



Sulfur Dioxide Detector-Transmitter E2608-SO₂



Features

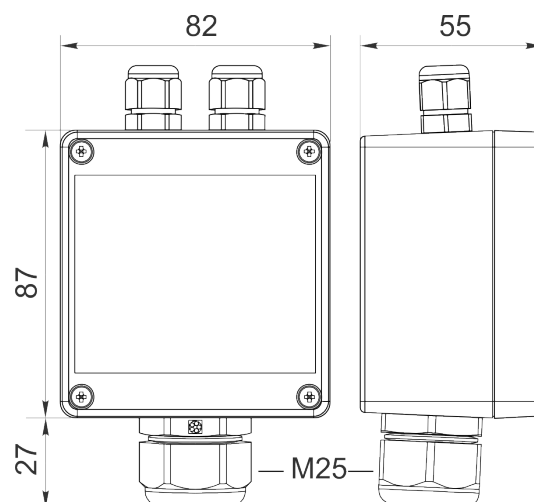
- Wall-mount or duct-mount version
- Industrial IP65 housing
- Two analog outputs settable to 4-20 mA or 0-10 V
- RS485 Modbus RTU digital interface
- Two relays for alarm / ventilation control
- Attached or remote sensor

Specifications

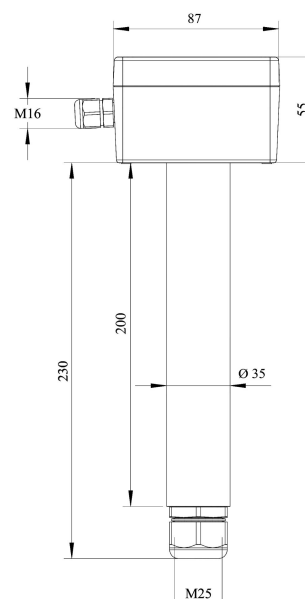
Calibration	Sulfur dioxide SO ₂
Sensor type	Electrochemical
Sampling method	Diffusion
Typical detection range	0...50
Maximum overload	100 ppm
Resolution/digital unit	0.1 ppm
Response time T90	< 35 s
Signal update	Every 1 second
Sensor lifetime	> 2 years
Maintenance interval	6 months
Self-diagnostics	Full functionality check at start-up
Warm-up time	≤ 1 min
Power supply	11...30 VDC (default), 24 VAC or 90...265 VAC as options
Power consumption	< 2 VA
Digital interface	RS485, Modbus RTU protocol
Analog outputs	2 × 4-20 mA / 0-10 V, user settable
Output scale width	Recommended: 20-100% of the range; > 10 × resolution in any case
Output relays	2 × SPST relays (closing contact), 250 VAC / 30 VDC, 5 A max
Default alarm setpoints	RE1 (LOW): set 2 ppm; release 1.6 ppm RE2 (HIGH): set 5 ppm; release 4 ppm
Enclosure	Light beige ABS plastic, wall mount, protection class IP65
Dimensions	H87 × W82 × D55 mm
Remote sensor probe	Protection IP65, shielded cable default cable length 3.0 m
Operating environment	Industrial indoor and outdoor locations
Operating conditions	-30...+50 °C; 15...90% RH non-condensing; 0,9...1,1 atm; Explosion-safe areas Non-aggressive atmosphere

NOTE! We offer technical solutions for extreme humidity, please ask for more information.

Wall mount version



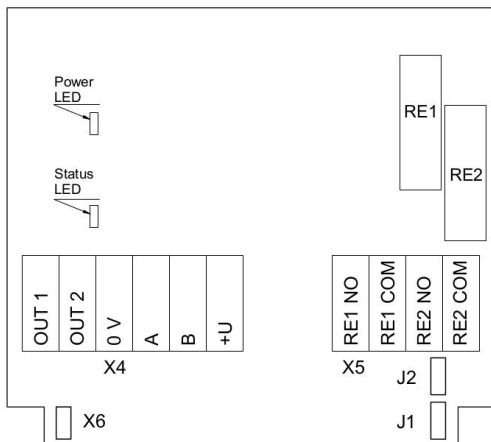
Duct mount version



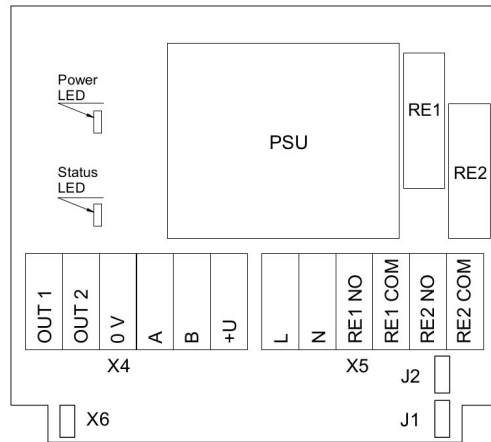
Ask for other versions or custom designed products



Connection diagrams



Version without PSU



Version with PSU

Jumpers

J1	OUT1 type (open: 4-20 mA; closed 0-10 V)
J2	OUT2 type (open: 4-20 mA; closed 0-10 V)
X6	Reset Modbus network parameters to default

