



AEL.TF.27

AEL.TF.27 — Three-phase active prepayment meter. It operates at 3×230/400 V reference voltage over a 5(80) A current range and measures active energy to accuracy class Class B (1). It is MID approved.

3×230/400 V

50 Hz ±5%

5(80) A

Direct connection

Class B

Active accuracy (1)

IP54

-40...+70 °C outdoor

4 Tariffs**KEY FEATURES**

- ◆ 3×230/400 V · 0.25–5(100) A
- ◆ Credit top-up with smart card
- ◆ Emergency credit and low balance warnings
- ◆ Automatic disconnect relay when credit runs out
- ◆ Multi-tariff active metering
- ◆ Fully integrated with the vending software

MID 2014/32/EU

CE

EN 50470

TECHNICAL SPECIFICATIONS**ELECTRICAL DATA**

Reference voltage (Un)	3×230/400 V
Operating voltage range	3×150 V/260 V (min) – 3×260 V/450 V (max)
Reference frequency (Fn)	50 Hz ±5%
Reference current (In/Ib)	5 A
Maximum current (Imax)	80 A
Starting current (Ist)	0.02 A (0.04 × Itr)
Minimum current (Imin)	0.25 A
Transitional current (Itr)	0.5 A
Accuracy class	Active B (Class 1)
Meter constant	1000 imp/kWh
Voltage circuit consumption	≤ 2 W / ≤ 10 VA
Current circuit consumption	≤ 1 VA

METERING AND RECORDING

Meter definition	Three-phase, 4-wire, active electronic meter
Connection type	Current and voltage: direct
Number of tariffs	4
Measurement direction	Single direction
Data storage capacity	1 year
LCD display	9 (6+3) digits
LED pulse output	1 LED (active)
Optional features	Disconnect/reconnect relay

COMMUNICATION

Communication interface	Optical port (IEC 62056-21)
Baud rate	300 – 4,800 Baud
Expansion modules	RFID

ENVIRONMENT AND MECHANICS

IP class	IP54 (outdoor)
Protection class	II
Operating temperature	–40 °C ... +70 °C (3K7)
Relative humidity	95% (non-condensing)
Mechanical / EM environment	M1 / E2 (2014/32/EU)
Operating environment	Non-condensing humidity
ESD withstand	Contact 8 kV · air 15 kV
Impulse voltage withstand	6 kV

BATTERY, CLOCK AND LIFE

System battery life	≥ 10 years
RTC battery life	≥ 10 years
Shelf life	≥ 4 years
Clock accuracy	±0.5 s/day (23 °C ±2 °C, EN 62054-21)

STANDARDS AND APPROVALS

Measuring instruments directive	MID 2014/32/EU · CE
Standards	EN 50470-1, EN 50470-3

