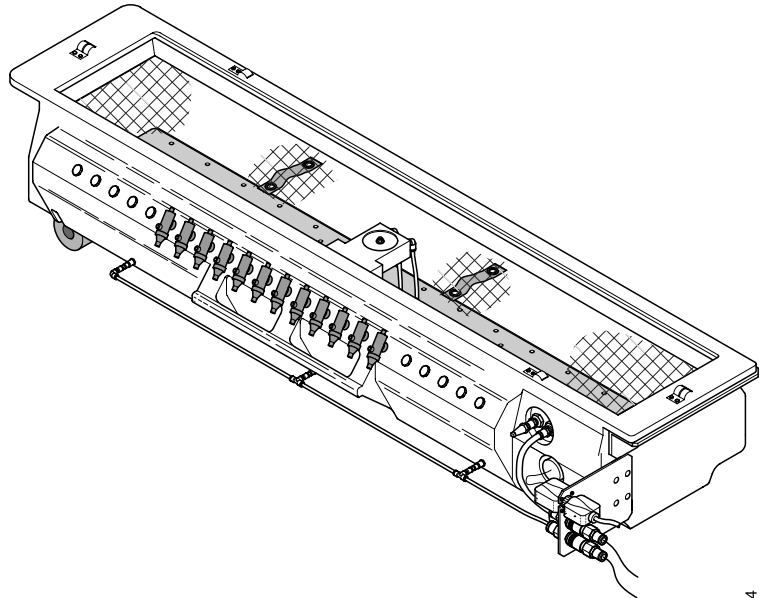




From February 1st, 2017 SAMES Technologies SAS becomes SAMES KREMLIN SAS  
A partir du 1/02/17, SAMES Technologies SAS devient SAMES KREMLIN SAS



DES01264

# User manual

## CSV 800 Tanks CSV 800 Reduced Capacity and CSV 800 for M4500 Booth

**SAMES Technologies**

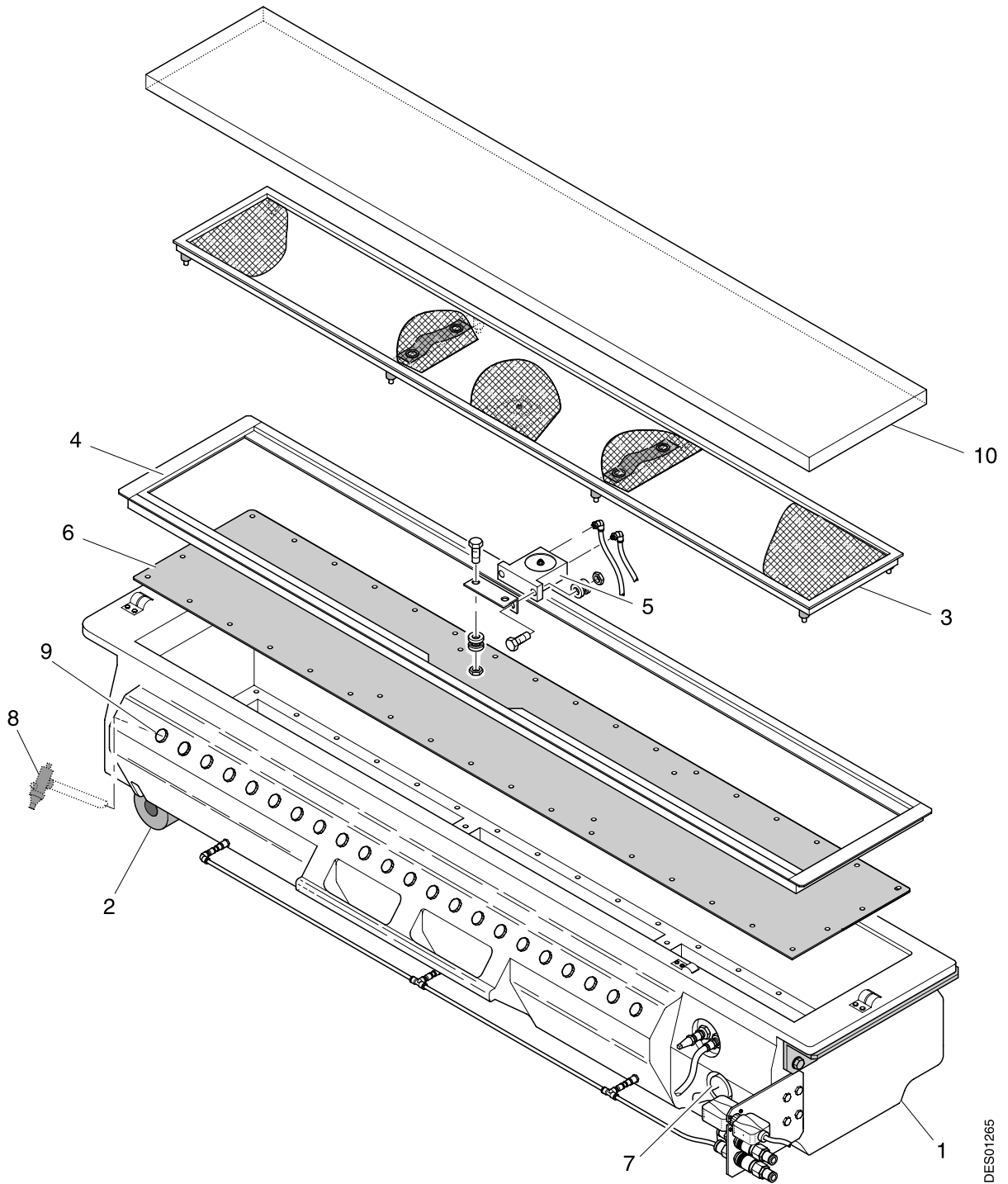
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CSV 800 Tanks  
 CSV 800 Reduced Capacity  
 and CSV 800 for M4500 Booth

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# 1. Description

## 1.1. General Description



DES01265

**CSV 800** tanks (normal and reduced capacity versions) are designed exclusively for use with a "powdering booth".

These tanks are part of a machine commonly referred to as a "powdering booth" which, in turn, is part of a surface coating system. The declaration of incorporation and the compliance plate must be provided for the entire "powdering booth".

