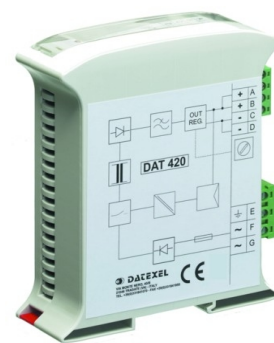


## FEATURES

- AC line input: 100 ÷ 250 Vac
- Input/output galvanic isolated at 4 KVac
- Output : 24Vdc,  $\pm 10\%$  adjustable, 1A
- EMC compliant – CE mark
- In compliance with the safety standard
- Suitable for DIN rail mounting in compliance with EN 50022



## GENERAL DESCRIPTION

The universal AC line input switching power supply unit DAT 420 is designed to provide up to 1A current at 24 Vdc regulated voltage.

The DAT 420 is in compliance with the Directive 2004/108/EC on the Electromagnetic Compatibility and with the Directive 2006/95/EC on the Electric Safety.

It is housed in a plastic enclosure of 35 mm thickness suitable for DIN rail mounting in compliance with EN-50022 and EN-50035 standards.

## USER INSTRUCTIONS

The DAT 420 must be connected as follows:

The input connections must be made as shown in the section "Input connections".

The AC input must be connected between the terminals F (AC) and G (AC); the terminal E can be used for the Protection Earth connection.

The output voltage can be regulated up to  $\pm 10\%$  of the nominal value by adjusting the trimmer located near the output connector.

The output connections must be made as shown in the sections "Output connections"

The regulated output voltage is supplied between the terminals A or B (positive) and the terminals C or D (negative) .

To install the transmitter refer to section "Installation Instructions".

## TECHNICAL SPECIFICATIONS (Typical at 25 °C and in nominal conditions)

### Input

Voltage	100 ÷ 250 Vac
Current	0.30 ÷ 0.12 A max
Frequency	48 ÷ 65 Hz
Start-Up Current Spike	7 A max
Power Factor	0.60 ÷ 0.65

### Output

Voltage	24 Vdc $\pm 10\%$ trimmer regulation
Nominal Current	1 A
Current Limitation	1.8 A
Ripple with nominal Io	30 mVpp 80 KHz max.
Load variation response	50 mV with (0-1) A step
Start-Up rise time	7 ms
Shut-down maintenance	10 ms with nominal Vi and Io
Efficiency	82% with nominal Vi and Io

### Environmental data

Input/Output Isolation	4000 Vac / 60 sec.
Input/PE Isolation	1500 Vac / 60 sec.
Electric Safety	EN60950
Electromagnetic Compatibility (EMC) ( for industrial environments )	Immunity: EN 61000-6-2; Emission : EN 61000-6-4.
Operating Temperature	-10 ÷ 50 °C
Storage Temperature	-20 ÷ 60 °C
Humidity (not condensed)	0 ÷ 85%
Weight	about 240 g

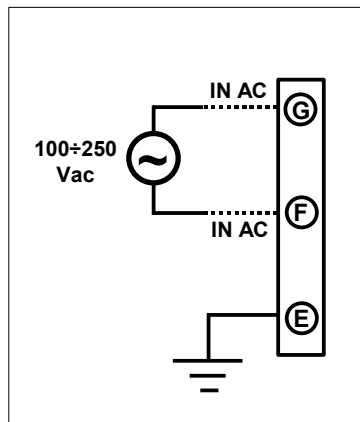
## INSTALLATION INSTRUCTIONS

The device DAT 420 is suitable for DIN rail mounting.

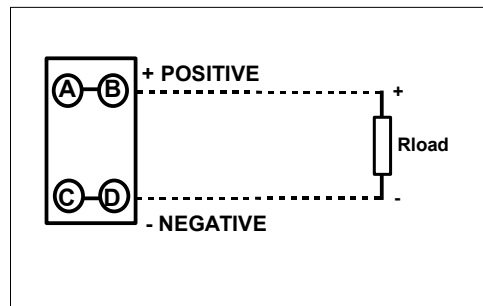
It is necessary to install the device in a place without vibrations; avoid to routing conductors near power signal cables .

## DAT 420 CONNECTIONS

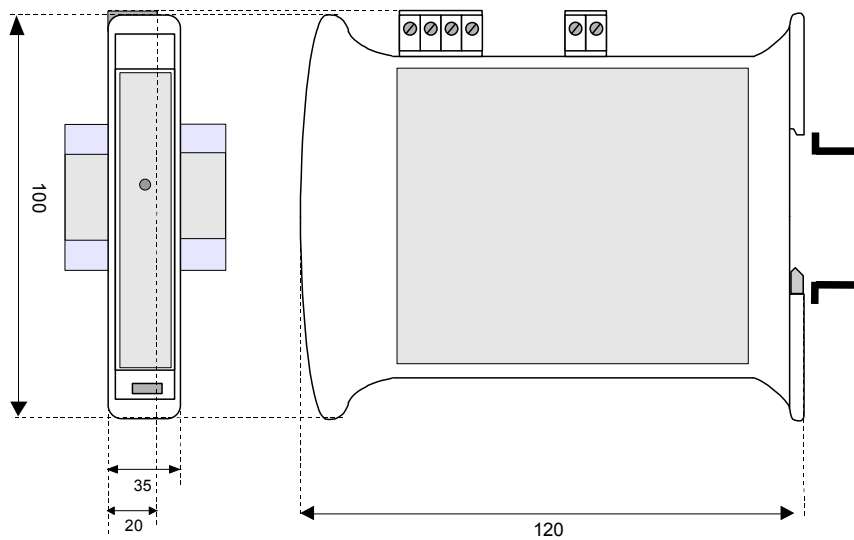
### INPUT CONNECTIONS



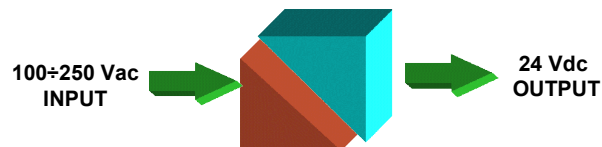
### OUTPUT CONNECTIONS



## DIMENSIONS (mm)



## ISOLATION STRUCTURE



**HOW TO ORDER**  
ORDER CODE: DAT 420