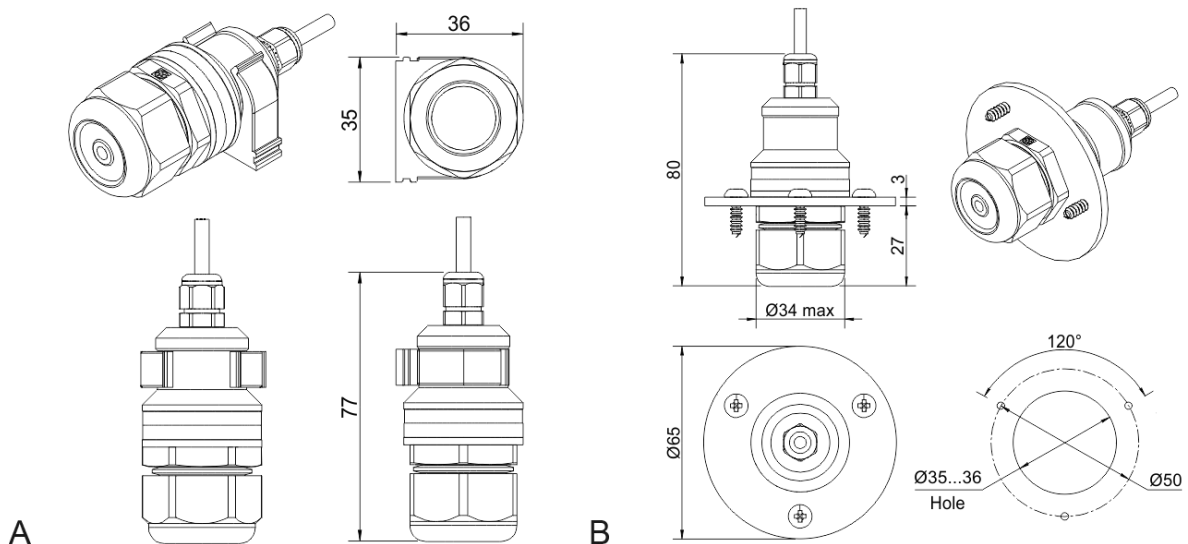
X4 terminals

OUT1	4-20 mA / 0-10 V output
OUT2	4-20 mA / 0-10 V output
0V	0 V / 24 VAC Neutral (optional)
A	RS485 A / Data +
B	RS485 B / Data -
+U	+24 VDC / 24 VAC Phase (optional)

X5 terminals (optional)

L	90...265 VAC Phase
N	90...265 VAC Neutral
RE1 NO	Relay 1, normally open terminal
RE1 COM	Relay 1, common terminal
RE2 NO	Relay 2, normally open terminal
RE2 COM	Relay 2, common terminal

Remote probe



Wall mount remote probe with fixing clamp (default version)

Remote probe with rubber flange and three self-tapping screws (on request)





Sulfur Dioxide Transmitter

E2618-SO2



Features

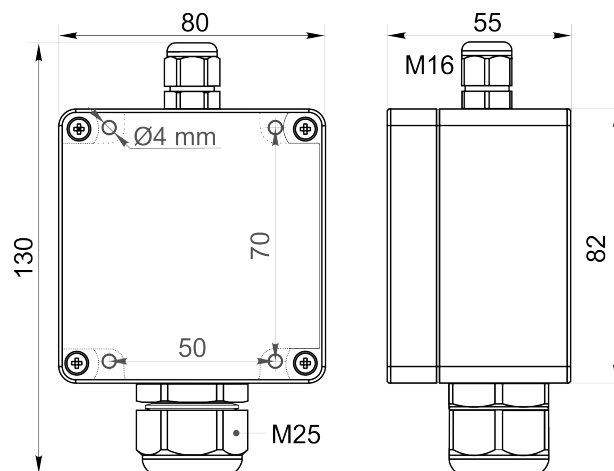
- Wall-mount or duct-mount version
- Industrial IP65 housing
- Two analog outputs settable to 4-20 mA or 0-10 V
- RS485 Modbus RTU digital interface
- Attached or remote sensor

Specifications

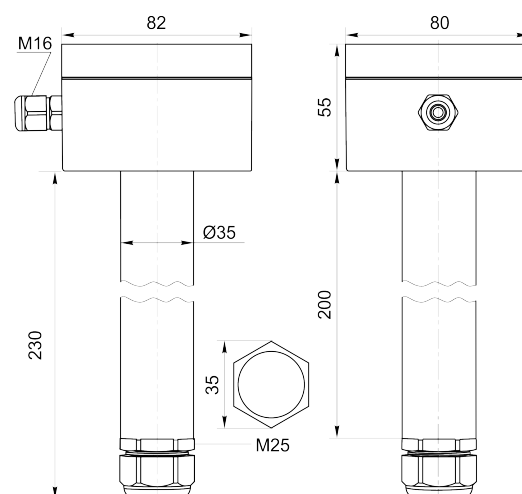
Calibration	Sulfur dioxide SO ₂
Sensor type	Electrochemical
Sampling method	Diffusion
Typical detection range	0-50 ppm
Maximum overload	100 ppm
Resolution/digital unit	0.1 ppm
Response time T90	< 35 s
Signal update	Every 1 second
Sensor lifetime	> 2 years
Maintenance interval	6 months
Self-diagnostics	Full functionality check at start-up
Warm-up time	≤ 1 min
Power supply	11...30 VDC or 24 VAC
Power consumption	< 2 VA
Digital interface	RS485, Modbus RTU protocol
Analog outputs	2 × 4-20 mA / 0-10 V, user settable
Output scale width	Recommended: 20-100% of the range; > 10 × resolution in any case
Enclosure	Grey ABS plastic, wall mount, protection class IP65
Dimensions	H82 × W80 × D55 mm
Remote sensor probe	Protection IP65, shielded cable default cable length 3.0 m
Operating environment	Industrial indoor and outdoor locations
Operating conditions	-30...+50 °C; 15...90% RH non-condensing; 0,9...1,1 atm; Explosion-safe areas Non-aggressive atmosphere

NOTE! We offer technical solutions for extreme humidity, please ask for more information.