**CSV 800** tanks are made up of the following main components:

- a rotomoulded tank body (1), equipped with six pivoting rollers (2),
- a 710 µm sieve (3) mounted on a sieve frame (4) to which a vibrator is secured (5),
- a fluidization plate (6) screwed to the bottom of the tank body,
- a powder level detector (7).

The **CSV 800** tank can also be fitted with the following optional equipment:

- a 400 µm or 250 µm sieve (3),
- between 1 and 22 **CS 126** suction plungers (8) or plugs (9) if necessary,
- a protection cover (10).

## 1.2. Technical Data

### 1.2.1. General Characteristics

<b>Operating temperature</b>	between 0 and 40 °C (32 to 104 °F)
<b>Overall height</b>	330 mm approx.
<b>Width</b>	575 mm
<b>Depth</b>	260 mm approx.
<b>Weight</b>	approx. 50 kg when empty
<b>Effective capacity</b>	150 l (i.e. approx. 75 kg of fluidized powder)
<b>Effective capacity (for tank with reduced capacity)</b>	75 l (i.e. approx. 38 kg of fluidized powder)
<b>Max. number of plungers</b>	22

### 1.3. Pneumatic Characteristics

<b>Fluidization air pressure</b>	1 bar
<b>Consumption of dried, filtered air</b>	12 to 15 m <sub>0</sub> <sup>3</sup> /h for fluidization (*).

Characteristics of compressed supply air as per standard **NF ISO 8573-1**:

<b>Maximum dew point at 6 bar</b>	class 4 i.e. + 3 °C (+ 37 °F)
<b>Maximum grain size of solid pollutants</b>	class 3 i.e. 5 microns
<b>Maximum oil concentration</b>	class 1 i.e. 0.01 mg/ m <sub>0</sub> <sup>3</sup> (*)
<b>Maximum concentration of solid pollutants</b>	class 3 i.e. 5 mg/m <sub>0</sub> <sup>3</sup> (*)

(\*) m<sub>0</sub><sup>3</sup> : volume expressed for normal atmospheric pressure (1013 mbar) and a temperature of 20 °C (68 °F)

### 1.3.1. Level Detector Characteristics

<b>Power supply voltage</b>	20/250 V AC/DC
<b>Output holding current</b>	350 mA AC (+ 50 °C (+ 122 °F)) 100 mA DC (+ 80 °C (+ 176 °F))
<b>Output inrush current</b>	2.2 A (20 ms / 0.5 Hz)
<b>Maximum output current</b>	5 mA
<b>Voltage drop/maximum load</b>	< 6.5 V/250 V AC
<b>Residual current</b>	< 2.5 mA/250 VA < 1.3 mA/110 V AC < 0.8 mA/24 V DC
<b>Switching frequency</b>	25 Hz AC/30 Hz DC
<b>LED switching indication</b>	Yellow
<b>Ambient temperature</b>	-25 /+80 °C (-13/+176 °F)
<b>Protection</b>	IP 65
<b>EMC</b>	group 2
<b>Housing</b>	PBTP polycarbonate cover
<b>Connection</b>	terminals up to 2.5 mm <sup>2</sup>
<b>Connection diagram</b>	see figure DES01266. (see § 3 page 5)

## 1.4. Operating Principle

The tank is supplied with compressed air through the fluidization plate.

The air flowing up from this plate fluidizes the sieved powder contained in the tank.

The tank can accommodate up to 22 suction plungers used to supply 22 powder spray guns.



**It can be dangerous to use this equipment for purposes other than those mentioned above.**

## 2. Installation

### 2.1. Electrical and Ancillary Connections

The **CSV 800** tank is electrically grounded by bringing the tank into contact with the frame on the "powdering booth".

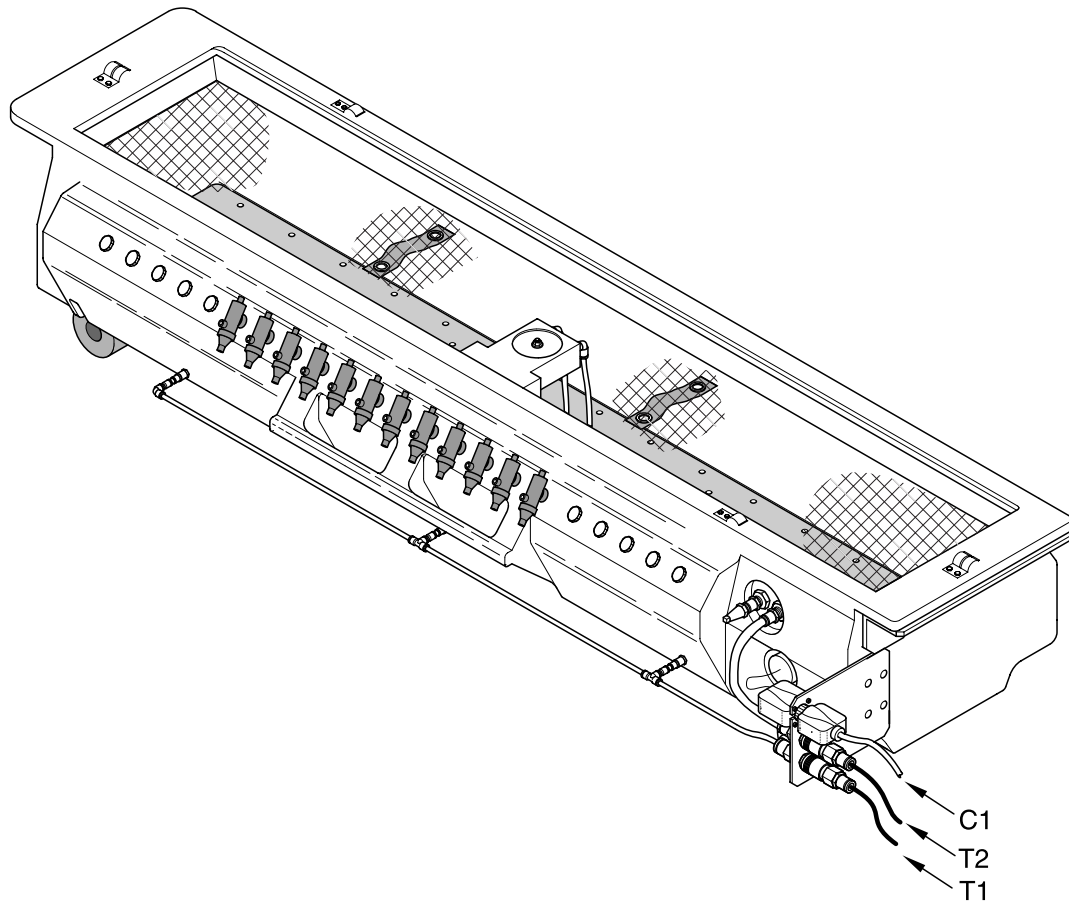
It is therefore important to ensure that the powdering booth itself is electrically grounded.

