Device must be installed immediately downstream of an AS/NZS 2845.1 backflow prevention valve! Please contact your plumber!

**Caution!**
Do not install or expose the product to direct sunlight or UV!

**Bewamat 25A, 75A**

Simplex Water Softener

**Suitability:**
Suitable for domestic and commercial installations to soften incoming water and improve the service life of plumbing fixtures and fittings.

**Product Approval:**
The product is certified to ATS 5200.103
Thank you very much for the confidence that you have shown in us by purchasing a BWT appliance.
Table of Contents

1 Safety Instructions
  1.1 General safety instructions
  1.2 Scope of the documentation
  1.3 Personnel qualifications
  1.4 Transport and installation
  1.5 Symbols used
  1.6 How safety instructions are displayed
  1.7 Product-specific safety instructions
  1.8 Important notes

2 Scope of Delivery

3 Use
  3.1 Intended Use

4 Function

5 Installation Requirements
  5.1 General information
  5.2 Qualified Staff
  5.3 Site of installation and surrounding area
  5.4 Feed-in water
  5.5 Installation

6 Installation
  6.1 Installation diagram

7 Start-up
  7.1 Operation of the Controller
  7.2 Preparing the brine

8 Operation
  8.1 Setting the hardness of blended water
  8.2 Handing over the unit to the operator
  8.3 Setting the supply of softened water
  8.4 Setting the time/day of the week
  8.5 Changing the time of regeneration
  8.6 Starting regeneration manually
  8.7 Adding regenerative
  8.8 Service message

9 Operator Responsibilities
  9.1 Inspection
  9.2 Maintenance

10 Warranty

11 Troubleshooting

12 Technical Specifications
  12.1 Dimensions

13 Machine and Maintenance Log
1 Safety Instructions

1.1 General safety instructions

The product has been manufactured according to the generally recognised rules and standards of technology and complies with the legal regulations in force when it was brought into circulation. Nevertheless, there is still a risk of damage to persons or property if you do not follow this chapter and the safety instructions in this documentation.

- Read this documentation thoroughly and in full before working with the product.
- Retain the documentation in such a way that it is accessible to all users at all times.
- Always hand over the product to third parties together with the full documentation.
- Follow all of the instructions in relation to the proper handling of the product.
- If you detect damage to the product or the mains supply, stop its operation and notify a service technician immediately.
- Use only accessories, spare parts, and consumable materials that have been approved by BWT.
- Maintain the environmental and operating conditions specified in the “Technical data” chapter.
- Use your personal protective equipment. It ensures your safety and protects you from injury.
- Only perform tasks that are described in these operating instructions or if you have been trained to do so by BWT.
- Perform all tasks in compliance with all of the applicable standards and provisions.
- Instruct the operator in the function and operation of the product.
- Instruct the operator in the maintenance of the product.
- Instruct the operator in relation to potential dangers that may arise while operating the product.

1.2 Scope of the documentation

This documentation applies exclusively to the product whose production number is listed on the title page and in chapter 12 “Technical data”.

This documentation is intended for operators, end users, fitters without training from BWT, fitters with training from BWT (e.g. drinking water specialists), and BWT service technicians.

This documentation contains important information for fitting the product safely and properly, starting up, operating, using, maintaining, and disassembling the product, and for correcting simple faults internally.

Read this documentation in full before working with the product. Pay particular attention to the safety instructions chapter.

1.3 Personnel qualifications

The installation work described in these instructions requires basic knowledge of mechanics, hydraulics, and electrics, as well as knowledge of the corresponding specialist terms.

To ensure that the device is installed safely, this work must be performed only by a qualified specialist or a trained person under the guidance of a qualified specialist.

A qualified specialist is anyone who can assess the work assigned to him or her, identify potential risks, and take suitable safety measures thanks to his or her specialist training, knowledge, and experience as well as his or her knowledge of the applicable regulations. A qualified specialist must comply with the applicable specialist regulations.

1.4 Transport and installation

Whenever possible, transport the plant as a complete unit. If the plant has to be dismantled for transport, check the completeness of the individual parts.

When there is a risk of frost, empty all water supply parts.

Always lift and transport the plant or plant parts only at the provided transport eyes and/or attachment points.

