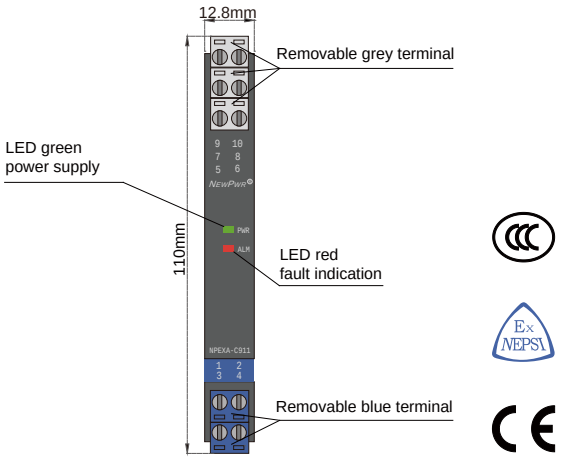
NPEXA-C91 Single input, single output

NPEXA-C911 Single input, double outputs

Input: potentiometer
Output: 4 ~ 20 mA

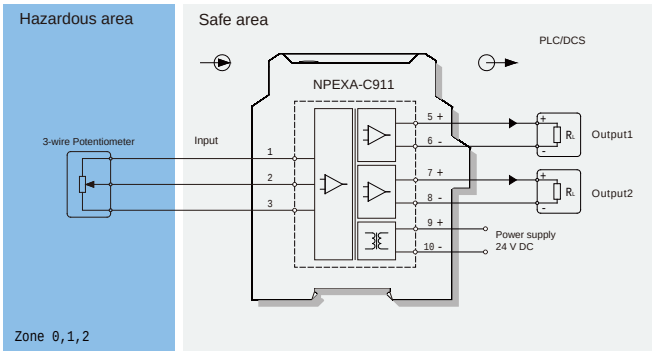
Potentiometer input isolated barrier, it converts the 3-wire potentiometer signals from a hazardous area into 4~20mA signals to a safe area by isolation. The input, output, and power supply are galvanically isolated from each other. The self-test function is also available on this device. Calibrate the apparatus or modify parameters by using a handheld programmer.



Parameters

Power supply:	18V DC ~ 60V DC (Reverse power protection)
Power dissipation:	0.8W (single output) 1.2W (double outputs)
Input signal:	3-wire potentiometer: 0 Ω ~ 10 kΩ
Output signal:	4 ~ 20mA
Load resistance:	RL ≤ 550Ω
Accuracy:	0.1%F.S.
Temperature drift:	30ppm/°C
Response time:	≤ 500ms
Electromagnetic compatibility:	IEC 61326-3-1
Dielectric strength:	≥ 3000V AC (intrinsically safe side / non-intrinsically safe side) ≥ 1500V AC (Power supply/non-intrinsically safe side)
Insulation resistance:	≥ 100MΩ (Input /Output/Power supply)
Operation temperature:	-20°C ~ +60°C
Storage temperature:	-40°C ~ +80°C
Dimension:	12.8mm (W) × 110mm (H) × 117mm (D)
Output states:	Whatever input fault status (except breakage), the output follows the input within measuring range. And the maximum value would not exceed the 110% of the upper limit of the measuring range (e.g. When the output signal type is 0 ~ 20mA, the minimum output value may be 0mA, the maximum output value would not exceed 22mA)

Wiring diagram



Explosive-proof parameters

National Supervision and Inspection Center for Explosion Protection and Safety of Instrumentation (NEPSI)
Ex marking: [Ex ia Ga] ⅡC

Um: 250V
Certified parameters (Terminals 1, 2, 3):
Uo=8.7V, Io=33mA, Po=72mW
II C: Co=5μF, Lo=28mH
II B: Co=35μF, Lo=84mH
II A: Co=700μF, Lo=224mH

Model rules

NPEXA-C9☒☒☒

- PB: BUS powered
  Default: Terminals powered
- The second output signal[note1]
  Default: null
- The first output signal[note1]

note1: output signal

Number	Output signal
1	4~20mA
2	1~5V
3	0~10mA
4	0~5V
5	0~10V
6	0~20mA