

Produktinformation

Isolating Signal Converter TV500Ex / ST500Ex

With integr. transmitter supply



Characteristics

TV500 isolating signal converter can be used to isolate and convert field signals 0/4..20 mA or 0/2..10 V DC out of the intrinsically area. The ST500 provides a fully floating isolated transmitter supply.

Technical data

Power supply

Supply voltage : 85..250 V AC/110..125 V DC or
 10..30 V AC/DC
 Frequency : AC, 40..400 Hz
 Power consumption : < 3.5 VA
 Operating temperature : -10..+60 °C

Explosion protection

Certification : TÜV 21 ATEX 304902
 Approval :
 Intrinsically safety : EX II (1) G [Ex ia Ga] IIC
 EX II (1) D [Ex ia Da] IIIC
 Increased safety : EX II 3 G ec [ia] IIB T4 Gc
 (ST/TV500Ex-10-5, only)
 Rated voltage : 250 V AC

Inputs

Current : 0/4..20 mA selectable, Ri 25 kΩ
 Voltage : 0/2..10 V DC selectable,
 Ri 40 kΩ

Span and start value

4 mA/2 V : adjustable approx. ± 20 %
 Transmitter supply : approx. 21 V DC, Ri approx. 300 Ω,
 (ST500Ex, only) short-circuit current < 24 mA

Outputs

Current : 0/4..20 mA selectable,
 burden max. 1 kΩ
 Voltage : 0/2..10 V selectable,
 load max. 15 mA, short-circuit-proof
 (parallel with current output max. 5 mA)

Rise time (t₉₀) : < 100 ms

Accuracy : < 0.2 %

Temperature drift : < 0,005 %/K

Supply impact : < 0,05 %

Case : DIN-rail case poly-carbonate UL94V-2

Weight : approx. 200 g

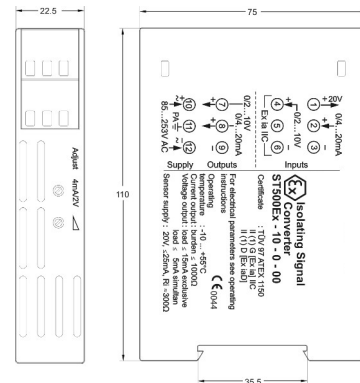
Connection : screw terminals, max. 2.5 mm²

Protection class : case IP30,
 terminals IP20 acc. to BGV A3

Mounting area

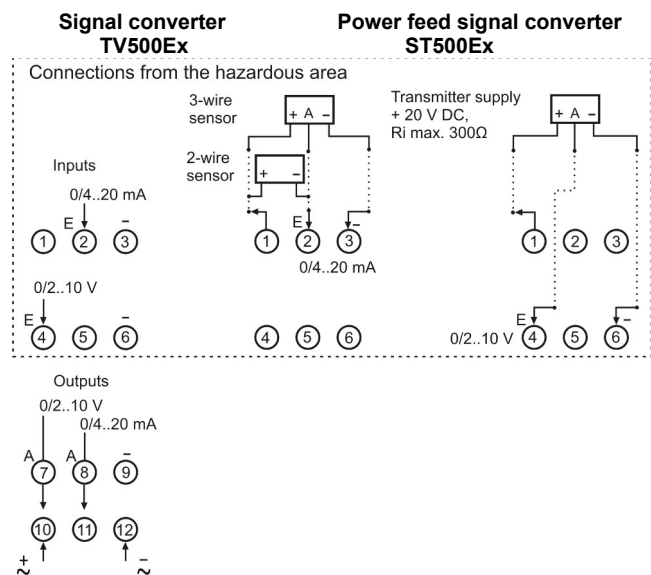
Mounting in dry, clean and well monitored areas
 For more details see user manual.

Dimensions

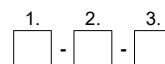


DIN rail mounting TS35

Connection diagram



Ordering code



1. Model	TV500Ex	signal converter
	ST500Ex	power feed signal converter
2. Measuring range	10	inputs 0/4..20 mA and 0/2..10V outputs 0/4..20 mA and 0/2..10V
3. Supply voltage	0	85..250 V AC / 100... 125 V DC
	5	10..30 V AC/DC