

# Solenoid valve MN1H-5/3E-D-2-S-C

Part number: 159694

**FESTO**



## Data sheet

| Feature                                               | Value                                         |
|-------------------------------------------------------|-----------------------------------------------|
| Valve function                                        | 5/3 exhausted                                 |
| Type of actuation                                     | Electric                                      |
| Construction width                                    | 54 mm                                         |
| Standard nominal flow rate (standardised to DIN 1343) | 2300 l/min                                    |
| pneumatic working port                                | Sub-base size 2 to ISO 5599-1<br>G3/8         |
| Operating voltage                                     | Via solenoid coil, must be ordered separately |
| Operating pressure                                    | -0.09 MPa...1.6 MPa<br>-0.9 bar...16 bar      |
| Design                                                | Piston gate valve                             |
| Type of reset                                         | Mechanical spring                             |
| Maritime classification                               | See certificate                               |
| Certificate issuing authority                         | DNV-TAA000032X                                |
| Degree of protection                                  | IP65                                          |
| Nominal size                                          | 11.5 mm                                       |
| Grid dimension                                        | 56 mm                                         |
| Exhaust-air function                                  | With flow control option                      |
| Sealing principle                                     | Soft                                          |
| Mounting position                                     | optional                                      |
| Conforms to standard                                  | ISO 5599-1                                    |
| Manual override                                       | Detenting via accessory<br>Non-detenting      |
| ISO code                                              | 269                                           |
| Type of piloting                                      | Pilot actuated                                |
| Pilot air supply                                      | External                                      |
| Flow direction                                        | Reversible                                    |
| lap                                                   | Overlap                                       |
| Pilot pressure                                        | 0.3 MPa...1 MPa<br>3 bar...10 bar             |
| Switching time off                                    | 84 ms                                         |
| Switching time on                                     | 36 ms                                         |
| Max. positive test pulse with 0 signal                | 3700 µs                                       |

| Feature                                | Value                                                                                      |
|----------------------------------------|--------------------------------------------------------------------------------------------|
| Max. negative test pulse with 1 signal | 4600 µs                                                                                    |
| Operating medium                       | Compressed air to ISO 8573-1:2010 [7:4:4]                                                  |
| Note on operating and pilot medium     | Lubricated operation possible (in which case lubricated operation will always be required) |
| Vibration resistance                   | Transport application test with severity level 1 to FN 942017-4 and EN 60068-2-6           |
| Shock resistance                       | Shock test with severity level 2 to FN 942017-5 and EN 60068-2-27                          |
| LABS (PWIS) conformity                 | VDMA24364-B1/B2-L                                                                          |
| Media temperature                      | -5 °C...50 °C                                                                              |
| Sound pressure level                   | 85 dB(A)                                                                                   |
| Pilot medium                           | Compressed air to ISO 8573-1:2010 [7:4:4]                                                  |
| Ambient temperature                    | -5 °C...50 °C                                                                              |
| Product weight                         | 940 g                                                                                      |
| Electrical connection                  | Via N1 coil, to be ordered separately                                                      |
| Type of mounting                       | On sub-base<br>Via through-hole and screw                                                  |
| Pilot exhaust port 82                  | M5                                                                                         |
| Pilot exhaust port 84                  | M5                                                                                         |
| Pilot air port 12                      | Sub-base size 2 to ISO 5599-1                                                              |
| Pilot air port 14                      | Sub-base size 2 to ISO 5599-1                                                              |
| Pneumatic connection, port 1           | Sub-base size 2 to ISO 5599-1                                                              |
| Pneumatic connection, port 2           | Sub-base size 2 to ISO 5599-1                                                              |
| Pneumatic connection, port 3           | Sub-base size 2 to ISO 5599-1                                                              |
| Pneumatic connection, port 4           | Sub-base size 2 to ISO 5599-1                                                              |
| Pneumatic connection, port 5           | Sub-base size 2 to ISO 5599-1                                                              |
| Note on materials                      | RoHS-compliant                                                                             |
| Material seals                         | HNBR<br>NBR                                                                                |
| Material housing                       | Die-cast aluminium                                                                         |