The plant must be installed or mounted on a sufficiently stable and level vertical or horizontal base and sufficiently protected against falling or overturning.
1.5 Symbols used

<table>
<thead>
<tr>
<th>Signal word / colour</th>
<th>Indicates the severity of the hazard</th>
</tr>
</thead>
<tbody>
<tr>
<td>Warning symbol</td>
<td>Calls attention to the hazard</td>
</tr>
<tr>
<td>Source / type of hazard</td>
<td>Indicates the type and the source of the hazard</td>
</tr>
<tr>
<td>Consequences</td>
<td>Explains the consequences of not following the safety instructions</td>
</tr>
<tr>
<td>Hazard prevention measure</td>
<td>Explains how to avoid the hazard</td>
</tr>
</tbody>
</table>

1.6 How safety instructions are displayed

In this document safety instructions precede any sequence of actions that could cause harm to persons or damage to property. All hazard prevention measures must be followed. Safety instructions are displayed as follows:

- **DANGER!**
  - High-risk hazard.
  - Indicates a hazardous situation which, if not avoided, will result in death or serious injury.

- **WARNING**
  - Hazard with a moderate degree of risk.
  - Indicates a hazardous situation which, if not avoided, could result in death or serious injury.

- **CAUTION**
  - Low-risk hazard.
  - Indicates a hazardous situation which, if not avoided, may result in minor or moderate injury.

1.7 Product-specific safety instructions

- **DANGER!**
  - High voltage!
  - Risk of death by electrical shock!
  - Unplug device before any service and repair works.
  - If the supply cable of the appliance is damaged, it must be replaced by an original BWT cable.
1.8 Important notes

NOTE

The unit must be installed as described in the installation guide in compliance with the general requirements for the supply of water in Germany ["AVB Wasser"] V, section 12.2 by a water supply company or by a party registered in the water supply company's index of fitters.

In keeping with TrinkwV § 16 and § 21 (German drinking water ordinance), notify residents of the installation of the water softener, explain how it works and which regenerative is used.

Using treated drinking water with plants and aquatic animals

Each species of plant and aquatic animal requires water that contains a special combination of substances. Users of the unit should therefore consult the standard literature and check that they can use retreated drinking water for watering plants or for filling ornamental lakes, aquariums or fish ponds.

The control unit in your product contains a long-lasting battery.

Do not dispose of single-use or rechargeable batteries in household waste.

You must bring batteries to a designated collection point or send them to BWT (free of charge). Used batteries contain valuable raw materials that can be recycled.

Microbiological and sensory quality of the (partially) softened water

The quality of the treated water depends greatly on the conditions under which the unit is installed and operated. The most important factors are listed in the following table.

<table>
<thead>
<tr>
<th>Unfavourable conditions</th>
<th>BWT recommendations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Inflow water quality</td>
<td>Contact your installer</td>
</tr>
<tr>
<td>Borderline inflow water quality, which can become even worse</td>
<td>Shorter maintenance intervals</td>
</tr>
<tr>
<td>within the unit</td>
<td></td>
</tr>
<tr>
<td>Operating conditions</td>
<td>Observe the notes in the operating instructions</td>
</tr>
<tr>
<td>Long stagnation times and infrequent regeneration</td>
<td></td>
</tr>
<tr>
<td>Salt quality</td>
<td>Use regenerative in accordance with DIN EN 973 type A</td>
</tr>
<tr>
<td>Cheap regenerative salts with high proportions of insoluble</td>
<td></td>
</tr>
<tr>
<td>components</td>
<td></td>
</tr>
<tr>
<td>Installation situation and conditions</td>
<td></td>
</tr>
<tr>
<td>High ambient temperatures, e.g. near a heating unit</td>
<td></td>
</tr>
<tr>
<td>Drainage system for regeneration water incorrectly designed</td>
<td></td>
</tr>
</tbody>
</table>

For all issues about sensory and microbiological quality of the treated water, there is a difference depending on the location, from which these are being evaluated. In terms of an evaluation at an extraction point, the pipe material, water heater or hot water storage tank, among other things, could have a decisive impact on the water quality.
2 Scope of Delivery

