

**48250502**

## Multifunction meter DIRIS A-40 communication Sub D9 PROFIBUS DP I/O:3/2



### Strong points

- Plug & Play
- Facilitated integration
- Assisted configuration
- Better than revenue grade

### General characteristics

Plug & Play: quick RJ12 connection to smart current sensors  
Assisted configuration guarantees the fastest and most reliable commissioning  
Embedded web based software  
WEBVIEW-S  
Global accuracy class 0.5 (meter + sensors) in accordance with ANSI C12.20  
Available in Modbus RTU or TCP, BACnet, Profibus

### Compliance with standards

UL 61010-1, CSA-C22.2 No. 61010-1,  
Guide PICQ, File E257746  
ANSI C12.20  
PBI Meter per CA Energy Commission  
IEC 61557-12

### Link to the reference

<https://www.socomec.us/en-us/reference/48250502>

The DIRIS A-40 is a panel mounted power monitoring device compatible with TE/TR/iTR/TF smart current sensors, suitable for new or existing electrical installations.

The DIRIS A-40 has 3 native digital inputs and 2 digital outputs for additional versatility and includes RS485 Modbus RTU, Ethernet Modbus TCP and BACnet IP, and Profibus DP communication to report measurements to external management systems.

<b>----- System -----</b>	
Fill rate E-Order Common	29
Fill rate E-Order Selection	100
<b>Certificates and Declaration</b>	
Conformity to standard #1	UL 61010-1 Guide PICQ File E257746
Conformity to standard #2	CSA-C22.2 No. 61010-1
Conformity to standard #3	IEC 61557-12
Conformity to standard #4	ISO 14025
Proposition 65 California	WARNING This product can expose you to chemicals including bisphenol A (BPA), which is known to the State of California to cause birth defects or reproductive harm. For more information go to : <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a>
<b>Standards</b>	
Conformity to standards	IEC UL
<b>Certificates and Declaration - Safety</b>	
Safety standards	IEC/EN 61010-1 UL 61010-2-030 CSA C22.2 No. 61010-2-030
UL file number	E257746
<b>General Product Characteristics</b>	
Device type	Power Metering and Monitoring Device
<b>Technical Characteristics</b>	
Application	Analysis
Communication ports	Profibus DP
Communication protocols	Modbus RTU - Profibus
Model	A-40
Type	3 inputs/2 outputs
<b>Technical Characteristics - Electrical</b>	
Max voltage (Phase/neutral)	50-300VAC (Ph/N)
<b>Technical Characteristics - Environmental</b>	
Maximum operating altitude	6560 feet / 2000 m
Operating temperature	-10 ... +70 °C / +14 °F ... +158 °F (IEC 60068-2-1/IEC 60068-2-2)
PEP ecopassport - ISO 14025	SOCO-000007-V01.01-EN
Relative humidity	70 °C / 158 °F / 97% RH (IEC 60068-2-30)
Storage temperature	-25 ... +85 °C (IEC 60068-2-1/IEC 60068-2-2)
<b>Technical Characteristics - Measurement</b>	
Accuracy class	Class 0.5
Current measurement type	AC
Frequency rating	50/60 Hz
General measurements	Currents, I1, I2, I3, In, Isystem, Voltages & frequency, V1, V2, V3, VN, Vsystem, U12,

	U23, U31, Ussystem, f, Powers, P1, P2, P3, ?P, Q1, Q2, Q3, ?Q, S1, S2, S3, ?S, Predictive powers ?P, ?Q, ?S, Power factor, PF1, PF2, PF3, ?PF, Cos ? & tangent ?, Instantaneous values per phase, Metering, Active energy: +/- kWh, Reactive energy: +/- kvarh, Apparent power: kVAh, Multi-tariff (8 max.), Hour Meter
Number of Digital inputs/outputs	3 Digital inputs / 2 Digital outputs
Power Quality measurements	Voltage unbalance Vdir, Vinv, Vhom, Udir, Uinv, Unba, Vnba, Vnb, Unb, Current unbalance, Idir, Iinv, Ihom, Inba, Inb, Total harmonic distortion, currents THDi1, THDi2, THDi3, THDiN, TDDI, Phase-to-neutral voltage THDv1, THDv2, THDv3, Phase-to-phase voltage THDu12, THDu23, THDu31, Individual harmonics up to 63rd, Currents: I1h, I2h, I3h, INh, Phase-to-neutral voltage: V1h, V2h, V3h, Phase-to-phase voltage: U12h, U23h, U31h
Voltage measurement type	AC
<b>ETIM - Electrical characteristics</b>	
Accuracy class active energy according to IEC 62053-22	0.2S
Sampling frequency [Hz]	10
Number of voltage measurement inputs	5
Number of current measurement inputs	3
Voltage type (supply voltage)	AC/DC
Supply voltage DC [V]	120..120
Measuring range for frequency [Hz]	45..65
Number of analogue outputs	2
Number of digital inputs	3
Number of Ethernet-connections	1
Supporting protocol for PROFIBUS	No
Supporting protocol for Modbus	Yes
Supporting protocol for other bus systems	No
Web server with HTTPS transfer protocol	No
<b>ETIM - Mechanical characteristics</b>	
Width [mm]	98
Height [mm]	98
Depth [mm]	85
<b>ETIM - Technical features</b>	
Ampere meter	Yes
Blind power meter	Yes
With rotational speed meter	No
Frequency meter	Yes
Pulse counter	Yes
Voltmeter	Yes
Effective power measurement device	Yes
Display	LCD
Remote display	No
<b>Logistics</b>	
GTIN/EAN	3596033009143
Customs number	9030310090
Price unit	PC
Weight of the packing unit	0.425
Length of the packing unit	0.1
Width of the packing unit	0.12

Depth of the packing unit	0.11
<b>Product Details</b>	
Effective date	2017-03-23
Country of origin	FR
Discount Policy	1EM10
Discount Policy Label	MONITORING DEVICES
<b>Classification</b>	
UNSPSC	83101808
ETIM Class	EC002301
IGCC	6042