Differential Pressure Switch

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1. Installation
It is necessary during installation to observe codes of good practice, to comply with local requirements and to follow the installation instructions. The installation location should be protected against frost and be easily accessible.

2. Fitting to the filter
1. Close shutoff valves 1 and 2.
2. Remove the brass plug 3 and the pressure gauge 4 from the filter.
3. Using the hexagonal key supplied, screw both nipples 5 into threaded tappings 6 on F 76 and F 76 or tappings 7 on the housing of F 76 S-F.
4. Fit the differential pressure switch to nipple 5 and tighten both backnuts 8. In doing this the arrows on the differential pressure switch and filter housing must point in the same direction.
5. Reseal the pressure gauge into the threaded tapping 9 on the differential pressure switch.
6. Open shutoff valves 1 and 2.
7. Check the seal between differential pressure switch and filter housing and if necessary tighten nipple 5 or backnuts 8.

3. Connection to the automatic reverse rinse actuator
1. Fit the automatic reverse rinse actuator to the filter (see installation instructions for the automatic reverse rinse actuator).
2. If an automatic reverse rinse actuator is already fitted, disconnect electrical supply.
3. Remove the housing screws 13 on the automatic reverse rinse actuator and remove the cover 14.
4. Feed cable 15 of the differential pressure switch into the unused cable connector 16 on the housing.
5. Clamp wires onto connectors marked Start and U+ (they can also be connected the other way round).
6. Close the cover.
7. Connect electrical supply.
This will cause a reverse rinse cycle to occur. Ensure that an adequate container is available to accept the discharge water.

4. Setting the pressure switch
The differential pressure at which a reverse rinsing cycle should be started should be set by turning the adjuster knob 10 until the desired value on scale 11 aligns with the markings 12.

☞ The value should be set to correspondence to the degree of contamination at which reverse rinsing should occur. The higher the set value, the greater the degree of contamination.

⚠️ If the value is set too low, this can lead to over frequent reverse rinsing and consequent loss of water.

☞ The setting of the automatic reverse rinse actuator must not be changed. The time interval setting continues to operate.

5. Technical data

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maximum static pressure*</td>
<td>25 bar</td>
</tr>
<tr>
<td>Maximum operating static pressure*</td>
<td>16 bar</td>
</tr>
<tr>
<td>Maximum permissible temperature of medium</td>
<td>+ 70 °C</td>
</tr>
<tr>
<td>Maximum permissible ambient temperature</td>
<td>+ 80 °C</td>
</tr>
<tr>
<td>Micro switch hysteresis</td>
<td>Approx. 2 %</td>
</tr>
<tr>
<td>Maximum load data for micro switch</td>
<td></td>
</tr>
<tr>
<td>$U_{\text{max}}$</td>
<td>24 V</td>
</tr>
<tr>
<td>$I_{\text{max}}$</td>
<td>0.8 A</td>
</tr>
<tr>
<td>$P_{\text{max}}$</td>
<td>19.2 W</td>
</tr>
</tbody>
</table>

* The full performance of the appliance is only given for pressures up to 16.0 bar. However the appliance is capable of withstanding pressures up to 25.0 bar without damage, but at these elevated pressures the differential pressure function can no longer be used.

6. Applications
Suitable for fitting to F 76 fine filters in conjunction with Z 11 A or Z 11 AS automatic reverse rinse actuators
F 76 S-F in conjunction with Z 11 A or Z 11 AS automatic reverse rinse actuator.
F 76 S in conjunction with Z 11 S automatic reverse rinse actuator.

<table>
<thead>
<tr>
<th>Type</th>
<th>for F 76</th>
<th>for F 76 S</th>
<th>for F 76 S-F</th>
</tr>
</thead>
<tbody>
<tr>
<td>DDS 76 - 1/2</td>
<td>$1/2&quot; + 3/4&quot;$</td>
<td>$1/2&quot; + 3/4&quot;$</td>
<td>-</td>
</tr>
<tr>
<td>DDS 76 - 1</td>
<td>$1&quot; + 1/4&quot;$</td>
<td>$1&quot; + 1/4&quot;$</td>
<td>DN 65, 80, 100</td>
</tr>
<tr>
<td>DDS 76 - 1 1/2</td>
<td>$1 1/2&quot; + 2&quot;$</td>
<td>$1 1/2&quot; + 2&quot;$</td>
<td>-</td>
</tr>
</tbody>
</table>

7. Safety Guidelines
1. Use the appliance
   - In good condition
   - According to regulations
   - With due regard to safety.
2. Follow installation instructions.
3. Immediately rectify any malfunctions which may influence safety.
4. The DDS 76 differential pressure switch is exclusively for use in applications detailed in these installations instructions. Any variation from this or other use will not comply with requirements.