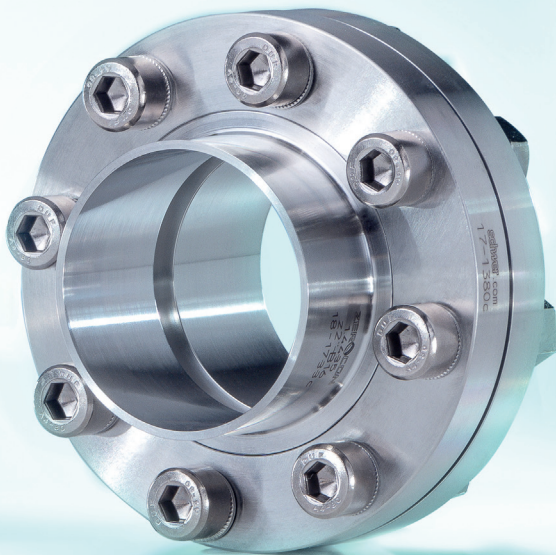


ASSEMBLY INSTRUCTION

ZeroCon Flange



MA-ZC-Flansche
10.2024 Rev. 2

Focus in details®

schwer
fittings



Safety Instructions

■ General safety regulations

Please pay attention to **general safety regulations** when working with tools and machines. Wear protective clothing!

■ Pipeline and medium

Before assembly or disassembly make sure, the tube or pipeline **is not under pressure**. Take care **not to apply any additional tension or stress** to the coupling, when setting up the pipeline.

Do not exceed any **temperature or pressure limits**. Pay attention when using dangerous or harmful mediums. Respect the **temperature at the pipeline**.

■ Workplace

Keep your workplace clean. Make sure you have the all necessary material available before starting the assembly.

■ Wear Safety glasses

Some workers just remove chips from the tubes by using pressurized air. Dust and chips can harm your eyes, therefore **wear safety glasses**.

■ Foreign particles

Take care that the coupling is **free of dirt and foreign particles** before assembly. Contaminated parts may cause leakages.



Content

■ Parts list	4
■ Assembly instruction	5
■ Disassembly	10

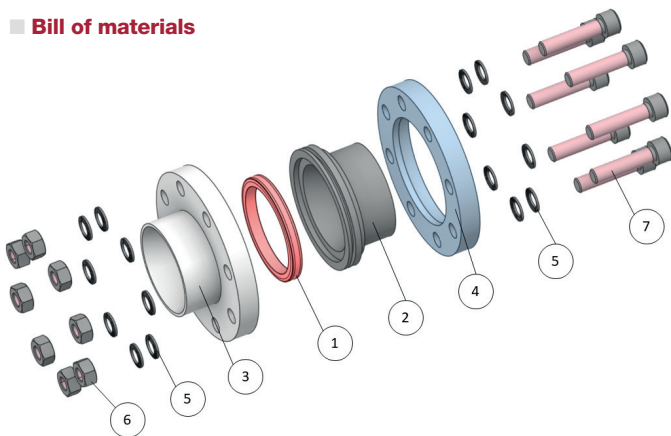


Assembly Instruction

Note:

The high-density ZC screw connection must always be installed under the cleanest possible conditions. It must always be ensured that all sealing and functional surfaces of the individual parts are free of dirt and foreign particles.

Bill of materials

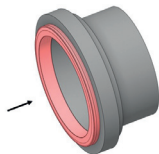


1. Sealing ring
2. Insert flange
3. Welding flange
4. Loose flange
5. Safety washer
6. Nut
7. Screw



Assembly Instruction

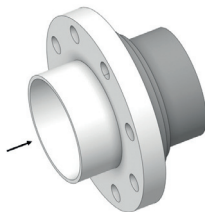
Step 1



Insert the sealing ring pos. 1 into the insert flange pos. 2.

► Sealing ring centres itself and is firmly seated in the insert flange.

Step 2



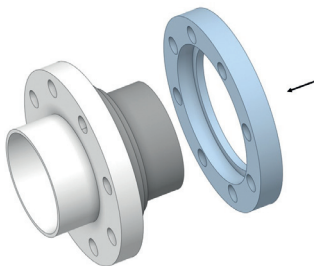
Push the weld-on flange pos. 3 onto the sealing ring item pos. 1.

► Connection self-centred through the sealing ring.



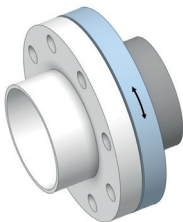
Assembly Instruction

Step 3



Mount the loose flange Pos. 4 onto the insert flange pos. 2

Step 4

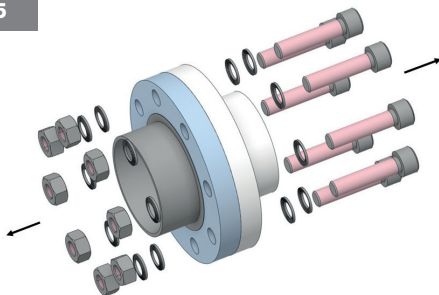


Align the loose flange pos. 4 to the drill holes



Assembly Instruction

Step 5



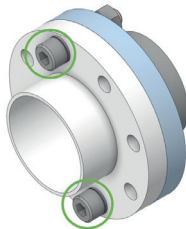
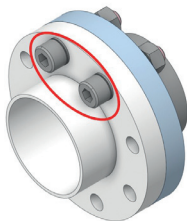
Put in the screw set

1. Assemble the safety washers pos. 5 on to every screw
2. Mount the nuts pos. 6 including the safety washers pos. 5
3. Tighten all screws pos. 7 hand tight with the nut pos. 6.



