



SDM 230DR/BI

SINGLE PHASE 2 WIRE KWH METER

- 100A MAX. direct load
- Active energy + power measured
- Resettable energy
- Pulse output
- Din rail mounted



Specification

Model	SDM 230DR / SDM230BI
Display	LCD with Backlit
Nominal voltage(Un)	120V or 230V ac
Operational voltage	80% – 120% of Un
Insulation capabilities	
- AC voltage withstand	4KV for 1 minute
- Impulse voltage withstand	6KV-1.2μs
Basic current (Ib)	10A
Maximum rated current (Imax)	100A
Operational current range	0.4% Ib - Imax
Over current withstand	30 Imax for 0.01s
Operational frequency range	50 or 60Hz
Internal power consumption	≤ 2W/10VA
Pulse output 1	1000imp/kWh
Pulse output 2	1000imp/kWh
Max reading	999999.9 kWh

Performance criteria

Operating humidity	≤ 90%
Storage humidity	≤ 95%
Operating temperature	-25°C - +55°C
Storage temperature	-40°C - +70°C
Reference temperature	23°C ± 2°C
International standard	IEC 62053-21 / EN50470-1/3
Accuracy class	Class 1/Class B
Installation category	CAT II
Mechanical environment	M1
Electromagnetic environment	E2
Degree of pollution	2
Protection against penetration of dust and water	IP51 (indoor)
Insulating encased meter of protective class	II
Electrostatic discharges	8kV contact / 15kV air gap
Electromagnetic HF fields	IEC 61000-4-3
Electrical fast transients	4kV
Surge	4kV
Radiated & conducted emissions	EN 55022

MECHANICS

Din rail dimensions	99x36x63 (WxHxD) DIN 43880
Mounting DIN rail	35mm
Sealing	IP51 (indoor)
Material	self-extinguishing UL94V-0

Description Buttons



7 digits used to display measured value
Measurement units

1000imp/kWh

Button

There are two buttons on the front panel of SDM230DR and SDM230BI:

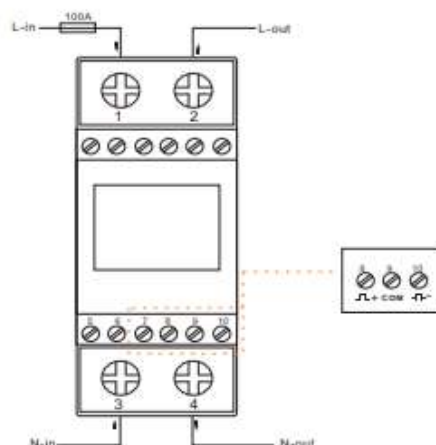


This button is used to scroll the information pages.



This button is used to reset the partial energy information.

Wiring diagrams



Dimensions

