

Communicative 24 V supply system

QUINT POWER and CAPAROC

Your advantages at a glance

Combine the power supply components from Phoenix Contact to create an overall concept and benefit from the advantages of system integration.

One central interface for QUINT POWER and CAPAROC

- Rapid integration into the PROFINET network
- Easy and cost-effective integration of QUINT POWER into the network protocol of the CAPAROC circuit breaker system
- Complete data consistency from the 400 V primary side to the 24 V load supply




Quick and easy configuration





- Direct adoption of the configuration from the control level
- Saves time and avoids user errors

Reduce downtimes to a minimum

- The communicative system solution optimizes the data transparency of the entire system
- Errors can be detected in good time, localized, and corrected

www.phoenixcontact.com/power-system

QUINT POWER power supply			 IO-Link
24 DC / 20 A	Type	Input	W x H x D
	QUINT4-PS/ 3AC/24DC/20/IOL	3 x 320 V AC ... 550 V AC 2 x 360 V AC ... 550 V AC +/- 260 V DC ... 300 V DC	70 x 130 x 125 mm
24 DC / 40 A	Type	Input	W x H x D
	QUINT4-PS/ 3AC/24DC/40/IOL	3 x 320 V AC ... 550 V AC 2 x 360 V AC ... 550 V AC +/- 260 V DC ... 300 V DC	120 x 130 x 125 mm

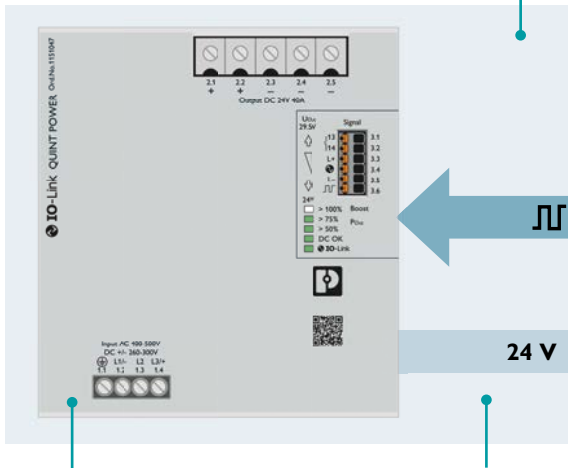
CAPAROC circuit breaker		
	Type	Description
	CAPAROC power modules	<ul style="list-style-type: none"> • With PROFINET interface for complete transparency of all data • Status output, I >80% message • Reset input
	CAPAROC circuit breaker modules	<ul style="list-style-type: none"> • 1-channel: Maximum modularity with 4 protected outputs • 2-channel: Read off currents directly and set conveniently via rotary switch • 4-channel: Maximum space saving with protection per channel from just 3 mm
	CAPAROC potential distribution module	<ul style="list-style-type: none"> • Direct integration into the system • Plus and 0 V are established in pairs and are immediately recognizable via the color-coded pushers
	CAPAROC current rails	<ul style="list-style-type: none"> • Basic current rails • Extension current rails

Communicative supply system

All data at a glance

General operating data

- Temperature
- Operational runtime
- Remaining service life



AC-side diagnostic data

- 3 AC input voltage
- Phase monitoring
- Input frequency
- Rotary field direction

DC-side diagnostic data

- Current
- Voltage
- DC OK
- $P < P_N$

**PROFI
NET**

Digital rating plate

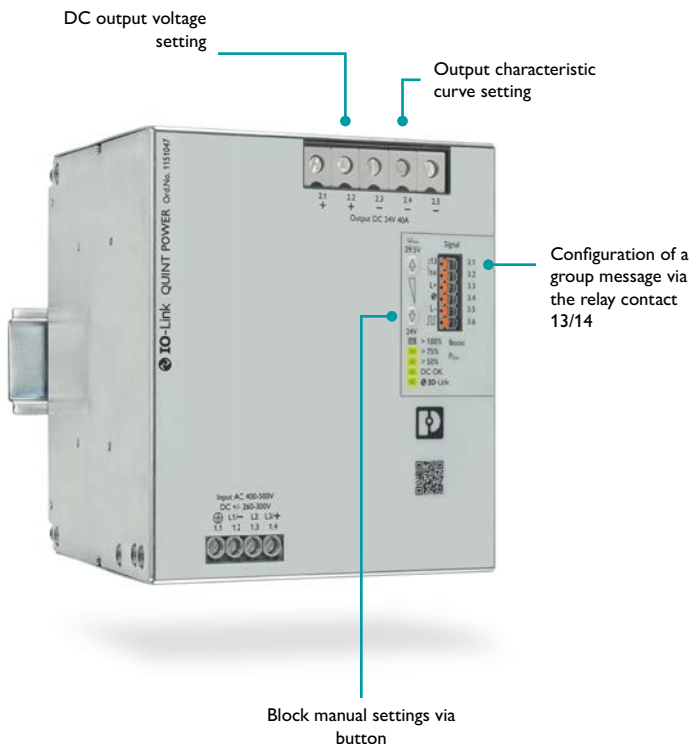
- Device IDs
- Order numbers
- Serial numbers
- Revisions
- Production data