Wall mount version



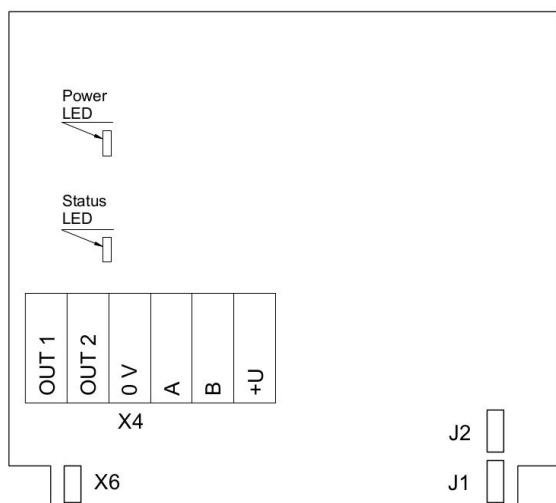
Duct mount version



Ask for other versions or custom designed products



Connection diagram



PCB without PSU and relays

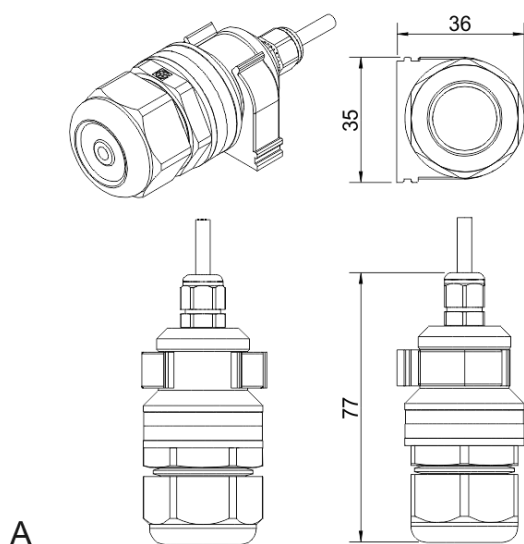
Jumpers

- J1** OUT1 type (open: 4-20 mA; closed 0-10 V)
- J2** OUT2 type (open: 4-20 mA; closed 0-10 V)
- X6** Reset Modbus network parameters to default

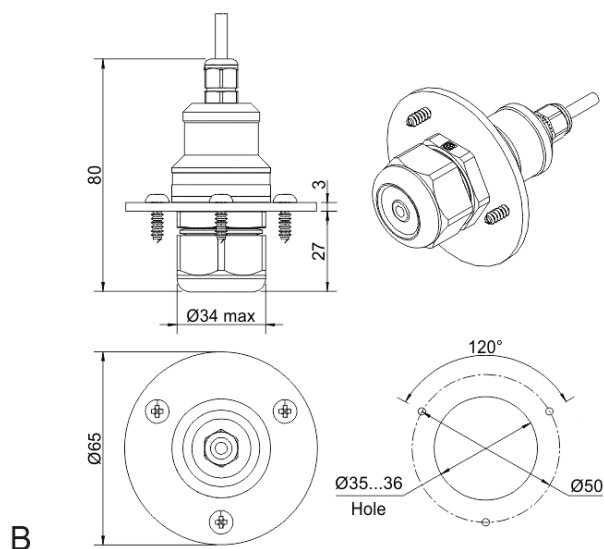
X4 terminals

- OUT1** 4-20 mA / 0-10 V output
- OUT2** 4-20 mA / 0-10 V output
- 0V** 0 V / 24 VAC Neutral (optional)
- A** RS485 A / Data +
- B** RS485 B / Data -
- +U** +24 VDC / 24 VAC Phase (optional)

Remote probe



Wall mount remote probe with fixing clamp (default version)



Remote probe with rubber flange and three self-tapping screws (on request)





Sulfur Dioxide Detector-Transmitter E2638-SO2



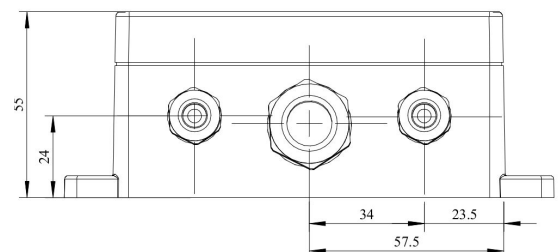
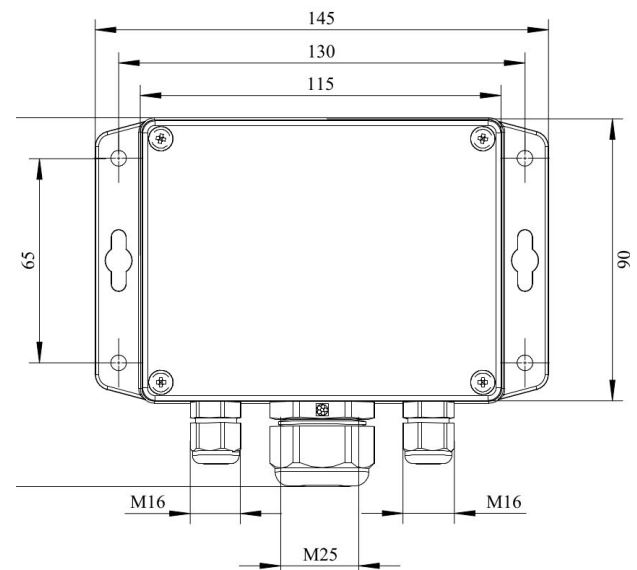
Features