### 2.2. Installing the Equipment

The **CSV 800** tank is installed by a professional installer.

For any changes concerning the tank or its installation, it is essential to follow the installer's recommendations.

## 3. Startup



DES01266

Connect the following items:

- the "fluidization" air supply hose [**T1**] (dia. 6/8 mm) of the powder tank,
- the sieve vibrator air supply hose [**T2**] (dia. 6/8 mm),
- the connector [**C1**] of the powder "low" level detector.

## 4. Preventive Maintenance



**Use compressed air, a cloth or possibly a brush for all cleaning operations. Water must never be used to clean the equipment.**

The fouling and wear of the equipment caused by the powder paint passing through it vary according to the type of powder used.

The maintenance frequency shown below is therefore only a guide.

With a little experience in using **SAMES** equipment, the user will be able to draw up his own maintenance schedule.

As an initial guide, we recommend the following maintenance program:

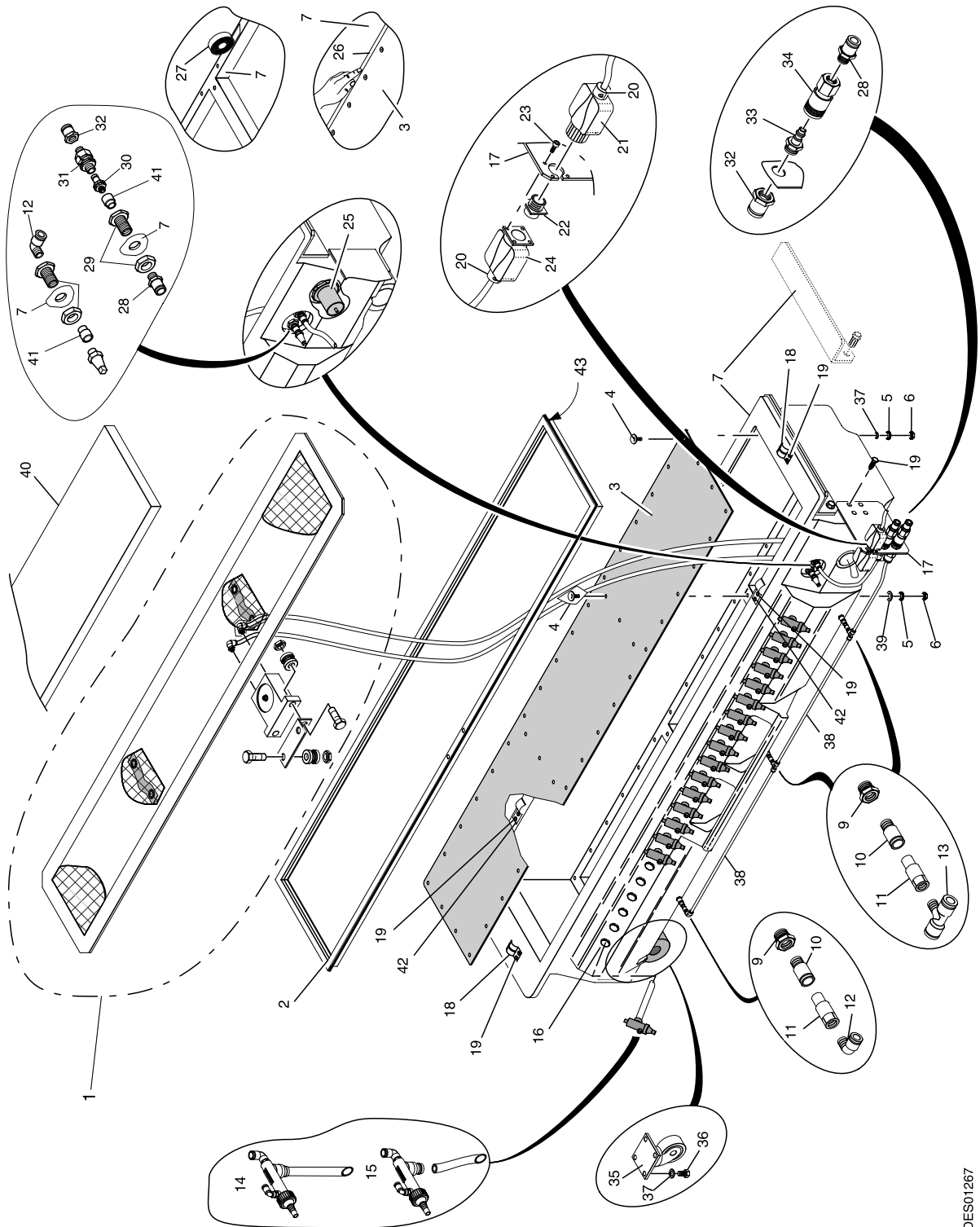
Maintenance frequency	Action
<ul style="list-style-type: none"> <li>• Daily</li> </ul>	<ul style="list-style-type: none"> <li>• Check the condition of the equipment.</li> </ul>
<ul style="list-style-type: none"> <li>• Every 8 hours of operation</li> </ul>	<ul style="list-style-type: none"> <li>• After disconnecting its (their) "injection" and "dilution" air supply hoses, remove the suction plunger(s) and clean it (them) using compressed air or a vacuum cleaner.</li> </ul>
<ul style="list-style-type: none"> <li>• Weekly</li> </ul>	<ul style="list-style-type: none"> <li>• Clean the vibrating sieve using an air spray.</li> </ul>
<ul style="list-style-type: none"> <li>• Every 40 to 60 hours of operation</li> </ul>	<ul style="list-style-type: none"> <li>• Change the venturi(s) of the suction plunger(s) if it (they) is (are) worn.</li> <li>• Check that the suction plungers are perfectly clean. If they are soiled, clean them or change them.</li> </ul>

