Multi-Channel Connector
for Mold Cavity Pressure Measurement

Simple solution to connect up to 8 Single-Wire sensors with the CoMo injection through a single cable. The integrated Mold Recognition simplifies loading of mold and article datasets into the Como Injection System as well as the detection of connection errors.

- Simplified connection of up to 8 sensors, using single-wire technique
- Compact multi-channel connector for up to 8 sensors
- Use of 4-channel or 8-channel extension cables

Description
A 4-channel connector allows the connection of up to four sensors. The 8-channel connector is designed for the connection of up to eight sensors.

Selection of the appropriate multi-channel connector can thus be determined by the grouping of the cavities. In the case of a mold with eight cavities, two 4-channel connectors can be fitted, i.e. one on each side.

Application
The multi-channel connectors is designed for industrial use in multi-cavity molds. The multi-channel connectors Type 1708B... and 1710B... save space in the mold, and the simplified connection technique reduces the time needed to install the multi-channel extension cables Types 1995A... and 1997A... .

The multi-channel connectors enable in connection with Single-Wire Cables a simple mounting of cavity pressure sensors.

This simplifies and standardizes the connection to quality monitoring systems like the CoMo Injection. The hazards of a potential mix-up can be excluded when connecting the sensors to the CoMo Injection. In addition the Multichannel Connector has an integrated chip which allows the assignment to a specific mold. This enables the CoMo Injection to recognise which mold is connected.

The multi-channel connectors can also be operated with the conventional machine-integrated charge amplifiers Type 5159A... . An adapter cable Type 1999A1A... is provided to ensure compatibility with this type of installation.

The operating temperature limit without using the mold recognition is 200 °C. If using with Mold Recognition the operating temperature limit is 125 °C.

Technical Data

<table>
<thead>
<tr>
<th>Multi Sensor Set Type 1708B..., 1710B...</th>
<th>Type 1708B</th>
<th>Type 1710B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of channels</td>
<td>–</td>
<td>1 ... 4</td>
</tr>
<tr>
<td>Mounting</td>
<td>–</td>
<td>in the mold</td>
</tr>
<tr>
<td>Mounting dimensions (LxWxD) mm</td>
<td>52x28x26</td>
<td>68x28x26</td>
</tr>
<tr>
<td>Connector type for extension</td>
<td>–</td>
<td>Fischer 103</td>
</tr>
<tr>
<td>Mold temperature °C</td>
<td>200*</td>
<td>200*</td>
</tr>
</tbody>
</table>

* If using with Mold Recognition temperature limit is 125 °C
Mounting
The single-wire cables of the cavity pressure sensors are tightened by hand directly into the cut-and-grip contacts behind the multi-channel connector. The cable can be cut to length as appropriate for the mold dimensions.

Detailed recommendations on mounting are contained in the document "Mounting Instructions for Multichannel Connector" Doc. No. 002-682. This is contained in the accessories included.

Processing of Measured Data
For the automatic processing of the measured data and for process control is the CoMo Injection System Type 2869… available (Datasheet: 2869B_000-549)
## Scope of Delivery with Included Accessories

<table>
<thead>
<tr>
<th>Accessories</th>
<th>Type/Art. No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>4-channel connector with Fischer 103</td>
<td>1708B...</td>
</tr>
<tr>
<td>Coding plate (red) for Type 1708B0</td>
<td>3.520.1037</td>
</tr>
<tr>
<td>or 8-channel connector with Fischer 104</td>
<td>1710B...</td>
</tr>
<tr>
<td>Coding plate (red) Type 1710B0</td>
<td>3.520.1101</td>
</tr>
<tr>
<td>Document &quot;Mounting Instructions for Multichannel Connector&quot;</td>
<td>002.683</td>
</tr>
<tr>
<td>Socket Head Cap Screw M4x10</td>
<td>6.120.117</td>
</tr>
<tr>
<td>Protective cap with Fischer D/K103</td>
<td>5.211.513</td>
</tr>
<tr>
<td>Mounting tool</td>
<td>55134752</td>
</tr>
</tbody>
</table>

## Optional Accessories

### 4-channel extension cable for Type 1708B...
- (max. 4 sensors)
  - Connector 6-pin pos. to connector 6-pin neg.
    - Length 1 m | 1995A1 |
    - Length 2 m | 1995A2 |
    - Length 5 m | 1995A5 |
    - Length customer-specific | 1995Asp |
    - \( L_{\text{min}} = 0.3 \text{ m} / L_{\text{max}} = 10 \text{ m} \)

### 8-channel extension cable for Type 1710B...
- (max. 8 sensors)
  - Connector 11-pin pos. to connector 11-pin pos.
    - Length 1 m | 1997A1 |
    - Length 2 m | 1997A2 |
    - Length 5 m | 1997A5 |
    - Length customer-specific | 1997Asp |
    - \( L_{\text{min}} = 0.3 \text{ m} / L_{\text{max}} = 10 \text{ m} \)

### Adapter cable for Type 1708B...
- 4 BNC connectors for charge amplifier Type 5159,
  - Connector 6-pin pos. to 4 x BNC pos.
    - Length 0,5 m | 1999A1A0,5 |
    - Length 2 m | 1999A1A2 |
    - Length 5 m | 1999A1A5 |
    - Length customer-specific | 1999A1Asp |
    - \( L_{\text{min}} = 0.6 \text{ m} / L_{\text{max}} = 10 \text{ m} \)

### Adapter cable for Type 1710B...
- 8 BNC connectors
  - Connector 11-pin pos. to 8 x BNC neg.
    - Length 0,5 m | 1999A2A0,5 |
    - Length customer-specific | 1999A2Asp |
    - \( L_{\text{min}} = 0.6 \text{ m} / L_{\text{max}} = 10 \text{ m} \)