- Accurate and stable measurement
- Easy to install robust enclosure
- Two analog outputs settable to 4-20 mA or 0-10 V
- RS485 Modbus RTU digital interface
- Relay option
- Attached or remote sensor
- LCD indicator option

Specifications

Calibration	Sulfur dioxide SO ₂
Sensor type	Electrochemical
Sampling method	Diffusion
Typical detection ranges	0-50 ppm
Maximum overload	100 ppm
Resolution	0.1 ppm
Response time T ₉₀	< 35 s
Signal update	Every 1 second
Maintenance interval	6 months
Sensor lifetime	> 2 years
Self-diagnostics	Full functionality check at start-up
Warm-up time	≤ 1 min
Power supply options	11...30 VDC 24 VAC or 90...265 VAC as options
Power consumption	< 2 VA
Digital interface	RS485, Modbus RTU protocol
Analog outputs	2 × 4-20 mA / 0-10 V, user settable
Output scale width	Recommended: 20-100% of the range; > 10 × resolution in any case
Enclosure	Grey ABS plastic, wall mount, protection class IP65
Dimensions	H90 × W145 × D55 mm (housing only) H140 with cable glands
Operating environment	Industrial indoor and outdoor locations
Operating conditions	-30...+50°C, 15...90 %RH; 0,9...1,1 atm; Explosion-safe areas; Non-aggressive atmosphere

Dimensions



Additional options

Remote sensor probe	Protection IP65, shielded cable default cable length 3.0 m
Self-test button	Triggers both relays simultaneously; push-button switch

Relay outputs

Output relays	2 × SPST relays (closing contact), 250 VAC / 30 VDC, 5 A max
Default alarm set-points	Determined by user within 5-95% of the range

Alarm signalling

Visual	Red and green LEDs
Acoustic	Buzzer 85 dB

LCD indicator

Operating temperature	0...+50 °C
Display dimensions	72 × 36 mm
Number of digits	3.5 7-segment
Character height	14 mm
Other features	Backlight

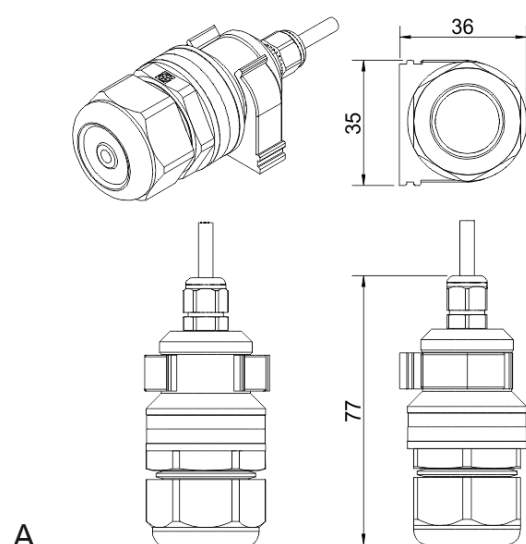
NOTE! Only one analog output is available for a version with LCD.

NOTE! LCD and LEDs can not be chosen simultaneously.

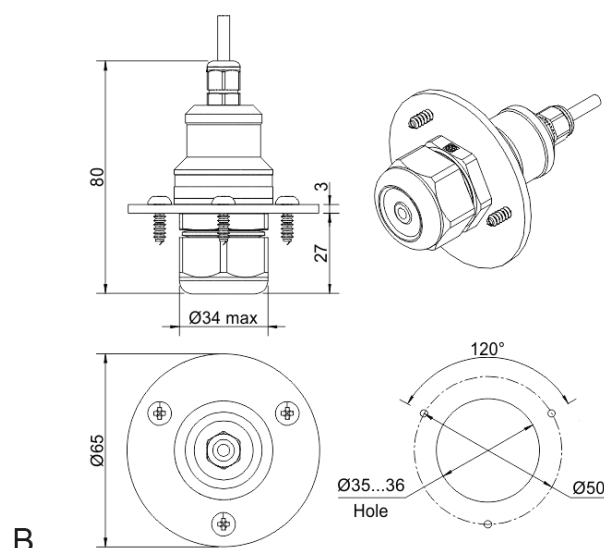
Version with LCD indicator



Remote probe



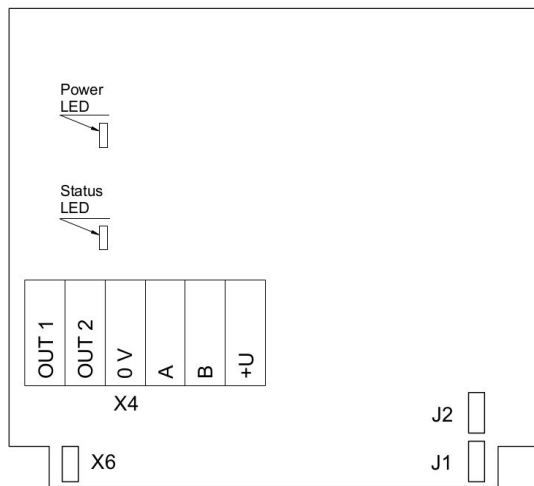
Wall mount remote probe with fixing clamp (default version)



