



Ammonia Detector-Transmitter E2638-NH3-P



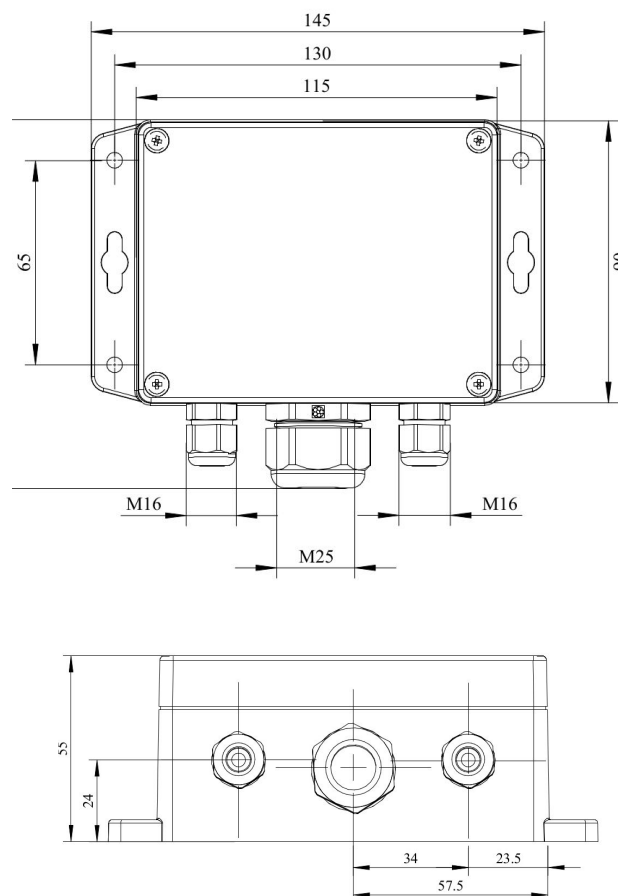
Features

- 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	Ammonia NH ₃
Sensor type	Pellistor (catalytic bead)
Sampling method	Diffusion
Typical detection range	0...15%vol. (0...100%LEL NH ₃)
Resolution	0.1%vol. or 1%LEL
Response time T90	≤10 s
Sensor lifetime	> 3 years
Maintenance interval	6 months
Operating temperature	-20...+60 °C
Signal update	Every 1 second
Self-diagnostics	Full functionality check at start-up
Warm-up time	≤ 1 min
Power supply options	12...36 VDC (default) 24 VAC or 230 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 Analog output scale can be set according to customer's requirement (e.g. 0...4%vol. NH ₃)
Enclosure	Grey ABS plastic, wall mount, protection class IP65
Dimensions	H90 × W145 × D50 mm (housing only) H140 with cable glands
Operating environment	Industrial indoor and outdoor locations
Operating conditions	(operating temperature is specified above) ≤ 95% RH non condensing; 0.9...1,1 atm Explosion-safe areas Normal ambient oxygen level Avoid strong mechanical shock, vibrations or EMI; Avoid exposure to corrosive gases or silicone containing products.

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
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

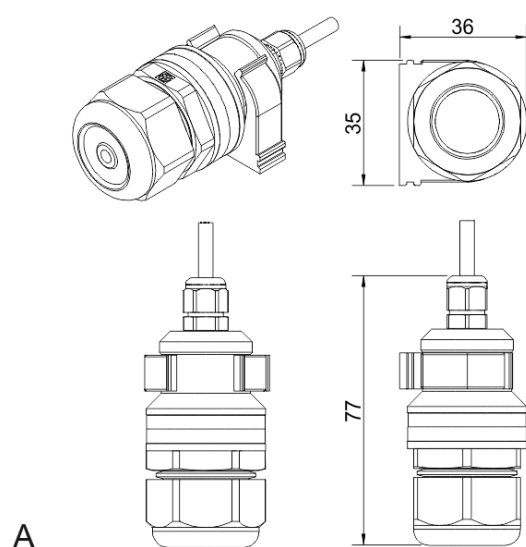
NOTE! Only one analog output is available for a version with LCD.

NOTE! LCD and LEDs can not be chosen simultaneously.

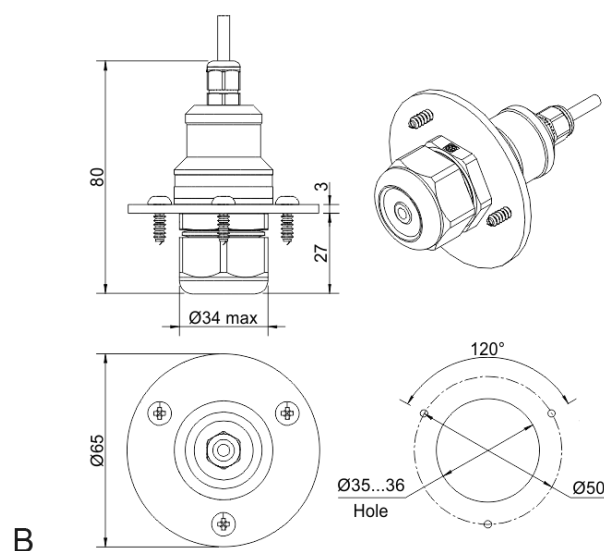
Version with LCD indicator



Remote probe



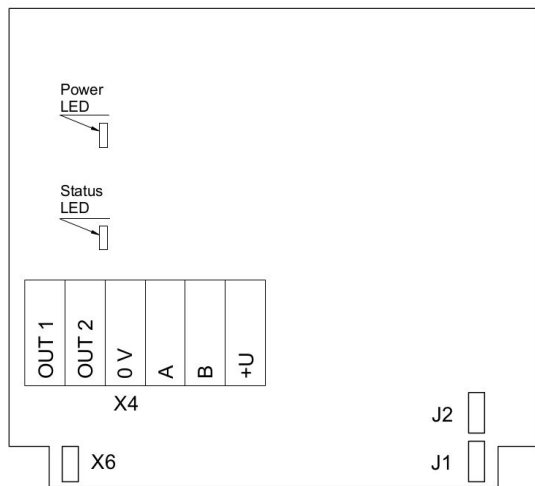
Wall mount remote probe with fixing clamp (default version)



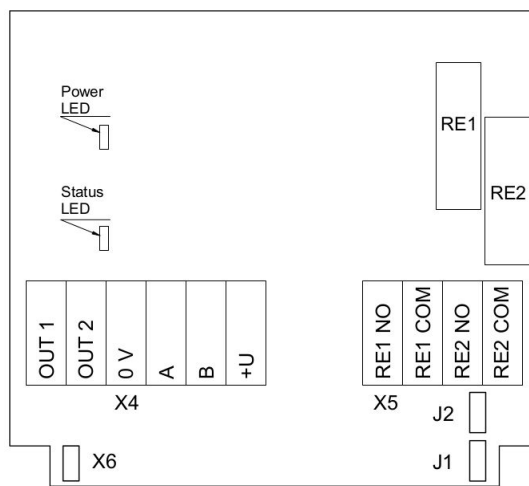
Remote probe with rubber flange and three self-tapping screws (on request)



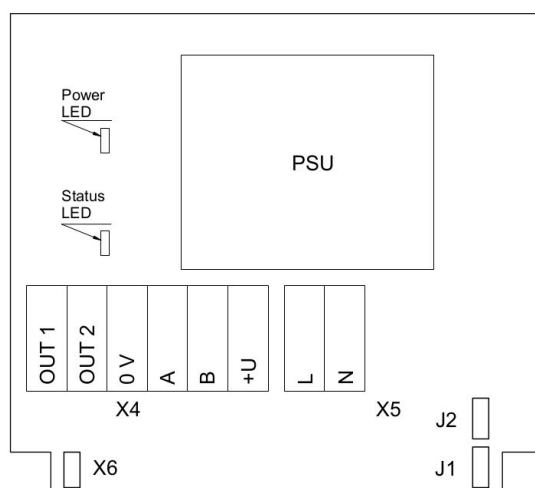
Connection diagrams



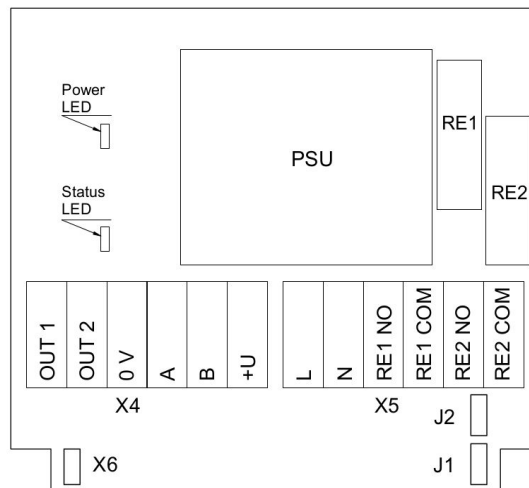
Version without PSU and relays



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

