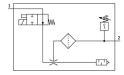
## Vacuum generator OVEM-07-H-B-QO-ON-N-2P Part number: 538829

**FESTO** 





## **Data sheet**

General operating condition

| Feature                            | Value   |
|------------------------------------|---|
| Nominal width of Laval nozzle      | 0.7 mm  |
| Width dimension                    | 20 mm   |
| Muffler construction type          | Open  |
| Mounting position                  | Any   |
| Ejector characteristics            | High vacuum<br>Standard   |
| Grade of filtration                | 40 μm   |
| Manual override                    | Non-detenting<br>Additionally via operating buttons                                 |
| Integrated function                | Shut off valve, electric Compressed air filter Pneumatic muffler open Vacuum switch |
| Structural design                  | Modular   |
| Short-circuit protection           | yes   |
| Measured variable                  | Relative pressure   |
| Measuring principle                | Piezoresistive  |
| Switching element function         | N/C contact<br>N/O contact  |
| Switching function                 | Window comparator Threshold value comparator  |
| Symbol                             | 00992100  |
| Valve function                     | Open  |
| Reverse polarity protection        | for all electrical connections  |
| Switching input to standard        | IEC 61131-2   |
| Display type                       | 4-character alphanumeric<br>Back-lit LCD  |
| Display range                      | -0.999 bar 0 bar  |
| Displayable unit(s)                | bar   |
| Setting range hysteresis           | -0.9 bar 0 bar  |
| Setting options                    | Via display and pushbuttons   |
| Switching position indication      | LCD   |
| Switching status indication        | Optical   |
| Setting range threshold value      | -0.999 bar 0 bar  |
| Operating pressure                 | 2 bar 8 bar   |
| Operating pressure for max. vacuum | 4.1 bar   |
| Max. vacuum                        | 93 %  |
| Nominal operating pressure         | 6 bar   |

| Feature                                       | Value   |
|---|---|
| Max. suction rate with respect to atmosphere  | 16 l/min  |
| Air supply time at nominal operating pressure | 1.9 s   |
| DC operating voltage range                    | 20.4 V 27.6 V   |
| Duty cycle                                    | 100%  |
| Inductive protective circuit                  | Adapted to MZ, MY and ME coils                                |
| Insulation voltage                            | 50 V  |
| Idle current                                  | <70 mA  |
| Max. output current                           | 100 mA  |
| Residual current                              | 0.1 mA  |
| Switching output                              | 2xPNP   |
| Voltage drop                                  | ≤1.5 V  |
| Coil characteristics                          | 24 V DC: low-current phase 0.3 W, high-current phase 2.55 W   |
| Surge resistance                              | 0.8 kV  |
| Overload protection                           | Available   |
| Contamination level                           | 3   |
| Certification                                 | RCM compliance mark   |
|   | c UL us - Listed (OL)   |
| KC characters                                 | KC EMC  |
| CE marking (see declaration of conformity)    | As per EU EMC directive                                       |
| UKCA marking (see declaration of conformity)  | To UK instructions for EMC                                    |
| Operating medium                              | Compressed air as per ISO 8573-1:2010 [7:4:4]                 |
| Information on operating and pilot media      | Operation with oil lubrication not possible                   |
| Corrosion resistance class (CRC)              | 2 - Moderate corrosion stress                                 |
| LABS (PWIS) conformity                        | VDMA24364 zone III  |
| Temperature of medium                         | 0 °C 50 °C  |
| Relative air humidity                         | 5 - 85 %  |
| Noise level at nominal operating pressure     | 58 dB(A)  |
| Degree of protection                          | IP65  |
| Protection class                              | III   |
| Ambient temperature                           | 0 °C 50 °C  |
| Max. tightening torque                        | 0.8 Nm with internal thread<br>2.5 Nm with through-hole       |
| Product weight                                | 330 g   |
| Pressure measuring range                      | -1 bar 0 bar  |
| Accuracy in ± % FS                            | 3 %FS   |
| Reproducibility, switching value FS           | 0.6 %   |
| Input switching logic                         | PNP (positive switching)                                      |
| Electrical connection                         | 5-pin<br>M12x1<br>Plug  |
| Type of mounting                              | With through-hole<br>With internal thread<br>With accessories |
| Pneumatic connection 1                        | QS-8  |
| Pneumatic connection 3                        | Pneumatic muffler integrated                                  |
| Vacuum connection                             | QS-8  |
| Note on materials                             | RoHS-compliant  |
| Seals material                                | NBR   |
| Female nozzle material                        | РОМ   |
| Compressed air filter material                | Fabric  |
|   | PA  |
| Material of Cites in a series                 | Sintered steel  |
| Material of filter housing                    | PA-reinforced   |
| Housing material                              | Die-cast aluminum<br>PA-reinforced                            |

| Feature                       | Value                             |
|-------------------------------|-----------------------------------|
| Muffler material              | Wrought aluminum alloy<br>PU foam |
| Material of screws            | Steel                             |
| Inspection window material    | PA                                |
| Material of plug housing      | Brass, nickel-plated              |
| Material of pin contacts      | Brass, gold-plated                |
| Material of pins              | Steel                             |
| Material of jet nozzle        | Wrought aluminum alloy            |
| Material of keypad            | TPE-U                             |
| Material of pneumatic fitting | Brass, nickel-plated              |