Bewamat A water-softening unit, with:

<table>
<thead>
<tr>
<th>1</th>
<th>Manifold control valve with microprocessor controller</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>Brine valve</td>
</tr>
<tr>
<td>3</td>
<td>Softening column with ion exchanger</td>
</tr>
<tr>
<td>4</td>
<td>Cover</td>
</tr>
<tr>
<td>5</td>
<td>Storage area for regenerative</td>
</tr>
<tr>
<td>6</td>
<td>Brine cavity</td>
</tr>
<tr>
<td>7</td>
<td>Softened water output</td>
</tr>
<tr>
<td>8</td>
<td>Hard water inlet</td>
</tr>
<tr>
<td>9</td>
<td>Flushing water connection</td>
</tr>
<tr>
<td>10</td>
<td>Overflow</td>
</tr>
</tbody>
</table>

- Power supply unit with cable and mains plug
- 2 m flushing water hose
- 2 m overflow hose 18 x 24
- Fixing material

The product complies with the requirements of ATS 5200.103; Technical Specification for plumbing and drainage products Part 103: Water treatment systems (other than those specified in AS/NZS3497).

Watermark Licence: IAPMO-WM-022072

3 Use

3.1 Intended Use

Bewamat A is a system designed for softening or partially softening drinking and service water.

Bewamat A minimises malfunctions and damage due to calcification in water pipelines and the connected fittings, equipment, boilers etc.
4 Function

The unit operates according to the principle of intelligent regeneration.

Intelligent quantity-dependent regeneration:
When the unit is started, the available supply of softened water is programmed (depending on the hardness of the drinking water).
At a user-defined time (e.g. at night), the unit checks whether the remaining supply of softened water is sufficient for the following day.
If not, the softening column is regenerated in order to refill the supply of softened water up to 100%.
In the event of a power failure, the data and the time are kept (about 1 year).
The unit is equipped with a device that disinfects the ion exchange resin during the regeneration. Spring-loaded non-return valves protect all water connections on the inlet side of the unit.

Automatic activation of regeneration:
If the capacity is not used up within four days, the electronic system triggers a regeneration.
The system complies with all relevant national and international standards.

Bewamat 75 A only:
Two capacity levels can be set on the controller, making the unit suitable for larger applications.
The unit is preset. In case less performance is necessary, this can be set by after-sales service.

5 Installation Requirements
5.1 General information
The unit must be installed as per AS/NZS 3500.1 (Australian national plumbing code).
Observe all applicable installation regulations, general guidelines, hygiene requirements and technical specifications.

5.2 Qualified Staff
Only authorized, instructed and specially trained personnel (professional plumber) are allowed to install, start up and maintain the filter system.
- Authorized Personnel
  Are to have the instructions about the assigned tasks and possible risks in case of misuse.
- Professionals
  Professionals who are able to install, start up and maintain the filter system, because of their training, experience and knowledge of applicable guidelines and codes.

5.3 Site of installation and surrounding area
Water softeners must not be installed in water supply systems that provide water for fire extinguishing purposes.
Make sure that the site of installation is frost-proof, guarantees protection of the unit against chemicals, dyes, solvents and vapours and enables easy connection to the water supply.

Device must be installed immediately downstream of an AS/NZS 2845.1 backflow prevention valve! Please contact your plumber!
Caution! Do not install or expose the product to direct sunlight or UV!

A wastewater connection, a floor drain and a separate network connection (230 V/50 Hz) must be close by. The power supply must be permanently guaranteed.
If the treated water is exclusively for use in technical applications, the ambient temperature must not exceed 40 °C.
Separate protection against water deficiencies does not exist and must be fitted locally – if required.
5.4 Feed-in water

This system is not intended to be used for treating water that is microbiologically unsafe or of unknown quality without adequate disinfection before or after the system.

The total dissolved iron and manganese may not exceed 0.1 mg/l. The hard water to be fed into the unit must always be free of air bubbles. If necessary, an de-airation device must be installed.

The necessary operating pressure must always be guaranteed.

A minimum operating pressure is required for the unit to function (see technical data).

The maximum operating pressure of the unit must not be exceeded (see technical data). If the network pressure is higher, then a pressure reducer must be installed upstream of the unit.