## 5. Corrective Maintenance

Symptoms	Probable causes	Remedies
<ul style="list-style-type: none"> <li>• The powder comes out in spurts.</li> </ul>	<ul style="list-style-type: none"> <li>• Powder fluidization is insufficient.</li> </ul>	<ul style="list-style-type: none"> <li>• Set the "fluidization" air pressure to a suitable value.</li> </ul>
	<ul style="list-style-type: none"> <li>• Wrong diameter of powder supply hose.</li> </ul>	<ul style="list-style-type: none"> <li>• Change the powder supply hose.</li> </ul>
<ul style="list-style-type: none"> <li>• Powder does not flow through the sieve correctly.</li> </ul>	<ul style="list-style-type: none"> <li>• Sieve clogged</li> </ul>	<ul style="list-style-type: none"> <li>• Clean or change the sieve.</li> </ul>
	<ul style="list-style-type: none"> <li>• Vibrator malfunction.</li> </ul>	<ul style="list-style-type: none"> <li>• Check the vibrator; replace if necessary.</li> </ul>

## 6. Spare Parts

### 6.1. CSV 800 Rotomoulded Tank - 1506764

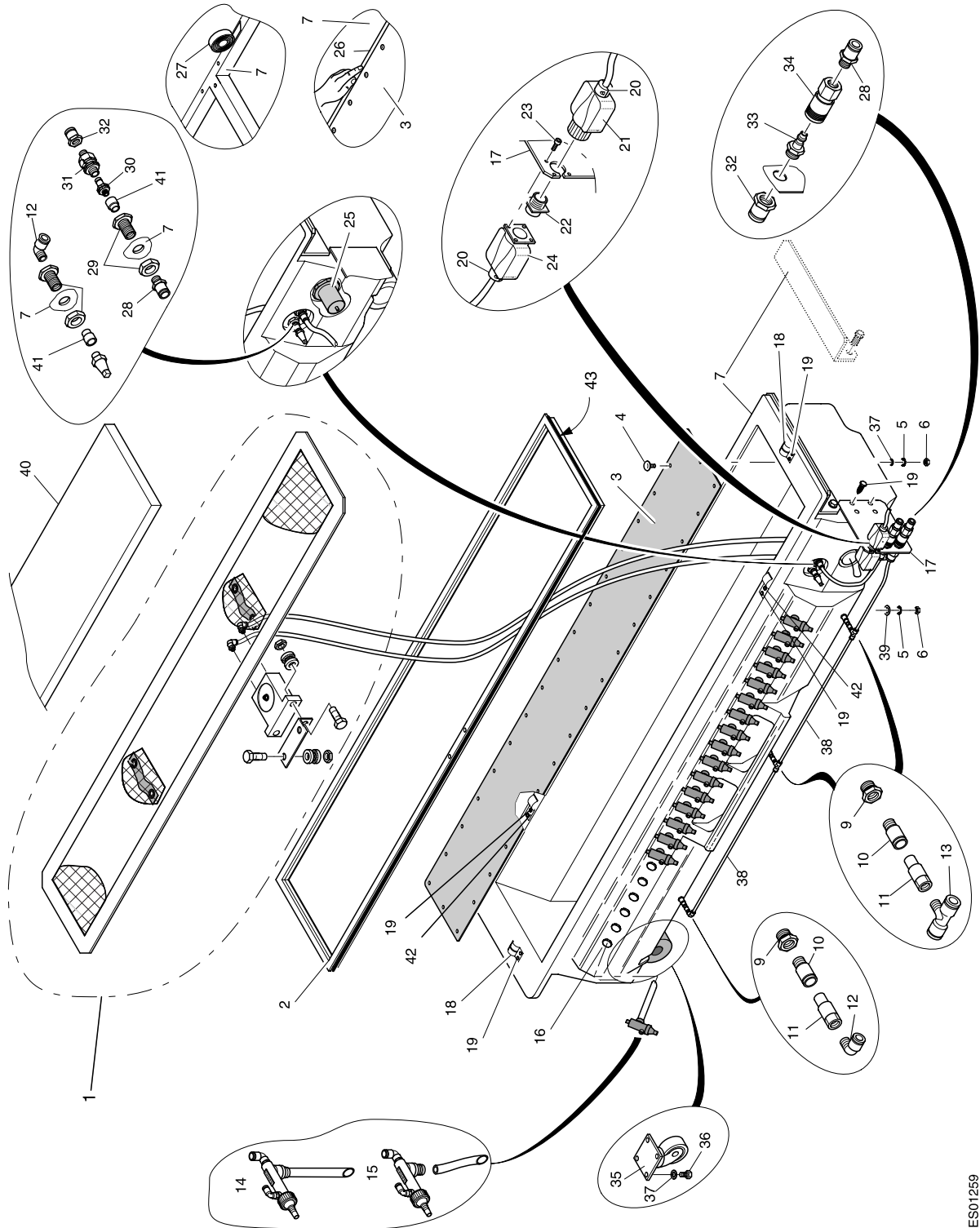


DES01267



Item	Product code	Name	Qty	Unit of sale
1	1506645	710 micron sieve assembly ( <a href="#">see § 6.4 page 13</a> )	1	1
	1508680	400 micron sieve assembly ( <a href="#">see § 6.5 page 14</a> )	Option	1
	1508681	250 micron sieve assembly ( <a href="#">see § 6.6 page 15</a> )	Option	1
2	1201356	Sieve frame	1	1
3	1303852	Fluidization plate	1	1
4	X4EBRC231	Screw M 6 x 45 stainless steel	45	10
5	X2BDVX006	Fan washer M 6	45	10
6	X2BEHU006	Nut H M 6	45	10