Assembly Instruction

Step 6



Tighten the screws pos. 7

► When tightening the ZC-flange connection, ensure that the screws are tightened crosswise by using a torque wrench!

Wrong sequence for screw tightening

Correct sequence for screw tightening

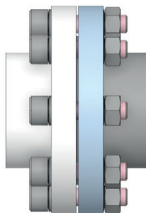
The screws pos. 7 need to be tightened in two steps.

- For the first step all screws need to be tightened crosswise according to the torque M1 mentioned in the table 1.
- For the second step all screws need to be tightened crosswise according to the torque M2 mentioned in the table 1.

	System 1 (SNW-F1-4DC)	System 2 (SNW-F2-4DC).	System 3 (SNW-F3-4DC)	System 4 (SNW-F4-4DC)
ISO	NW 20	NW 25, 32, 40, 50	NW 65	NW 80
DIN	DN 20, 25	DN 32, 40, 50	DN 65	DN 80, 100
INCH	1"	1 1/2", 2", 2 1/2"	3"	4"
Torque M1	5 Nm	12 Nm	25 Nm	25 Nm
Torque M2	10 Nm	25 Nm	50 Nm	50 Nm



Assembly Instruction



The assembly is completed, if all screws are tightened with the torque M2.

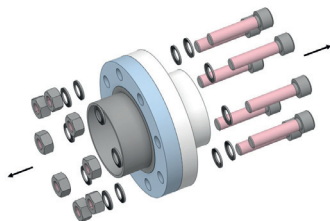


Disassembly



Disassembly

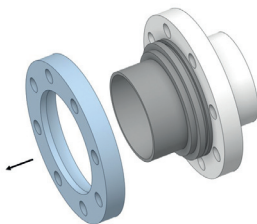
Step 1



Remove the screw set Pos. 5, 6 and 7

1. Loosen all the screws.
2. Remove all nuts, screws and safety washers.

Step 2

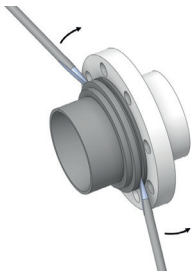


Remove the loose flange pos. 4 from the insert flange pos. 3.



Disassembly

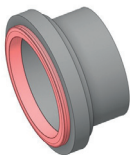
Step 3



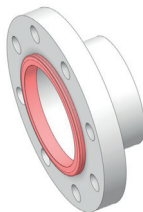
1. Place the screwdrivers on the groove of the insert flange pos. 3.
 2. By alternately levering with the screwdrivers, the insert flange pos. 3 is released from the weld-on flange pos. 2
- Normally the sealing ring pos. 1 will remain stuck in in one of the two flange halves.

Step 4

Insert flange



Welding flange



Sealing ring pos. 1 remains stuck in pos. 2.

- Keep going with step 5

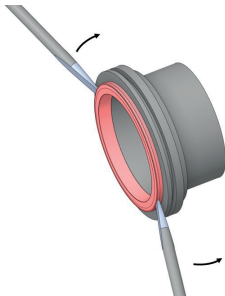
Sealing ring pos. 1 remains stuck in pos. 3.

- Keep going with step 6



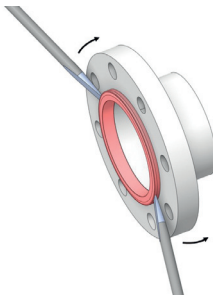
Disassembly

Step 5



1. Place the screwdrivers on the groove of the sealing ring pos. 1.
2. Alternately levering with the screwdrivers and repeatedly applying the screwdrivers around the circumference loosens the sealing ring from the insert flange.

Step 6



1. Place the screwdrivers on the groove of the sealing ring pos. 1.
2. Alternately levering with the screwdrivers and repeatedly applying the screwdrivers around the circumference loosens the sealing ring from the insert flange.

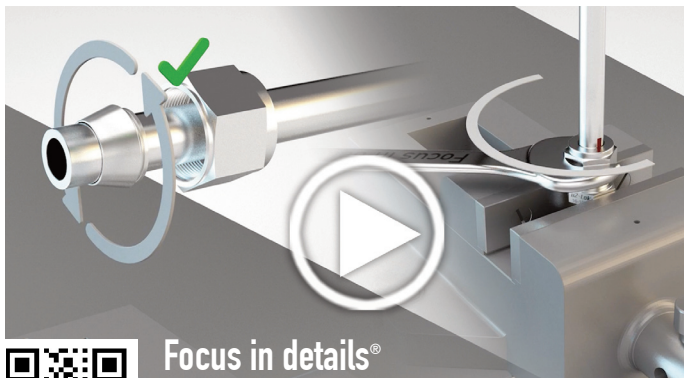


Installation Videos

■ Installation Videos

Our installation videos can be found at:

www.schwer.com



Focus in details®
eShop

schwer
fittings

Schwer Fittings GmbH
Hans-Schwer-Platz 1
D-78588 Denkingen

Tel.: +49 (0) 74 24 / 98 25-0
info@schwer.com
www.schwer.com