In the case of pressure deviations and pressure surges, the total of the pressure surge and standing pressure must not exceed 200 kPa and the negative pressure surge must not fall beneath 50 % of the adjusted flow pressure.

Continuous operation of the softening unit with water containing chlorine or chlorine dioxide is possible if the concentration of free chlorine / chlorine dioxide does not exceed 0.5 mg/l.

However, continuous operation with water containing chlorine/chlorine dioxide causes the ion exchanger resin to age prematurely. A softening unit reduces the concentration of free chlorine and chlorine dioxide. In other words, the concentration in the outflow of a softening unit is generally considerably lower than in the inflow.

5.5 Installation

The pipe network must be flushed before the unit is installed.

Use corrosion-resistant pipe materials for installation. Observe corrosion-causing chemical properties in the combination of different pipes (mixed installation), even in the direction of the flow upstream of the softening unit.

The hose attached to the overflow of the brine container and flushing water hose must be routed at an incline to the sewage system or connected to a pump.

The flushing water hose and the overflow hose must be secured at the specified distance from the highest possible waste water level to the sewage connection (distance greater than the diameter of the waste pipe).

If flushing water is fed into a pump, it must be designed for a water quantity of at least 2 m³/h or 35 l/min.

If the pump is used for other units simultaneously, it must be sized larger by a factor of their water output quantities.

The pump must be salt-water resistant.

To assist in connecting to the pipework, the following fitting can be used:

This is a 32 mm FI x 20 mm FI BSP reducing union set.

<table>
<thead>
<tr>
<th>Reece Product Code</th>
<th>1906945</th>
</tr>
</thead>
</table>

This fitting will not only assist in adapting to smaller tube size pipework, from the 32 mm MI Bewamat valve, but also assist where installation space is a hindrance.

20 mm MI elbow / reducing elbow fittings, will also screw straight into this union set. Contact your local Reece branch for further information.
6  Installation

Place and align the softening column with control valve behind the cabinet.

Run the the brine hose from the inside though the bore to the outside and insert it as far as it will go (a depth of about 15 mm) in the connection angle.

Put the grey cover onto the left side of the control valve.
Firmly attach the flushing water hose into the flushing-water connection (9).

Route the flushing water hose at an incline to the sewage system connection (drain) and secure the end with the supplied fixing material to prevent it moving around when under pressure.

Put the overflow hose (18 x 24) on the overflow (10). Secure it with cable ties and route it with an incline of at least 10 cm to the sewage system connection (drain).

Connect the unit as shown in the installation diagram. The flushing water and overflow hoses may not be connected or restricted.

The flushing water and overflow hoses must be connected to the sewage water system at least 20 mm above the highest waste water level (unimpeded drainage).
7 Start-up

7.1 Operation of the Controller

Keypad

Function of keys

<table>
<thead>
<tr>
<th>Keypad</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>OK</td>
<td>Confirms entries</td>
</tr>
<tr>
<td>&lt;</td>
<td>Moves cursor, changes entries</td>
</tr>
<tr>
<td>&gt;</td>
<td>Moves cursor</td>
</tr>
<tr>
<td>Menu</td>
<td>Change mode between operation and programming</td>
</tr>
</tbody>
</table>

Operating display

Display shows either day and time or remaining capacity in litres.

Dots are flashing while in programming mode.

1 = Monday
2 = Tuesday
3 = Wednesday
...

2 14 : 49
4448 L
7.2 Preparing the brine

- Check that the unit has been properly installed.
- Remove cover (4).
- Pour regenerative into the storage area (5).

**Recommended salt:** Cube or pellet salt is recommended. This type of salt is high purity evaporated crystals, formed and pressed into briquets. It has less than 1 % insoluble (not dissolvable in water) impurities.

- Fill up the brine cavity (6) with about 4 litres (Bewamat 25 A) or 15 litres (Bewamat 75 A) with drinking water.

**Note:** Observe the following if consumption of a large quantity of softened water is expected after start-up: The unit requires about three hours for the brine to form.