7	1201653	Rotomoulded tank body with lifting handle	1	1
9	F6RLRP318	Male/female reduction	3	1
10	F6RLJR274	Male end piece	3	1
11	F6RLJR275	Coupler	3	1
12	F6RLCS207	Elbow union	2	1
13	F6RLTS457	T-fitting	2	1
14	-	CS 126 suction plunger with rigid plunger tube, <a href="#">see RT Nr 6132</a> .	Option	1
15	-	CS 126 suction plunger with flexible plunger tube, <a href="#">see RT Nr 6132</a> .	Option	1
16	F6NPBA097	Plug	22	1
17	1403753	Coupler support	1	1
18	E2TCEM014	Ground contact	4	10
19	X3GJCP002	Coupler support and ground contact fastening screw	8	10
20	E4PTFA121	Cable clamp	2	1
21	E4PTFS212	Female 3-pin plug	1	1
22	E4PTFE211	Male 3-pin base plate	1	1
23	X2BVCB067	Screw C M 3 x 10 Ac. zinc-plated	4	1
24	E4PTFE213	Case for base plate	1	1
25	E6KDDP066	Level detector	1	1
26	H2LPAP094	White sealing compound	-	-
27	J2CMBN372	25 x 3 foam seal	-	-
28	F6RLUS269	Male simple union $\pi$ " diam. 6/8 mm	3	1
29	F6RLGG322	Bulkhead union	2	1
30	F6RPJR012	Male body	1	1
31	F6RPJR013	Male end piece	1	1
32	F6RLUS459	Female simple union $\pi$ " diam. 6/8 mm	2	1
33	F6RLJR195	Coupler	1	1
34	F6RLJR194	Coupler	1	1
35	Q1VRGP041	Pivoting rollers	6	1
36	X2BVHA222	Screw, H M 6 x 12	24	10
37	X2BDMU006	Washer, M 6	69	10
38	U1GLBT142	6/8 mm blue polyurethane hose	2m	m
39	X2BDTU006	Wide washer Diam. 6 mm	6	10
41	F6RXRG081	Adapter 1/8" - 1/4"	2	1
42	E2TCEM015	Ground contact	2	1
43	J2YJPR017	Seal (bonded under the sieve frame)	1	1
40	1201544	Protection cover	Option	1

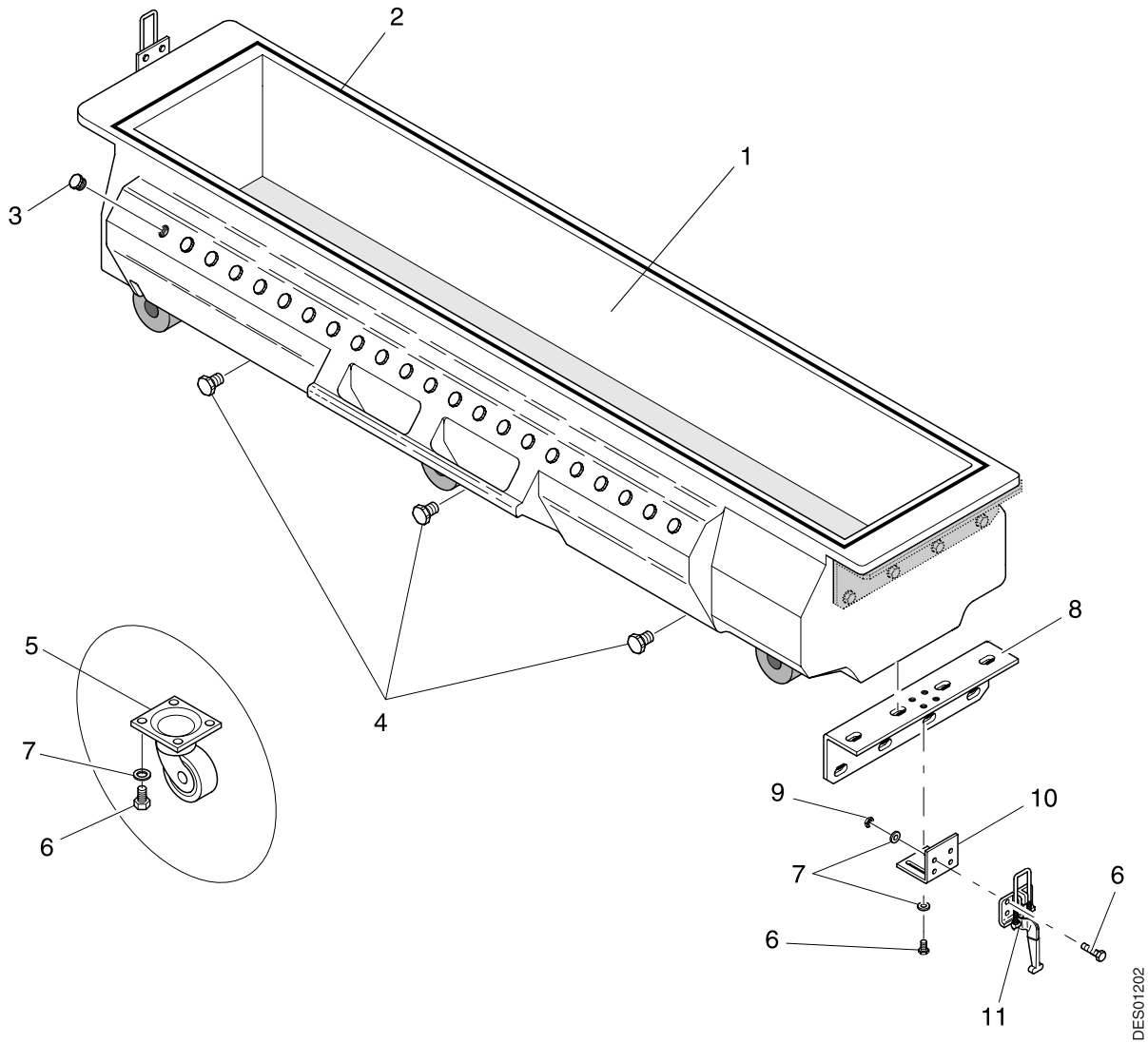
6.2. CSV 800 Rotomoulded Tank with reduced capacity -1506765