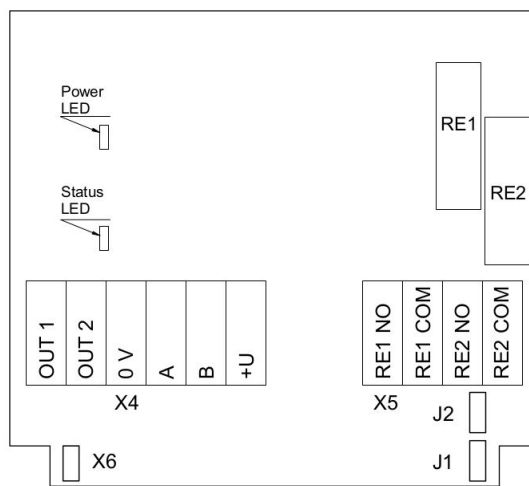
Remote probe with rubber flange and three self-tapping screws (on request)



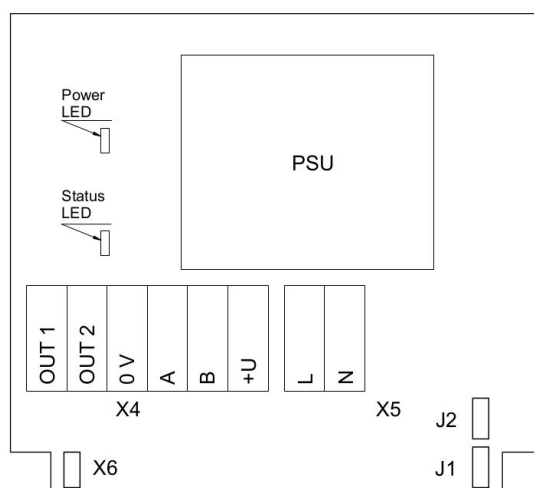
Connection diagrams



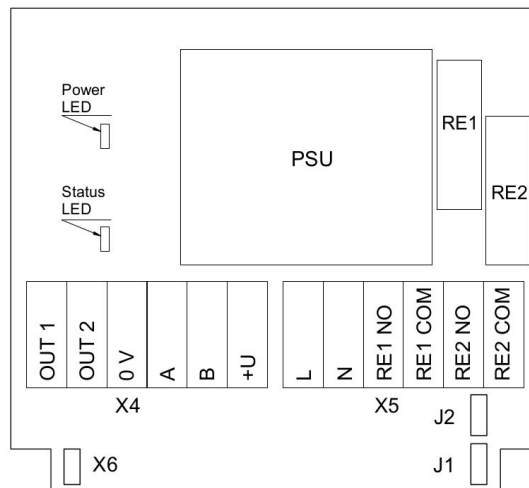
Version without PSU and relays



Version without PSU and with relays



Version with PSU and without relays



Version with PSU and relays

Jumpers

J1	OUT1 type (open: 4-20 mA; closed 0-10 V)
J2	OUT2 type (open: 4-20 mA; closed 0-10 V)
X6	Reset Modbus network parameters to default

X4 terminals

OUT1	4-20 mA / 0-10 V output
OUT2	4-20 mA / 0-10 V output
0V	0 V / 24 VAC Neutral (optional)
A	RS485 A / Data +
B	RS485 B / Data -
+U	+24 VDC / 24 VAC Phase (optional)

X5 terminals (optional)

L	90...265 VAC Phase
N	90...265 VAC Neutral
RE1 NO	Relay 1, normally open terminal
RE1 COM	Relay 1, common terminal
RE2 NO	Relay 2, normally open terminal
RE2 COM	Relay 2, common terminal





Sulfur Dioxide Detector-Transmitter E2648-SO2



Features

- Accurate and stable measurement
- Industrial IP66 wall mount housing
- Two analog outputs settable to 4-20 mA or 0-10 V
- RS485 Modbus RTU digital interface
- Two relays for alarm / ventilation control (option)
- Attached or remote sensor

Specifications

Calibration	Sulfur dioxide SO ₂
Sensor type	Electrochemical
Sampling method	Diffusion
Typical detection range	0-50 ppm
Maximum overload	100 ppm
Resolution/digital unit	0.1 ppm
Response time T90	< 35 s
Sensor lifetime	> 2 years
Maintenance interval	6 months
Signal update	Every 1 second
Self-diagnostics	Full functionality check at start-up
Warm-up time	≤ 1 min
Power supply options	11...30 VDC 24 VAC or 90...265 VAC as options
Power consumption	< 2 VA
Digital interface	RS485, Modbus RTU protocol
Analog outputs	2 × 4-20 mA / 0-10 V, user settable
Output scale width	Recommended: 20-100% of the range; > 10 × resolution in any case
Enclosure	Die-cast aluminium, wall mount, protection class IP66
Dimensions	H120 × W125 × D57 mm
Operating environment	Industrial indoor and outdoor locations
Operating conditions	-30...+50 °C; 15...90% RH non-condensing; 0,9...1,1 atm; explosion safe areas Non-aggressive atmosphere Note! We offer technical solutions for extreme humidity, please ask for more information