- Insert mains plug. Water supply must remain closed. The display shows **StArt** and then alternates between the remaining supply of softened water and the day of the week (1-7) / time.
- Allow basic fixing to finish (about 40 sec.). The running noise stops.
- For automatic regeneration, press the OK button to interrupt.
- Open the water supply.
- Initiating a start-up flush
- Press and hold Change Mode button until **Ibn** appears in the display. Flushing occurs for 1 minute (flush time t1). The valve then moves into operating position.
- The unit is ready for operation.

The capacity and the blending valve are preset. A readjustment is only necessary for especially hard water (hardness greater than 22 °d) or for water of medium hardness (less than 14 °d).
8 Operation

8.1 Setting the hardness of blended water

The unit is preset to 4 °d.

To test the water hardness, allow the nearest cold water tap to run for a while (about 500-600 l/h) and check the hardness of the blended water using the AQUATEST hardness tester. Adjust with the blending valve V until the desired value (BWT recommendation 4 - 8 °d) is reached.

Note: The sodium content increases. Check local limits or regulation apply. This limit should be set low, so that people on a low sodium diet can still drink water from the unit and use it for cooking.

Sodium content of partially softened water

The sodium content increases by 8.2 mg/l if the hardness of drinking water is decreased by 1 °d.  

Hardness of drinking water – hardness of blended water x 8.2 mg/l = increase in the sodium content.

8.2 Handing over the unit to the operator

If there is a delay between the installation/start-up of the unit and transfer to the operator, a manual regeneration must be performed.

The operator must be told how the unit works as well as how to operate and inspect it. Ensure that the operator receives the installation and operating manual.
8.3 Setting the supply of softened water

The unit is preset to an:
Inlet water hardness of 20 °d
Blended water hardness of 4 °d

The supply of softened water is set if
– the capacity of the unit is changed
– another inlet water hardness is present
– another blended water hardness is desired

Calculating the supply of softened water:

\[
\text{Supply of softened water} = \frac{K \times 1000}{E - V}
\]

in litres

\[
K \text{ for Bewamat 25 A} = 25 \text{ m}^3 \times °d
\]
\[
K \text{ for Bewamat 75 A} = 75 \text{ m}^3 \times °d
\]

\[
E = \text{Inlet water hardness in °d}
\]
\[
V = \text{desired and set blended water hardness in °d}
\]

Press Change Mode button
Display indicates SET

Display flashes

Set the calculated soft-water supply

The new supply of softened water is not displayed until after the next regeneration.

Press Change Mode button to end programming
8.4 Setting the time/day of the week

Press Change Mode button
Display indicates SET

The flashing numbers can be changed.

Changes the number
Moves the cursor

Current day of the week and time

Press Change Mode button to end programming.
8.5 Changing the time of regeneration

Press Change Mode button
Display indicates SEt

e.g.

\[
\begin{array}{c}
5 \quad 07:43
\end{array}
\]

Press OK button

Press Cursor button

Setting the regeneration time

The flashing numbers can be changed.

Changes the number

Moves the cursor

New regeneration time

Press Change Mode button to end programming.

8.6 Starting regeneration manually

Press and hold OK button for about 4 sec. until regeneration begins

The display shows alternating remaining regeneration period in minutes (with flashing symbol) and rEG On.
8.7 Adding regenerative

Refill the regenerative no later than when the sieve base becomes visible or when SALt is indicated on the display.

**Recommended salt:** Cube or pellet salt is recommended. This type of salt is high purity evaporated crystals, formed and pressed into briquets. It has less than 1% insoluble (not dissolvable in water) impurities.

- Open the cover (4). Pour regenerative into the storage area (5).
- Press OK button. The SALt display disappears.

Refill the unit in such a way that no dirt can get into the storage area (5) (if necessary, clean the packages containing the regenerative before use).

In case of any soiling clean the storage area or brine cavity (6) with drinking water thoroughly.

8.8 Service message

A flashing litre display indicates that it is time for servicing. The service message appears after 150 regenerations.

Please contact after-sales service.
9 Operator Responsibilities

You have purchased a product that is durable and easy to service. However, all technical equipment requires regular servicing in order to guarantee optimal functionality.