DES01259

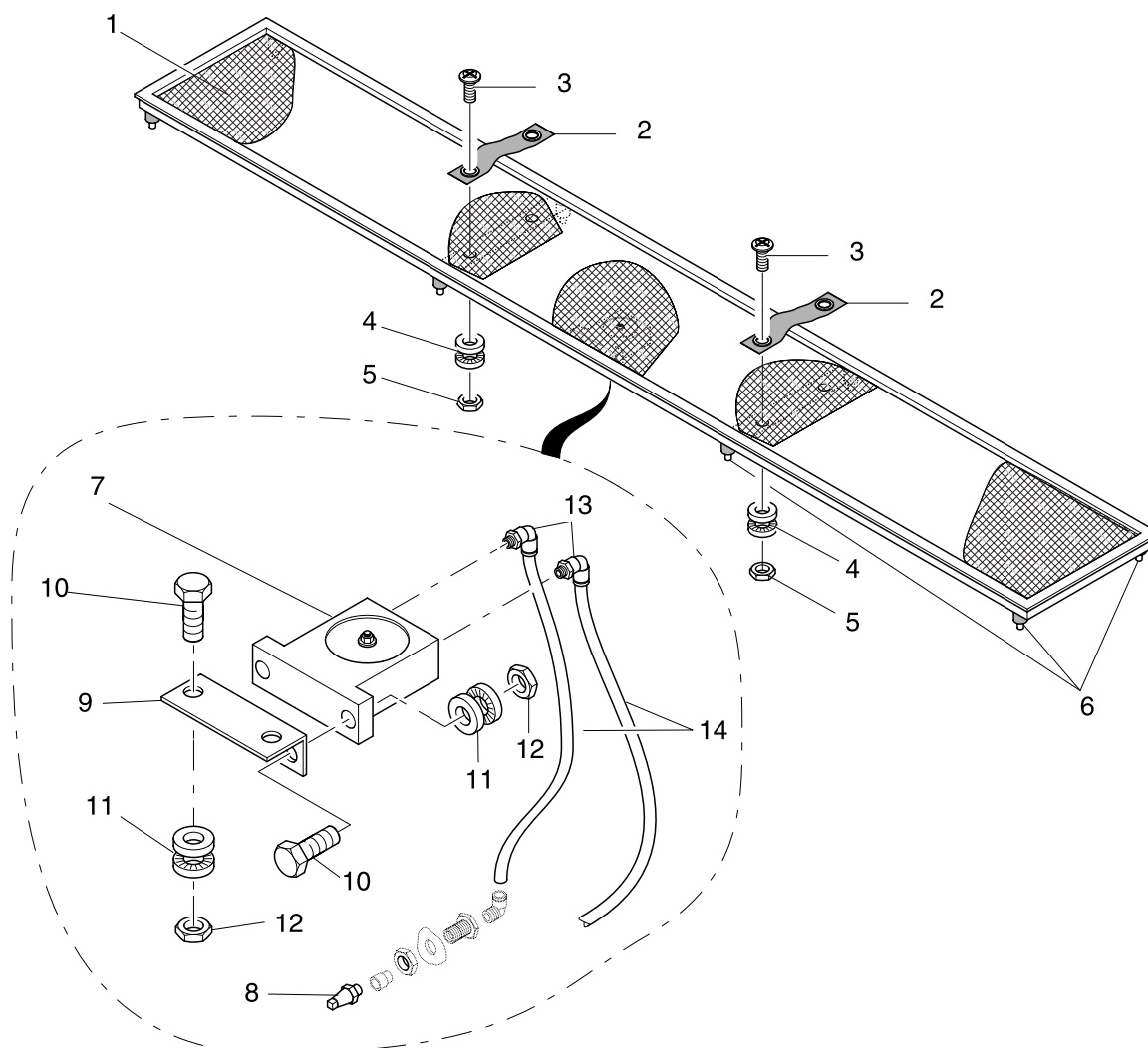
Item	Product code	Name	Qty	Unit of sale
1	1506645	710 micron sieve assembly ( <a href="#">see § 6.4 page 13</a> )	1	1
	1508680	400 micron sieve assembly ( <a href="#">see § 6.5 page 14</a> )	Option	1
	1508681	250 micron sieve assembly ( <a href="#">see § 6.6 page 15</a> )	Option	1
2	1201356	Sieve frame	1	1
3	1303853	Fluidization plate	1	1
4	X4EBRC231	Screw M 6 x 45 stainless steel	45	10
5	X2BDVX006	Fan washer M 6	45	10
6	X2BEHU006	Nut H M 6	45	10
7	1101847	Rotomoulded tank body with lifting handle	1	1
9	F6RLRP318	Male/female reduction	3	1
10	F6RLJR274	Male end piece	3	1
11	F6RLJR275	Coupler	3	1
12	F6RLCS207	Elbow union	2	1
13	F6RLTS457	T-fitting	2	1
14	-	CS 126 suction plunger with rigid plunger tube, <a href="#">see RT Nr 6132</a> .	Option	1
15	-	CS 126 suction plunger with flexible plunger tube, <a href="#">see RT Nr 6132</a> .	Option	1
16	F6NPBA097	Plug	22	1
17	1403753	Coupler support	1	1
18	E2TCEM014	Ground contact	4	10
19	X3GJCP002	Coupler support and ground contact fastening screw	8	10
20	E4PTFA121	Cable clamp	2	1
21	E4PTFS212	Female 3-pin plug	1	1
22	E4PTFE211	Male 3-pin base plate	1	1
23	X2BVCB067	Screw C M 3 x 10 Ac. zinc-plated	4	1
24	E4PTFE213	Case for base plate	1	1
25	E6KDDP066	Level detector	1	1
26	H2LPAP094	White sealing compound	-	-
27	J2CMBN372	25 x 3 foam seal	-	-
28	F6RLUS269	Male simple union $\pi$ " diam. 6/8 mm	3	1
29	F6RLGG322	Bulkhead union	2	1
30	F6RPJR012	Male body	1	1
31	F6RPJR013	Male end piece	1	1
32	F6RLUS459	Female simple union $\pi$ " diam. 6/8 mm	2	1
33	F6RLJR195	Coupler	1	1
34	F6RLJR194	Coupler	1	1
35	Q1VRGP041	Pivoting rollers	6	1
36	X2BVHA222	Screw, H M 6 x 12	24	10
37	X2BDMU006	Washer, M 6	69	10
38	U1GLBT142	6/8 mm blue polyurethane hose	2m	m
39	X2BDTU006	Wide washer Diam. 6 mm	6	10
41	F6RXRG081	Adapter 1/8" - 1/4"	2	1
42	E2TCEM015	Ground contact	2	1
43	J2YJPR017	Seal (bonded under the sieve frame)	1	1
40	1201544	Protection cover	Option	1

