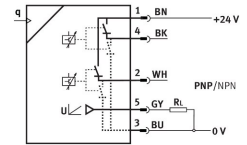


# Flow sensor SFAM-90-5000L-TG1-2SV-M12

Part number: 573353

**FESTO**



## Data sheet

| Feature                                      | Value                                                       |
|----------------------------------------------|-------------------------------------------------------------|
| Certification                                | RCM compliance mark<br>c UL us - recognized (OL)            |
| CE marking (see declaration of conformity)   | As per EU EMC directive<br>As per EU RoHS directive         |
| UKCA marking (see declaration of conformity) | To UK instructions for EMC<br>To UK RoHS instructions       |
| Certificate issuing authority                | UL E322346                                                  |
| Note on materials                            | RoHS compliant                                              |
| Measured variable                            | Volume<br>Volumetric flow rate                              |
| Flow direction                               | Unidirectional<br>From left to right                        |
| Measuring principle                          | Thermal                                                     |
| Method of measurement                        | Heat loss                                                   |
| Flow measuring range start value             | 50 l/min                                                    |
| Flow measuring range end value               | 5000 l/min                                                  |
| Operating pressure                           | 1.6 MPa<br>16 bar<br>232 psi                                |
| Overload pressure                            | 2 MPa<br>20 bar<br>290 psi                                  |
| Operating medium                             | Compressed air as per ISO 8573-1:2010 [7:4:4]<br>Nitrogen   |
| Temperature of medium                        | 0 °C...50 °C                                                |
| Ambient temperature                          | 0 °C...50 °C                                                |
| Nominal temperature                          | 23 °C                                                       |
| Accuracy of flow rate                        | ±(3% o.m.v. + 0.3% FS)                                      |
| Zero point repetition accuracy in ± %FS      | 0.2 %FS                                                     |
| Repetition accuracy margin in ± %FS          | 0.8 %FS                                                     |
| Temperature co-efficient margin in ± %FS/K   | typ. 0.1%FS/K                                               |
| Pressure influence of margin in ±%FS/bar     | 0.5 %FS/b.                                                  |
| Switching output                             | 2 x PNP or 2 x NPN switchable                               |
| Switching function                           | Window comparator or threshold value comparator, adjustable |

| Feature                                        | Value                                                        |
|------------------------------------------------|--------------------------------------------------------------|
| Switching element function                     | N/C contact/N/O contact, switchable                          |
| Max. output current                            | 100 mA                                                       |
| Analog output                                  | 0 - 10 V                                                     |
| Flow characteristic curve, start value         | 0 l/min                                                      |
| Flow characteristic curve, end value           | 5000 l/min                                                   |
| Output characteristic curve initial value      | 0 V                                                          |
| End value output characteristic curve          | 10 V                                                         |
| Min. load resistance of voltage output         | 10 kOhm                                                      |
| Short-circuit protection                       | Yes                                                          |
| Overload protection                            | Available                                                    |
| DC operating voltage range                     | 15 V...30 V                                                  |
| Reverse polarity protection                    | for all electrical connections                               |
| Electrical connection 1, connection type       | Plug                                                         |
| Electrical connection 1, connection technology | M12x1 A-coded as per EN 61076-2-101                          |
| Electrical connection 1, number of pins/wires  | 5                                                            |
| Electrical connection 1, type of mounting      | Screw-type lock<br>Compatible with rotatable screw-type lock |
| Max. cable length                              | 30 m                                                         |
| Type of mounting                               | In-line installation                                         |
| Mounting position                              | Horizontal                                                   |
| Pneumatic connection                           | G1                                                           |
| Product weight                                 | 2400 g                                                       |
| Housing material                               | Die-cast aluminum<br>PA-reinforced                           |
| Display type                                   | Multi-color backlit LCD                                      |
| Displayable unit(s)                            | l<br>l/min<br>m3<br>scf<br>scfm                              |
| Setting options                                | Teach-in<br>Via display and keys                             |
| Protection against tampering                   | PIN code                                                     |
| Setting range threshold value                  | 1 %...100 %                                                  |
| Setting range hysteresis                       | 0 %...90 %                                                   |
| Degree of protection                           | IP65                                                         |
| Pressure drop                                  | 100 mbar                                                     |
| Protection class                               | III                                                          |
| Corrosion resistance class (CRC)               | 2 - Moderate corrosion stress                                |
| LABS (PWIS) conformity                         | VDMA24364-B1/B2-L                                            |