German drinking water ordinance requires you to log the amount of regenerative consumption. However, this does not apply to BWT’s AQA perla series water softeners, which record the measured values. Keep yourself up to date with regard to the quality and pressure ratio of the water which is to be treated. If the water quality changes, the settings may need to be changed. Consult a specialist in this case.

To ensure proper functioning and to meet the warranty requirements, regular inspections must be carried out by the operator (every 2 months), and routine maintenance (EN 806-5) must be performed by the BWT after-sales service staff or an installer authorised by BWT to carry out maintenance (every 6 months).

Wearing parts must also be replaced within the prescribed maintenance intervals in order to ensure functionality and fulfil the warranty conditions.

9.1 Inspection

The operator must regularly perform the following inspections.

**Regenerative**

According to use

Check and refill

**Test water hardness**

Once a month

The hardness of the local drinking water and the set hardness of the outlet water must be checked and corrected if necessary (see Start-up section).

**Visual inspection**

Every 2 months

Check connection lines and connections for leaks.

Check for dirt in the regenerative container and clean and flush with clear water if necessary.

**Cleaning**

At least once a year

Sanitize the regenerative container

**Disinfection**

In unfavourable conditions, e.g. if the unit is located in a warm room and has not been used for a long time, it may require disinfection by our after-sales service staff in addition to regeneration.

Additional disinfection is not required if regenerations are performed regularly (by the quantity controller or time override controller).

The intervals between checks are recommended minimums and must be reduced accordingly for sensitive consumer systems.

9.2 Maintenance

The BWT after-sales service staff or an installer authorised by BWT must carry out the following maintenance work regularly.

We recommend that you enter into a maintenance agreement with your installer or the after-sales service team.

**Functional tests**

<table>
<thead>
<tr>
<th>Process</th>
<th>Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td>Brine extraction system</td>
<td>Twice a year</td>
</tr>
<tr>
<td>Water meter</td>
<td>Twice a year</td>
</tr>
<tr>
<td>Drive motor(s)</td>
<td>Twice a year</td>
</tr>
<tr>
<td>Hydraulics test</td>
<td>Twice a year</td>
</tr>
<tr>
<td>Sanitization of the regenerative container</td>
<td>Twice a year</td>
</tr>
</tbody>
</table>

**Replacement**

<table>
<thead>
<tr>
<th>Wearing part</th>
<th>Replacement period</th>
</tr>
</thead>
<tbody>
<tr>
<td>Single valve with exchanger columns</td>
<td>Every ten years</td>
</tr>
</tbody>
</table>

10 Warranty

If the product malfunctions during the warranty period, please contact your contract partner, the installation company, and quote the unit type and production number (see Technical specifications or the type plate on the unit).

Non-compliance with the installation conditions and the operator responsibilities voids the warranty.

The wearing parts defined in the “Operator Responsibilities” section and the consequences of failing to replace these parts on time are not covered by the 2-year legal warranty.

BWT assumes no liability in the event that the unit fails or if the capacity becomes deficient due to incorrect material selection/combination, floating corrosion products or iron and manganese deposits, or any resulting damage thereof.

The use of regenerative that does not comply with DIN EN 973 type A voids the warranty.
11 Troubleshooting

<table>
<thead>
<tr>
<th>Fault</th>
<th>Cause</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>SALt</strong> is indicated on the display</td>
<td>Insufficient regenerative in the storage area (5).</td>
<td>Refill regenerative and press the OK button until the SALt display goes out. Press the OK button to acknowledge the fault. If the fault occurs again, contact after-sales service.</td>
</tr>
<tr>
<td></td>
<td>Insufficient pipeline pressure resulting in insufficient suction speed.</td>
<td></td>
</tr>
<tr>
<td>Unit not supplying softened or blended water.</td>
<td>No regenerative in the storage area (5).</td>
<td>Refill regenerative, then press the OK button until the SALt display goes out. Wait three hours for the brine to form and start manual regeneration.</td>
</tr>
<tr>
<td></td>
<td>Power supply interrupted.</td>
<td>Establish electrical connection.</td>
</tr>
<tr>
<td></td>
<td>Blending adjusting spindle (V) not set correctly.</td>
<td>Set as described in the Start-up section “Setting the hardness of blended water”.</td>
</tr>
<tr>
<td>Unit not supplying softened water or the flow is insufficient.</td>
<td>Inlet pressure is too low.</td>
<td>Increase inlet pressure (set pressure reducer if necessary) and start manual regeneration.</td>
</tr>
<tr>
<td>Coloured flushing water at start-up</td>
<td>Abrasion particles of the exchanger resin.</td>
<td>Repeat start-up flush.</td>
</tr>
</tbody>
</table>