### 6.3. CSV 800 Tank Assembly for M4500 Booth - 1511207



Item	Product code	Name	Qty
1	1101431	<b>CSV 800</b> tank only	1
2	J2YJPR018	Adhesive EPDM seal MF25	5 m
3	F6NPBA097	Plug for suction plungers	22
4	F6RLBH004	Plug for fluidization openings	3
5	Q1VRGP041	Pivoting rollers	6
6	X2BVHA222	Screw, H M 6 x 12	40
7	X2BDMU006	Washer Diam. 6 mm	40
8	1201532	Handle bracket	2
9	X2BEHU006	Nut H M 6	8
10	1404633	Quick fastener bracket	2
11	Q1FFER139	Quick fasteners	2

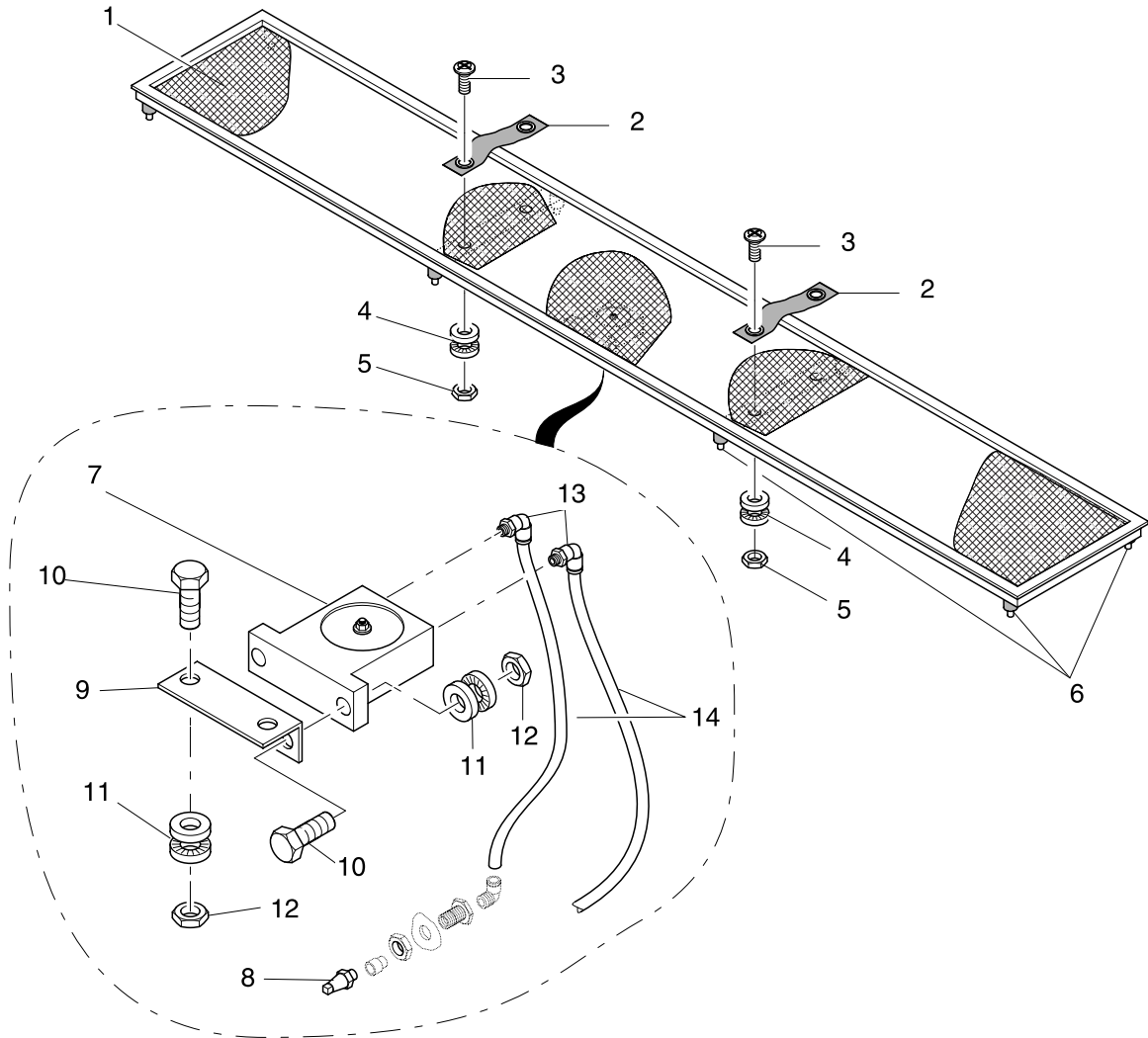
#### 6.4. 710 µm sieve- 1506465



DES01268

Item	Product code	Name	Qty	Unit of sale
1	1201355	710 µm sieve only	1	1
2	1404194	Sieve handle	2	1
3	X4FVRL226	Screw, RL M 6 x 20	4	10
4	X3CDSP783	Self-locking washer M 6	4	10
5	X2BEHU006	Nut H M 6	4	10
6	Q4BPGS045	Rubber stop	8	10
7	K3VARC009	Vibrator	1	1
8	-	Silencer (supplied with vibrator)	-	-
9	1303309	Sieve vibrator bracket	1	1
10	X2BVHA285	Screw, H M 8 x 30	4	10
11	X3CDSP781	Self-locking washer	4	10
12	X2BEHU008	Nut H M 8	4	10
13	F6RLCS393	Elbow union π" diam. 6/8 mm	1	1
14	U1GJBJ194	Yellow polyurethane hose, diam. 6/8 mm	1 m	m

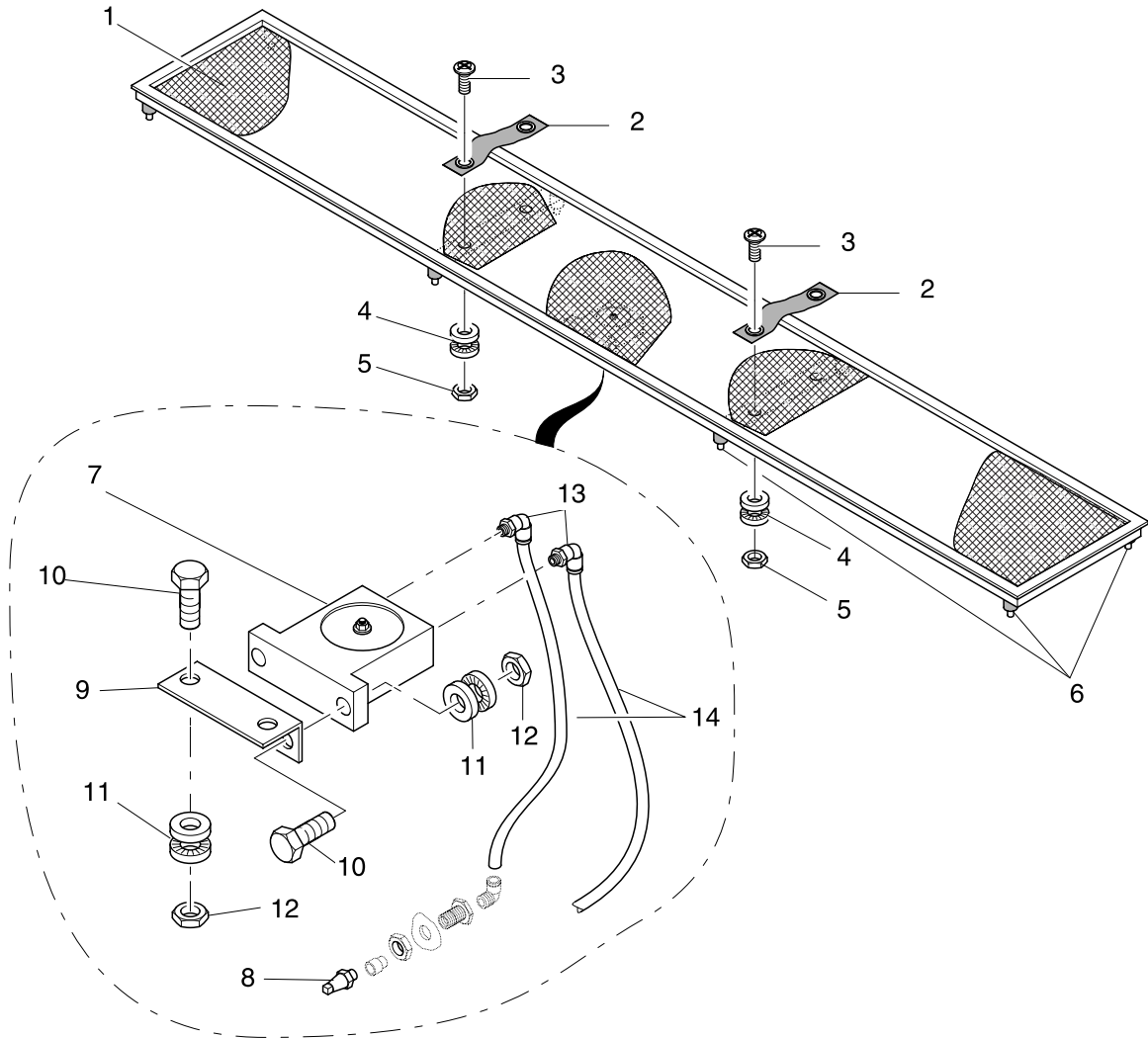
### 6.5. 400 µm sieve-1508680



DES01268

Item	Product code	Name	Qty	Unit of sale
1	1201647	400 µm sieve only	1	1
2	1404194	Sieve handle	2	1
3	X4FVRL226	Screw, RL M 6 x 20	4	10
4	X3CDSP783	Self-locking washer M 6	4	10
5	X2BEHU006	Nut H M 6	4	10
6	Q4BPGS045	Rubber stop	8	10
7	K3VARC009	Vibrator	1	1
8	-	Silencer (supplied with vibrator)	-	-
9	1303309	Sieve vibrator bracket	1	1
10	X2BVHA285	Screw, H M 8 x 30	4	10
11	X3CDSP781	Self-locking washer	4	10
12	X2BEHU008	Nut H M 8	4	10
13	F6RLCS393	Elbow union π" diam. 6/8 mm	1	1
14	U1GJBJ194	Yellow polyurethane hose, diam. 6/8 mm	1 m	m

## 6.6. 250 µm sieve-1508681



DES01268

Item	Product code	Name	Qty	Unit of sale
1	1201648	400 µm sieve only	1	1
2	1404194	Sieve handle	2	1
3	X4FVRL226	Screw, RL M 6 x 20	4	10
4	X3CDSP783	Self-locking washer M 6	4	10
5	X2BEHU006	Nut H M 6	4	10
6	Q4BPGS045	Rubber stop	8	10
7	K3VARC009	Vibrator	1	1
8	-	Silencer (supplied with vibrator)	-	-
9	1303309	Sieve vibrator bracket	1	1
10	X2BVHA285	Screw, H M 8 x 30	4	10
11	X3CDSP781	Self-locking washer	4	10
12	X2BEHU008	Nut H M 8	4	10
13	F6RLCS393	Elbow union π" diam. 6/8 mm	1	1
14	U1GJBJ194	Yellow polyurethane hose, diam. 6/8 mm	1 m	m