Instructions for use
Evacuation system – compressed air injector
SL 20 / SL 20 Max
SL 30 / SL 30 Max
Table of Contents

Introduction
1. Description of Functions
2. Putting into Operation
3. Instructions for Cleaning and Care
   3.1 Disassembling
   3.2 Disinfection and Cleaning
      3.2.1 Manual Disinfection and Cleaning
      3.2.2 Mechanical Disinfection and Cleaning
   3.3 Sterilisation
4. Technical Data
5. Spare Parts
6. Customer Service / Warranty / Maintenance
7. Manufacturer’s Data
INTRODUCTION

These instructions for use are meant to support you to operate the outlet systems for compressed air. In addition, you will find a description of the various options available to combine the products with different systems. If any failures or questions should come up during service please do not hesitate to contact our customer service department for help.

1. DESCRIPTION OF FUNCTIONS and MODELS

The system has been designed to remove secretion, e.g. from the patient’s respiratory tract, or to be used as a drive unit for a 4-chamber drainage system.

The vacuum required for this purpose is generated by means of compressed air from an injector.

The compressed air available from the central supply system streams through an injector and then outside through a sound absorber (at the side of the case).

When the compressed air streams through the injector nozzle an undertow is generated which comes into effect at the end of the suction hose.

Depending on the preset pressure and the setting of the infinitely variable regulating valve, this suction is capable of generating a vacuum between 0 and -0.8 mbar.

The ON / OFF button at the side can be used to stop the evacuation without changing the preset vacuum value.

The compressed air injector is available in the following designs.
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

Injector for direct connection to the compressed air outlet

The injector comes equipped with a connector standardised for this particular gas.

![Image of direct connection injector]

Designs SL 20 / SL 20 Max / SL 30 / SL 30 Max
Illustration: SL 20 Max  660-0208

Injector for wall rail with NIST screw joints.

The injector is connected to the medical gas supply by means of a gas-type coded connecting hose.

![Image of wall rail injector]

Designs SL 20 / SL 20 Max / SL 30 / SL 30 Max
Illustration: SL 20  660-0216

Seite 4 von 16
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

Accessories **required**

Air – connecting hose for compressed air injector – rail

ISO 6600117 / Neutral 6600116

Accessories **recommended** for compressed air injector – direct and rail

Bacteria filter 0331020
with membrane set 0331030

Secretion-collecting jar compl. 0.3ltr
(safety jar) 660-0275

**Bacteria filter**
In order to avoid contamination, the bacteria filter has to be installed between the injector and the secretion-collecting jar.

**Secretion-collecting jar**
The secretion which has been sucked off is collected in the secretion-collecting jar which has been equipped with a float ball to prevent it from overflowing. Once the maximum filling height has been reached, this float ball will lock the connection to the compressed air injector.
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

Optional accessories for compressed air injector - direct and rail

Hose adapter
623-0139

Illustr. Suction set with finger tip and bacteria filter  606-2400
Also available:
Suction set with finger tip “without“ bacteria filter  606-2401

Silicone hose 6 x 2 (available by the metre)  034-2950
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

The following secretion-collecting jars may be connected:

![Secretion-collecting jar 1.0 l Direct 6600250](image)

![Secretion-collecting jar 1.0 l Rail 6600255](image)

![Secretion-collecting jar 1.0 l Carrying rack 6600265](image)

![Carrying rack for secretion-collecting jar 1.0 l 6600260](image)

![Illustr. Size 2.0 l 6231000](image)

Also available in
Size 1.0 l 6231050
Size 3.0 l 6231060

The scaling on all secretion-collecting jars is only meant as an approximate value without measuring function.

Alternatively, disposable collecting jars may be used.

Seite 7 von 16
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

MAX Switch
(=maximum suction power)
Only for the models
SL 20 Max and
SL 30 Max

Optional connections for
• hose adapter
• secretion-collecting jar
• bacteria filter

Air outlet
Vacuum gauge
Lateral view
ON / OFF Switch
(fast-reaction valve)
Regulating unit
2. PUTTING INTO OPERATION

Compressed air injector SL 20 and SL 30

Please make sure that all the components connected, i.e. connecting hose, bacteria filter, safety jar, secretion-collecting jar etc., have been properly and firmly adapted.

Plug the compressed air injector or release probe into the gas outlet.
Please make sure that the regulating unit is completely closed (by turning clockwise until reaching the stop) and that the ON / OFF switch is in the OFF position.

Place the ON / OFF switch into the ON position.
The vacuum gauge may only display a low vacuum.

The regulating unit may be used to set the vacuum.

The ON / OFF button at the side may be used to stop the evacuation without changing the preset vacuum value.
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

Compressed air injector SL 20 Max and SL 30 Max

Please make sure that all the components connected, i.e. connecting hose, bacteria filter, safety jar, secretion-collecting jar etc., have been properly and firmly adapted.

Plug the compressed air injector or release probe into the gas outlet.

Please make sure that the regulating unit is completely closed (by turning clockwise until reaching the stop) and that the ON / OFF switch is in the OFF position,

the MAX switch is in the regulating position (see illustr.)

and the ON / OFF switch is in the OFF position.

Place the ON / OFF switch into the ON position.
The vacuum gauge may only display a low vacuum.
The regulating unit may be used to set the vacuum.

The ON / OFF button at the side may be used to stop the evacuation without changing the pre-set vacuum value.

When placing the MAX switch into the MAX position (see illustr.)
the user will immediately get the maximum suction power.

Please note that the suction performance CANNOT be regulated with the MAX position.
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

recommended

Drainage system
3. INSTRUCTIONS FOR CLEANING AND CARE

3.1 Disassembling

For disinfection, cleaning or sterilisation purposes, screw off the bottle and empty it.

