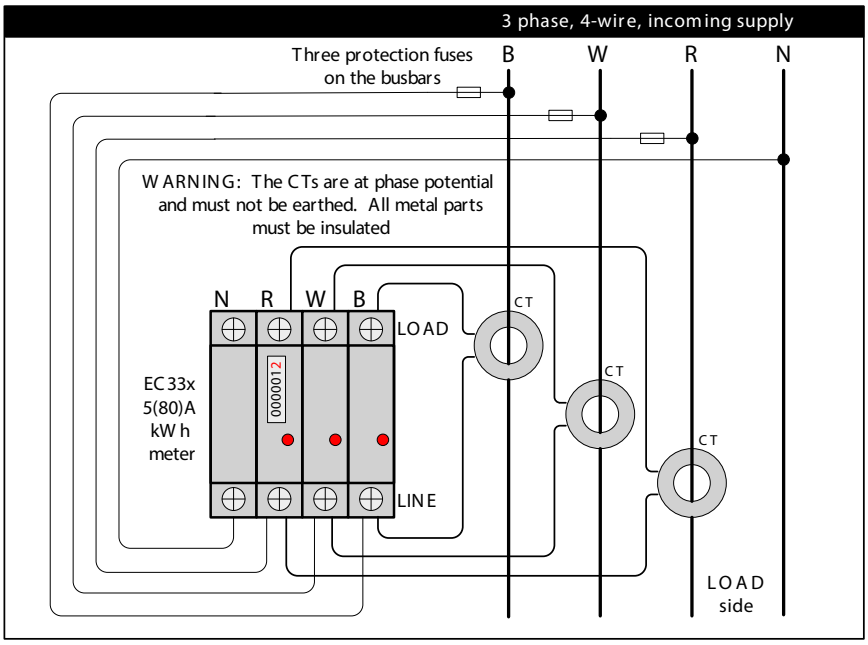
Features

- SANS 1799 class 1 electricity meters
- Class 1: accuracy < 1%
- Single and three phase alternatives
- Fits all CBI mini and DIN rail distribution boards
- 7 Digit tamper-proof counter
- Anti-tamper terminal protection plugs
- Also available in 120 V / 60 Hz
- LED status and kWh consumption indicator
- Remote monitoring: LIN bus
- IP-45 rating
- 57 mm (dual mount) and 45 mm (DIN rail) escutcheon

LED Indications	
LED Indication	**Reason / Description**
Pulses RED	Normal consumption pulses (1000 pulses per kilo watt hour)
Pulses GREEN	Low load condition (consumption is less than 30 watts)
Solid GREEN	No load (meter is powered up)
Pulses ORANGE	Abnormal load (supply voltage is between 265 - 460 V or 60 - 90 Vac)
Solid ORANGE	Unsafe load condition (the current being drawn is greater than 125 A or the supply voltage is greater than 460 Vac)
Solid RED	Error condition (the meter's internal built in test has failed) / replace unit
No LED	No LED indication (insufficient supply voltage)

Wiring diagram





EC 300 series kWh consumption when using external CTs

There is a requirement to measure loads in excess of the meter's maximum current rating of 80 A. This can be done by using external CTs. Only class 1 type CTs are recommended for metering measurement purposes.

The actual kWh consumption per phase can be calculated as follows:

CT Ratio x △ Counter Value (multiply the CT ratio being used by the difference between the current and the previous meter reading)

E.g.: For a 200/5 CT ratio the factor is 40.
Therefore the consumption per phase = 40 x kWh consumed.

For CT Selection, please refer to the NRS057 specification parts 1, 2 and 4.

NOTE: Do not earth CTs fitted above!

Product Approvals

- SANS IEC 61036 test report MTR/BB0630-SR
- 5(80) A
- SANS 1799

Smart Wi-Fi Rail Mount Meters (Class 1)

36 month subscription included in price

EC320CM-W

EC330CM-W

NEW

Smart Wi-Fi Rail Mount Meters, Dual Mount, 57 mm Escutcheon*									NETT
Type	Phase	Voltage	Frequency	Max Rating*	Escutcheon	No. Of Modules	Std. Pack	Price Ea. excl. VAT	Order No.
EC320CM-W	1 + N	230 V	50	80 A	57 mm	2	6	R 1 978.00	EC320CM-W
EC330CM-W	3 + N	415 V	50	80 A	57 mm	4	3	R 3 636.00	EC330CM-W
Smart Wi-Fi Rail Mount Meters, DIN Rail, 45 mm Escutcheon*									**NETT**
EC320CD-W	1 + N	230 V	50	80 A	45 mm	2	6	R 1 978.00	EC320CD-W
EC330CD-W	3 + N	415 V	50	80 A	45 mm	4	3	R 3 636.00	EC330CD-W

Notes:

Anything above 80 A - CT needed
***For the initial 36 months, the subscription is included. After this period, a value based on the Consumer Price Index (CPI) will be added.**

Smart Wi-Fi Rail Mount Meters

CBI :energy's Managed Smart Metering system reduces electricity bills by making buildings smarter, providing real-time information needed to manage operations better. A combination of connected smart meters, powerful software and advanced analytics transform detailed, real-time data into decision-ready insights.

Features

- Billing-grade Smart Meters: compact Class 1 (SANS 1799) internet-connected smart metering
- Per-minute telemetry (real and reactive power and energy, current, voltage, power factor) displayed in user-friendly web-based portal
- Full four-quadrant, <1% accuracy for metering of electricity generation and consumption
- Single phase, three phase and three-way stacked single phase
- Wi-Fi connectivity for flexible, low-cost wireless deployment
- Simple to integrate with other software systems through open API
- Simple to install, fits any CBI Mini rail (57 mm escutcheon)
- Seven-digit anti-tamper human-readable total energy (kWh) counter
- 5 A - 80 A rating, can add external CTs for larger loads
- Monitor and control usage through graphs and line charts
- Monitor per phase consumption on multi pole units.
- Info is available for download to excel

LED Indications	
Meter Status LED	**Reason / Description**
Pulses RED	Normal consumption (1000 pulses/kWh)
Solid RED	Error condition (internal test failed)
Pulses GREEN	Low load (less than 30 watts)
Solid GREEN	No load (meter is powered up)
Pulses ORANGE	Abnormal load (supply voltage 265 - 460V or 60 - 90V AC)
Solid ORANGE	Unsafe load condition (>125A or supply >460V AC)
No LED	No LED indication (insufficient supply voltage)
Wi-Fi Status LED	**Description**
Pulses BLUE (one sec)	Connected Wi-Fi with Internet access
Flashes BLUE (rapid)	Connected Wi-Fi, but no Internet access
Pulse RED	Failed to connect to Wi-Fi
Pulse alternate RED / BLUE	Device in Wi-Fi pairing mode
Flashing PURPLE (RED+BLUE)	Device firmware updating