

- Black box system
- Automatic calculation of the purge time
- WEB interface
- 3 x PT100/1000 inputs
- Safety-related control system

# SIL 2

### Explosion protection

ATEX marking	ⓑ II 2(1)G Ex eb m ⓑ II 2(1)D Ex tb [ib T130 ℃ Db	nb ib [ib pxb] [ia Ga] IICT4 Gb p pxb] [ia Da] IIIC	
Certification	BVS 19 ATEX E 01	5	
IECEx marking	Ex eb mb ib [ib pxt Ex tb [ib pxb] [ia Da T130 °C Db		
Certification	IECEx BVS 19.0038X		
Other approvals and certificates, see www.bartec.com			
Ambient temperature	In storage During operation	-20 °C to +60 °C -25 °C to +50 °C	

## **Technical data**

Directives	Directive 2014/30/EU Directive 2014/34/EU
Structure	Ex e protective housing with integrated Ex mb/ib-protected p control system
Housing material	V4A stainless steel
IP rating	IP 66 according to EN/IEC 60529 IP 64 according to EN/IEC 60079-0
Terminals	Ex e: 0.08 to 2.5 mm <sup>2</sup> , fine-wire, tension spring Ex i: 0.2 to 1.5 mm <sup>2</sup> , fine-wire, push-in
Pneumatic connections	2 x pipe connections, 10 mm dia.
Pressure measurement range	0 to 25 mbar
Orifice plate size	8 mm
Max. flow rate	6000 l/h
Pre-purge time	0 to 120 min
Weight	6.8 kg
Safety integrity level	SIL 2

The APEX<sup>mv</sup> Ex p control unit controls and monitors the pre-purge and operating phase of small, separate, pressurised enclosure equipment protected in accordance with ignition protection type px. The parameters can be set using the integrated WEB interface or the optionally available p operator panel.

The APEX<sup>mv</sup> features two release relays; one which is energised and one which has floating contacts. Two signal relays with one changeover contact each are additionally available. Three PT100/1000 inputs are available to monitor the temperature of the Ex p-protected equipment. Up to three switch values can be assigned to them. The design of the APEX<sup>mv</sup> means that all components required for the pressurised enclosure are located in the control unit. The equipment to be monitored is connected to the Ex p control unit by means of a pipe, which allows a maximum purge volume of 70 litres. The following components can also be connected:

- There is the option to connect a p operator panel

- Pressure sensors

### Electrical data

Supply voltage	24 V DC to 44 V DC, ±10 % or 100 V AC to 230 V AC, ±10 %
Power consumption	Pv = approx. 19 watts
Normally open contacts	K1 (SIL) release, max. 5 A (AC1) K2 (SIL) release, floating, max. 230 V AC/3 A (AC1) K3 and K4 signal relays, floating, changeover contact, max. 1 A (AC1)
Inputs	3 x PT100/1000 1 x bypass 1 x main switch 1 x 4 to 20 mA [ib] – pressure sensor 1 x 4 to 20 mA [ia] – pressure sensor



## Ordering information

Version	Code no.
24 V DC to 44 V DC, ±10 %	1
100 V AC to 230 V AC, ±10 %	2

Complete oder no. 07-37A2-2211/ 2730

Please enter code number.

The accessories and order information can be found on the accessory pages. Technical data subject to change without notice.