Diagnostic data for the fused DC-side

- Status of all circuits
- On, off, error message
- Early warning at channel current load >80%
- Flowing current
- Error memory

Direct configuration from the controller



QUINT POWER power supplies – your advantages

Most powerful output side

- Static boost of up to 125% for easy system extensions
- Startup of heavy loads with the dynamic boost of up to 200% – over-dimensioning not necessary
- SFB Technology selectively trips standard miniature circuit breakers; loads connected in parallel remain in operation

Robust input side

- Mains buffering >20 ms
- High electrical immunity with integrated gas discharge tube (up to 6 kV)
- Low inrush current

Long service life >> 15 years

- High-quality components
- Optimized arrangement and cooling concept
- Information on the remaining service life enables needs-based maintenance and effective replacement-part procurement

Easy system integration

- Direct integration into the CAPAROC circuit breaker system or QUINT4-UPS

Easy integration into all industrial networks

- With the integrated IO-Link interface

Quick and easy configuration

- Direct adoption of the configuration via the IO-Link master
- Time and cost savings during commissioning
- Minimization of the risk of user errors

Preventive function monitoring

- Comprehensive diagnostic options with evaluation of the input and output data as well as the remaining service life
- Critical operating states are reported before errors arise

Launch



SFB Technology 

Designed by Phoenix Contact



CAPAROC circuit breakers – your advantages

The benchmark that you can tailor

- Numerous possible combinations
- Large selection of individual modules
 - Various power modules
 - 1-, 2-, and 4-channel circuit breaker modules
 - Potential distribution module
 - Current rails designed for modular extension
- Unlimited compatibility of the modules
- Can be extended at any time, even during ongoing operation
- Future system extensions and upgrades
- Will remain technologically state-of-the-art with future updates

Particularly simple operation

- Plug and Play: Intuitive and fast system setup
- Tool-free mounting, installation, commissioning, and expansion
- Recognizable and clear visualization of the various states with color-coded LEDs
- Large-surface marking options
- Intuitive wiring and clear assignment of plus and minus for each circuit with color-coded push-in contacts
- Tool-free maintenance without operational interruptions with the rear-sided supply of all modules

Simple and intuitive design-in

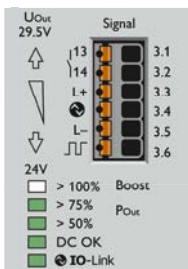
- Tailor your system in just two steps with the intuitive online configurator
- Digital services for your tailored system, from data sheets, through 3D files, all the way to marking and EPLAN files
- Order the entire system with just one individual order number

Launch



QUINT POWER and CAPAROC signaling

QUINT POWER power supplies



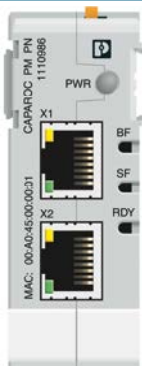
LED: P_{OUT} >100%

LED: P_{OUT} >75%

LED: P_{OUT} >50%

LED: DC OK













CAPAROC circuit breaker system










LED: PWR

LED: Channel

Further signaling options can be found in the QUINT POWER and CAPAROC data

Normal operation $P_{OUT} < 100\% P_N$	Boost $P_{OUT} > 100\% P_N$	Overload operation $P_{OUT} < 0.9 \times U_{SET}$
		
		
		
		

Normal operation 10 ... 30 V DC	Beyond the operating voltage range	No operating voltage
		
Normal operation Channel switched on	Channel load $I > 80\%$	Overload/short circuit Channel switched off
		 5 s Triggered: Cooling phase  Triggered: Ready for switch on

Notes

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