Attention:
Do not sterilise the vacuum gauge and the sound absorber.

3.2 Disinfection and cleaning

3.2.1 Manual disinfection and cleaning

All those parts which get in contact with the patients’ breathing air have to be disinfected in any case.
- Put the corresponding application elements into the disinfecting bath; the exposure time will depend on the type of disinfecting agent which is used (see the package insert of the disinfectant).
- Take the elements out of the disinfecting bath and rinse them with running sterile water.
- Dry the cleaned elements. Please make sure that there is no humidity left in the apparatus.
- For those parts which do not get into contact with the patients’ breathing air wiping disinfection will be sufficient

3.2.2 Mechanical disinfection and cleaning

Please make sure that you only use non-aggressive detergents, for example „neo disher MA“, „neo disher FA“ or similar products.

3.3. Sterilisation

Bottles / jars may be autoclaved at 134° C.
Disposable application elements must not be autoclaved (see order data).
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

4. Technical Data

<table>
<thead>
<tr>
<th></th>
<th>Compressed air injector Direct</th>
<th>Compressed air injector Rail</th>
</tr>
</thead>
<tbody>
<tr>
<td>Model</td>
<td>SL 20</td>
<td>SL 20 Max</td>
</tr>
<tr>
<td></td>
<td>SL 30</td>
<td>SL 30 Max</td>
</tr>
<tr>
<td>Article No.</td>
<td>6600206</td>
<td>6600208</td>
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<td></td>
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<td>6600209</td>
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<tr>
<td></td>
<td>6600218</td>
<td>6600217</td>
</tr>
<tr>
<td>Control range</td>
<td>0 to –800 mbar</td>
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<tr>
<td>Suction power</td>
<td>20 L/min +/- 10 %</td>
<td>30 L/min +/- 10 %</td>
</tr>
<tr>
<td></td>
<td>20 L/min +/- 10 %</td>
<td>30 L/min +/- 10 %</td>
</tr>
<tr>
<td>Material</td>
<td>Anodized aluminium / stainless steel</td>
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</tr>
<tr>
<td>Connection</td>
<td>Connector acc. to DIN 13260-2</td>
<td>NIST screw joints</td>
</tr>
<tr>
<td></td>
<td>1)</td>
<td></td>
</tr>
<tr>
<td>Fastening</td>
<td>------------------------------</td>
<td>for device-holding rail</td>
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<tr>
<td></td>
<td>2)</td>
<td>25 x 10 mm</td>
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<tr>
<td>Exit</td>
<td>Female thread 9/16“ 18G UNF</td>
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<tr>
<td>H x W x D mm</td>
<td>140 x 105 x 120</td>
<td>140 x 105 x 150</td>
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<tr>
<td>Weight</td>
<td>650 g</td>
<td>900 g</td>
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<tr>
<td>Accessories Article No.</td>
<td>See pages 5 to 7</td>
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<tr>
<td>Accessories Article No.</td>
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<td>DIN1) - NIST</td>
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<td>ISO 660-0117 / Neutral 660-0116</td>
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1) Various other connections, e.g. BS, AFNOR or AGA available
2) Also available for other rail dimensions
Instructions for use Evacuation system – compressed air injector
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

5 Spare Parts

<table>
<thead>
<tr>
<th>Article No.</th>
<th>Designation</th>
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<tr>
<td>6600212</td>
<td>Sealing set</td>
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<td>SL 20 / SL 30 / SL 20 Max / SL 30 Max</td>
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<td>6600226</td>
<td>Nozzle set SL ,20 / SL 20 Max</td>
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<td>6600227</td>
<td>Nozzle set SL 30 / SL 30 Max</td>
</tr>
<tr>
<td>1570125</td>
<td>Filter insert</td>
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<tr>
<td></td>
<td>SL 20 / SL 30 / SL 20 Max / SL 30 Max</td>
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<tr>
<td>0282865</td>
<td>Vacuum gauge compl. with slide adapter</td>
</tr>
</tbody>
</table>
6. CUSTOMER SERVICE / WARRANTY / MAINTENANCE

The period of warranty for the equipment is 12 months starting from the date of sale in accordance with the following conditions:

- During the period of warranty, we will eliminate, free of charge, any damage or failures of the equipment caused by verifiable faults in production or in the material, provided that these failures have been reported without delay after detection. Deviating from this, the warranty for engines of any type, compressors, electric switching devices, semiconductor elements, electric displays and measuring equipment is six months. This warranty is not applicable to fragile parts made of glass, for example, or consumable and wearing parts, e.g. filters.

- In the case of a guarantee, the decision of whether to repair or exchange the equipment will be at our own option. Cases of guarantee will neither extend the period of warranty nor will they represent the start of a new period of warranty. Spare parts which are installed will not be subject to an individual period of warranty.

- Any damage caused by improper use, faulty operation, mechanical damage or non-observance of the instructions for use as well as any damage caused by force majeure or any other unusual environmental conditions will not be covered by the warranty.

- The warranty claim will expire when interventions, changes or repairs of the equipment have been carried out by people who have not been authorised by us to do so or when the equipment has been used with additional accessories or spare parts of strange origin.

- The faulty equipment has to be sent – in its original packaging - to the address mentioned below with carriage and postage paid. Further claims as well as any so-called consequential damage will be excluded as long as liability is not required by law.

Equipment may be subject to technical changes without notice!

Maintenance

- The flawless condition and proper functioning of all the silicone seals in the equipment have to be checked once a year and to be replaced if necessary.

- Also once a year, the system has to be checked for damage and improper functioning.
Instructions for use Evacuation system – compressed air injector  
SL 20 ; SL 20 Max ; SL 30 Max; SL 30

7 Manufacturer’s Data

Manufacturer: Heyer Aerotech GmbH  
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