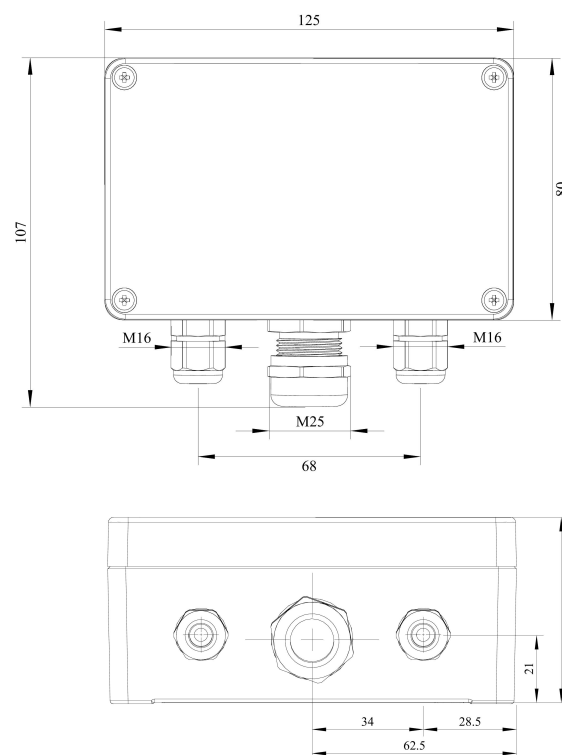
Relay option (ordering code R)

Output relays	2 × SPST relays (closing contact), 250 VAC / 30 VDC, 5 A max
Default alarm setpoints	Determined by user within 5-95% of the range

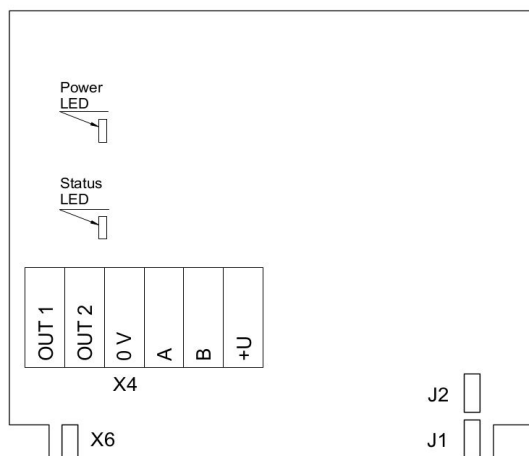
Other options

Remote sensor probe	Protection IP65, shielded cable default cable length 3.0 m
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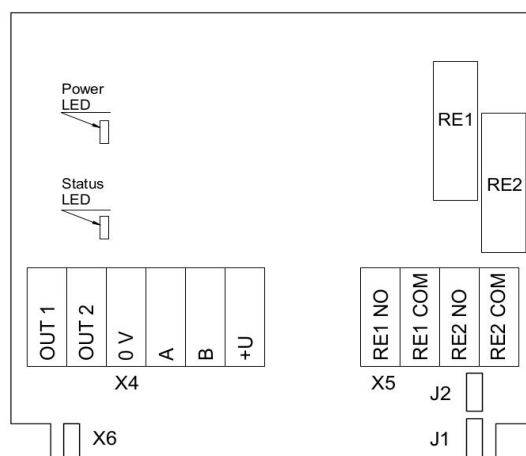
Dimensions



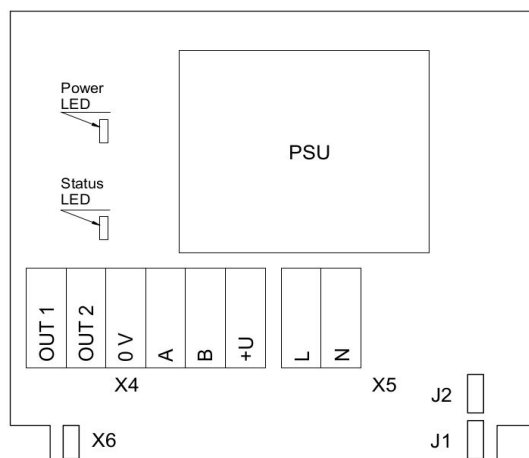
Connection diagrams



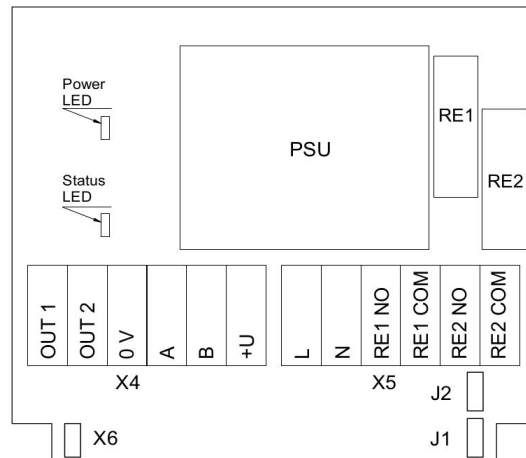
Version without PSU and relays



Version without PSU and with relays



Version with PSU and without relays



Version with PSU and relays

Jumpers

J1	OUT1 type (open: 4-20 mA; closed 0-10 V)
J2	OUT2 type (open: 4-20 mA; closed 0-10 V)
X6	Reset Modbus network parameters to default

