

• **input:**

from 10A to 50 Adc
Up to 50kHz bandwidth.
Screw terminal blocks (50A maxi).

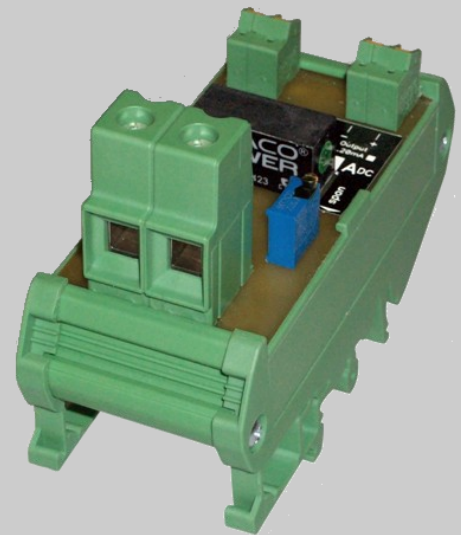
• **Current or Voltage Output**

0 .. 4 .. 20mA, 0..10V, ...
isolated from power supply.

• **Direct shunt replacement**

isolated output (no heat dissipation);

• **Power supply:** 4.5...18Vdc, 18...36Vdc, 9...36Vdc, 18...75Vdc, ...



The CAL35CC transducer allows direct current measurement up to 50 A, replacing favorably shunts, reducing insertion losses and providing a formatted output signal (4..20mA, 0...10 V or mV).

Application: solar farm, wind power, batteries

- Defective solar panels detection
- Panels output power measurement
- Panels orientation regulation
- Battery Monitoring, motors DC current monitoring
- Welding

Description:

- **Inputs:**

Direct Current: unipolar or bipolar (all input range on demand)
Minimum range: 10Adc
Maximum range: 50 Adc

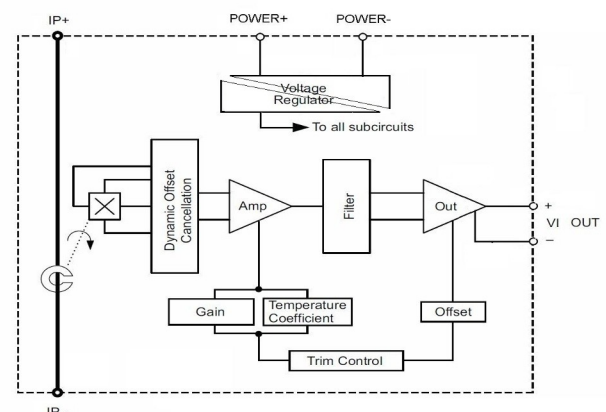
- **Output signal:**

- mirror of the instantaneous input value
- Output voltage, all range up to 10V max (possibility of mV output for direct shunt substitution with isolation)
- Current output: 0 ... 4 20mA)

Feature:

- Plastic profile for symmetrical DIN rail mounting. Protection rating IP20
- Connection:
 - * Power supply and output on spring terminal (1 mm² Max for wire section)
 - * Current circuit measurement: 25 mm² maxi for screw terminals
- Green LED for indication of supply voltage.
- Trimmer for offset and span re-adjustment.
- Power supply protected against reverse polarity.
- Conformal coating.

Synoptic



Version and order code:

CAL35CC current input on terminal block 25mm²

Standard power supply : 18Vdc 36Vdc (default supply range)
Low voltage : 4.5Vdc.....18Vdc Ref. option: **-LWi**
extended standard : 9Vdc.....36Vdc Ref. option: **-Wi**
High voltage : 18Vdc.....75Vdc Ref. option: **-HWi**
other supply voltage on request (230Vac,...)

INPUT

Current	10Adc...50Adc
Input impedance	~ 200 uOhms
Accuracy	+/- 0.7 % of full scale
Standard response time	< 50 ms
In option, bandwidth up to 5KHz (-3 dB, 5Khz for mV)	
Typical response time at 90%	0.4 / cutoff frequency
Admissible overcurrent (maxi.)	6 x I _N for 5 seconds

OUTPUT

TYPE	SCALE
Current	0 ... 4 ... 20 mA or +/- 20mA, ...
Load	0500 Ohms
Voltage (volts)	0 ...1...5....10 V or +/- 10V, ...
output impedance	500 Ohms for 10V
Voltage (mV)	0...50...100...500 mV
output impedance	1 Kohms
(Other output range on request)	

POWER SUPPLY

standard: 18 to 36 Vdc Consumption: <1.5 VA
(All possible nominal voltage from 5Vdc to 300 Vdc or Vac)
reverse polarity protected.

ENVIRONMENT

Operating temperature:	- 25 °C+ 65 °C
Storage temperature:	- 40 °C+85 °C
drift:	~ 0.015% / ° C
Humidity	85% non condensed
Weight	~ 150 gr.
Protection rating	IP20
Dielectric Strength:	
(Input / Power supply / Output)	2000 Vrms continuous (3500 Vrms / 1 min)
(Power supply / Output)	500 Vrms continuous (24Vdc) (3500 Vrms / 1 min) (230Vac)
MTBF (MIL HDBK 217F)	> 1 200 000 Hrs @ 25°C
MTBF (MIL HDBK 217F)	> 1 000 000 Hrs @ 40°C
Life time	> 200 000 Hrs @ 30°C

Electromagnetic compatibility 2014/30/UE / Low Voltage Directive 2014/35/UE

Immunity standard for industrial environments EN 61000-6-2		Emission standard for industrial environments EN 61000-6-4
EN 61000-4-2 ESD	EN 61000-4-8 AC MF	EN 55011 group 1 class A
EN 61000-4-3 RF	EN 61000-4-9 pulse MF	
EN 61000-4-4 EFT	EN 61000-4-11 AC dips	
EN 61000-4-5 CWG	EN 61000-4-12 ring wave	
EN 61000-4-6 RF	EN 61000-4-29 DC dips	



WIRING AND OUTLINE DIMENSIONS:

