

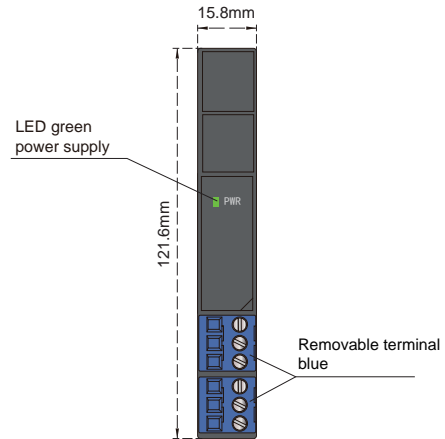
NPEXA-H67P2

Single input, single output

Input: Frequency

Output: 1:1

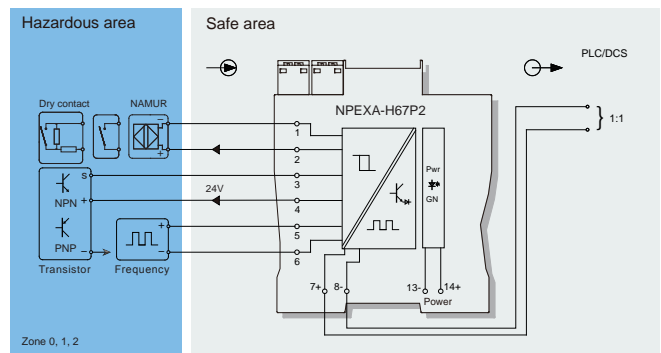
This isolated safety barrier converts the frequency signals from a hazardous area to a safe area by isolation. The input, output, and power supply are galvanically isolated from each other.



Technical data

Power supply:	18 V DC~32 V DC (Reverse power protection)		
Power dissipation:	0.8 W (24V DC, single output)		
Input signal:	Frequency	Max. Input voltage: 30V Min. Input amplitude: 2V Frequency range: 0.1Hz~100kHz	
	PNP/NPN	Distribution voltage: 24V Current: ≤ 20mA Frequency range: 0.1Hz~10kHz	
	NAMUR switch	Distribution voltage: approx.8.2V Short-circuit current: approx.8mA Frequency range: 0.1Hz~10kHz	
	Output signal:	Open collector	High level: Vcc (≤ 30V) Low level: ≤ 2V drive current: ≤ 10mA
		Emitter follower	High level: Vcc-2V Low level: ≤ 0.5V drive current: ≤ 10mA
Logic level		High level: 9V ≤ VH ≤ 12V Low level: VL ≤ 2V Load resistance: ≥ 1kΩ	
Accuracy:		± 0.1%F.S.	
Temperature drift:	≤ 0.01%F.S./°C		
Response time:	≤ 500ms		
Electromagnetic compatibility:	IEC 61326-3-1		
Dielectric strength:	≥ 2500 V AC (intrinsically safe side / non-intrinsically safe side)		
	≥ 500 V AC (Power supply side /non-intrinsically safe side)		
Insulation resistance:	≥ 100 MΩ (Input /Output/Power supply)		
Operation temperature:	-20°C ~ +60°C		
Storage temperature:	-40°C ~ +80°C		
Dimension:	15.8 mm (W) × 121.6 mm (H) × 104.8 mm (D)		

Wiring diagram



Explosive-proof parameters

National Supervision and Inspection Center for Explosion Protection and Safety of Instrumentation (NEPSI)

Explosive-proof grade: [Ex ia Ga] II C

Um: 250 V

Certified parameters (Terminals 1, 2):

Uo=10.5V, Io=13mA, Po=35mW, Co=1.68μF, Lo=100mH

Certified parameters (Terminals 5, 6):

Uo=10.5V, Io=6mA, Po=16mW, Co=1.68μF, Lo=700mH

Certified parameters (Terminals 3, 4, 6):

Uo=28V, Io=93mA, Po=651mW, Co=0.08μF, Lo=4.2mH