X4 terminals

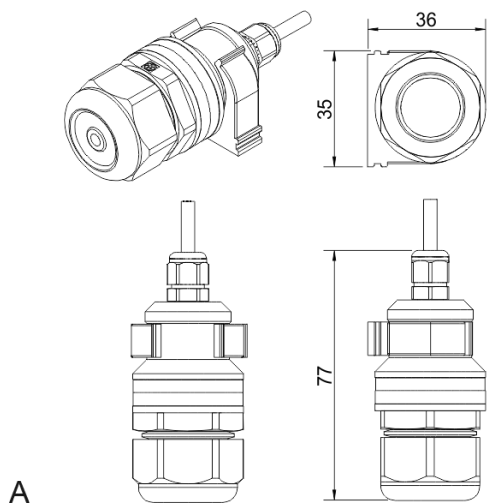
OUT1	4-20 mA / 0-10 V output
OUT2	4-20 mA / 0-10 V output
0V	0 V / 24 VAC Neutral (optional)
A	RS485 A / Data +
B	RS485 B / Data -
+U	+24 VDC / 24 VAC Phase (optional)

X5 terminals (optional)

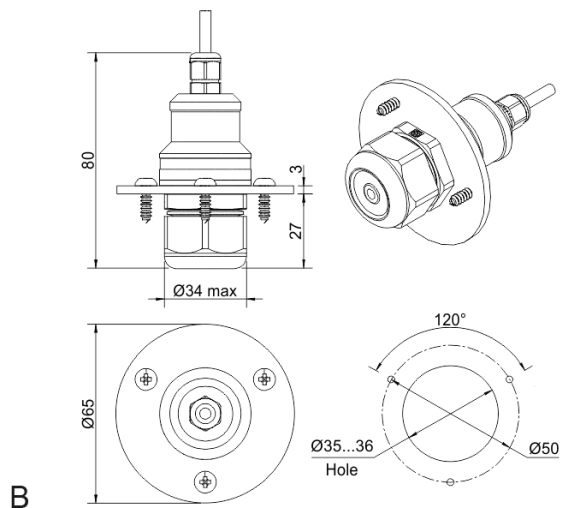
L	90...265 VAC Phase
N	90...265 VAC Neutral
RE1 NO	Relay 1, normally open terminal
RE1 COM	Relay 1, common terminal
RE2 NO	Relay 2, normally open terminal
RE2 COM	Relay 2, common terminal



Remote probe



A
Wall mount remote probe with fixing clamp (default version)



B
Remote probe with rubber flange and three self-tapping screws (on request)



Flameproof Sulfur Dioxide Detector-Transmitter E2658-SO2



Features

- Wall mount robust flameproof metal enclosure
- Suitable for ATEX Zones 2 and 22
- Two analog outputs settable to 4-20 mA or 0-10 V
- RS485 Modbus RTU digital interface
- Relay option

Specifications

Calibration	Sulfur dioxide SO ₂
Sensor type	Electrochemical
Sampling method	Diffusion
Typical detection range	0-50 ppm
Maximum overload	100 ppm
Resolution / digital unit	0.1 ppm
Response time T90	< 35 s
Sensor lifetime	> 2 years
Maintenance interval	6 months
Signal update	Every 1 second
Self-diagnostics	Full functionality check at start-up
Warm-up time	≤ 1 min
Power supply	11...30 VDC (default), 24 VAC or 90...265 VAC as options
Power consumption	< 2 VA
Digital interface	RS485, Modbus RTU protocol
Analog outputs	2 × 4-20 mA / 0-10 V, user settable
Output scale width	Recommended: 20-100% of the range; > 10 × resolution in any case
Enclosure	Grey die-cast aluminium, protection class IP66
Dimensions	H80 × W125 × D57 / H80 × W175 × D80 mm
Operating environment	Industrial indoor and outdoor locations
Operating conditions	-30...+50 °C; 15...90% RH non-condensing; 0,9...1,1 atm; Explosion-safe areas Non-aggressive atmosphere
	NOTE! We offer technical solutions for extreme humidity, please ask for more information
Relay option (ordering code R)	
Output relays	2 × SPST relays (closing contact), 250 VAC / 30 VDC, 5 A max
Default alarm setpoints	RE1 (LOW): set 2 ppm; release 1.6 ppm RE2 (HIGH): set 5 ppm; release 4 ppm

Approvals

Enclosure:

ATEX / IECEx
DEMKO 13 ATEX 1327771U
 II 2 G Ex e IIC Gb
 II 2 D Ex tb IIIC Db IP66

Glands:

ATEX / IECEx
EESF 19 ATEX 023X
 II 2 G Ex db IIC Gb
 II 2 D Ex tb IIIC Db IP66

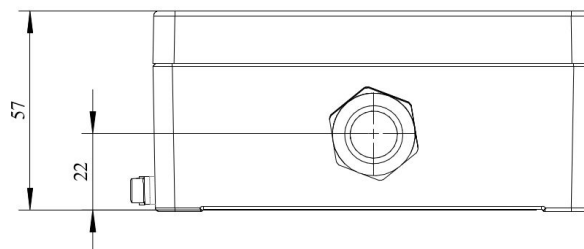
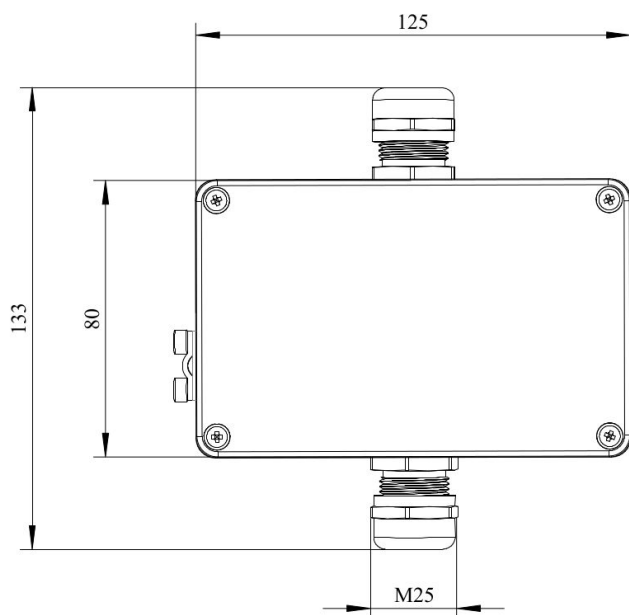
CE conformity

Flameproof to IEC EN 60079-1
Increased safety to IEC EN 60079-7
EMC Emissions to EN 61000-6-3, EN 61326-1
EMC Immunity to EN 61000-6-1, EN 61000-6-2

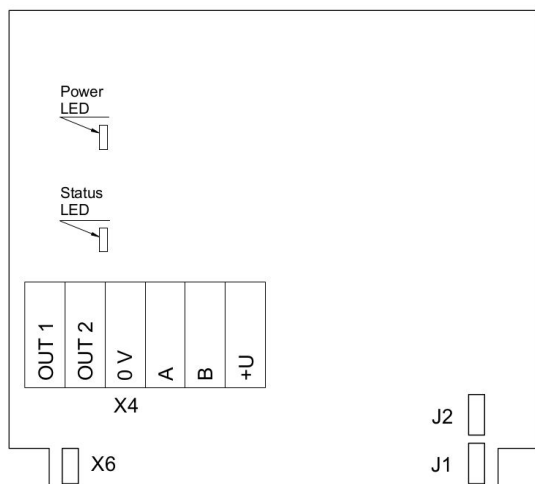
Ask for other versions or custom designed products



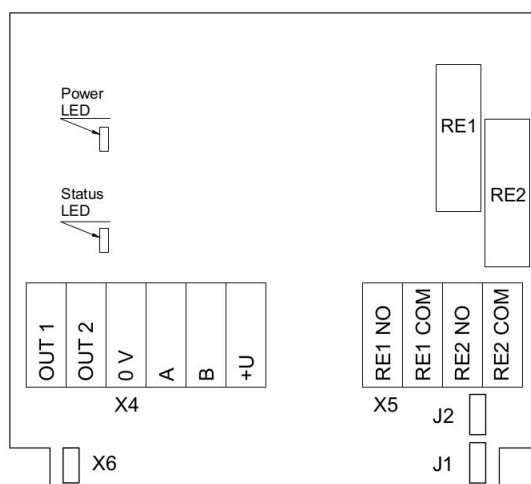
Dimensions



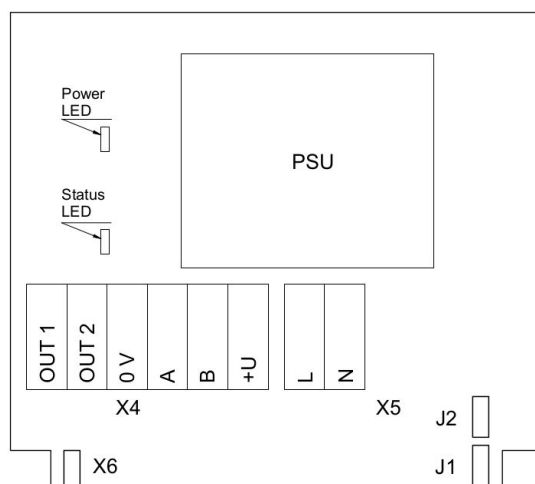
Connection diagrams



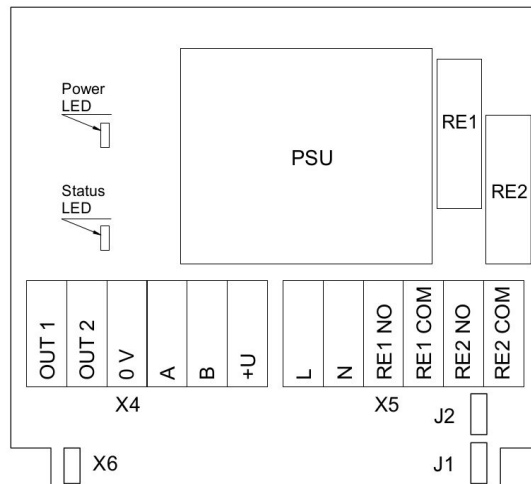
Version without PSU and relays



Version without PSU and with relays



Version with PSU and without relays



Version with PSU and relays



Jumpers

J1	OUT1 type (open: 4-20 mA; closed 0-10 V)
J2	OUT2 type (open: 4-20 mA; closed 0-10 V)
X6	Reset Modbus network parameters to default
X4 terminals	
OUT1	4-20 mA / 0-10 V output
OUT2	4-20 mA / 0-10 V output
0V	0 V / 24 VAC Neutral (optional)
A	RS485 A / Data +
B	RS485 B / Data -
+U	+24 VDC / 24 VAC Phase (optional)
X5 terminals (optional)	
L	90...265 VAC Phase
N	90...265 VAC Neutral
RE1 NO	Relay 1, normally open terminal
RE1 COM	Relay 1, common terminal
RE2 NO	Relay 2, normally open terminal
RE2 COM	Relay 2, common terminal