If the fault cannot be remedied by following these steps, please contact our after-sales service department and quote the series and production number (see type plate).
### 12 Technical Specifications

<table>
<thead>
<tr>
<th>Specification</th>
<th>Type</th>
<th>Bewamat 25 A</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nominal connection width</td>
<td>DN</td>
<td>32</td>
</tr>
<tr>
<td>Connection type</td>
<td>G1¼&quot;</td>
<td></td>
</tr>
<tr>
<td>Nominal capacity in accordance with DIN EN 14743</td>
<td>mol (m³ x°dH)</td>
<td>4,5 (25)</td>
</tr>
<tr>
<td>Capacity / kg of regenerative salt in accord. with DIN EN 14743</td>
<td>mol</td>
<td>3,8</td>
</tr>
<tr>
<td>Peak flow when blending from 20 to 8°dH</td>
<td>m³/h</td>
<td>2,3</td>
</tr>
<tr>
<td>Operating flow when blending from 20 to 0°dH</td>
<td>m³/h</td>
<td>1,4</td>
</tr>
<tr>
<td>Nominal flow in accordance with DIN EN 14743</td>
<td>m³/h</td>
<td>1,4</td>
</tr>
<tr>
<td>Nominal pressure PN</td>
<td>kPa</td>
<td>1000</td>
</tr>
<tr>
<td>Operating pressure, min./max.</td>
<td>kPa</td>
<td>250 - 1250</td>
</tr>
<tr>
<td>Pressure drop at operating flow</td>
<td>kPa</td>
<td>100</td>
</tr>
<tr>
<td>Application</td>
<td>residential units persons</td>
<td>-</td>
</tr>
<tr>
<td>Ion exchange material fill quantity</td>
<td>l</td>
<td>8</td>
</tr>
<tr>
<td>Supply of regenerative, max.</td>
<td>kg</td>
<td>18</td>
</tr>
<tr>
<td>Consumption of regenerative per regeneration, max.</td>
<td>kg</td>
<td>1,2</td>
</tr>
<tr>
<td>Flushing water consumpt per regeneration at 400 kPa, max.</td>
<td>l</td>
<td>55</td>
</tr>
<tr>
<td>Flushing water flow during regeneration, max.</td>
<td>l/h</td>
<td>170</td>
</tr>
<tr>
<td>Regeneration time, max.</td>
<td>min</td>
<td>35</td>
</tr>
<tr>
<td>Water temperature, min. – max.</td>
<td>°C</td>
<td>5 - 25</td>
</tr>
<tr>
<td>Ambient temperature, min. – max.</td>
<td>°C</td>
<td>5 - 40</td>
</tr>
<tr>
<td>Humidity</td>
<td>non condensing</td>
<td></td>
</tr>
<tr>
<td>Mains power</td>
<td>V/Hz</td>
<td>230/50</td>
</tr>
<tr>
<td>Unit voltage</td>
<td>VDC</td>
<td>18</td>
</tr>
<tr>
<td>Power during operation</td>
<td>W</td>
<td>4</td>
</tr>
<tr>
<td>Max. power during regeneration</td>
<td>W</td>
<td>38</td>
</tr>
<tr>
<td>Max. fault message output</td>
<td>VDC / A</td>
<td>-</td>
</tr>
<tr>
<td>Protection class</td>
<td>IP44</td>
<td></td>
</tr>
<tr>
<td>Operating weight if filled to max.</td>
<td>kg</td>
<td>40</td>
</tr>
<tr>
<td>Shipping weight, approx.</td>
<td>kg</td>
<td>30</td>
</tr>
<tr>
<td><strong>Production number</strong></td>
<td>PNR</td>
<td>6-501198</td>
</tr>
<tr>
<td><strong>Order number</strong></td>
<td></td>
<td>11378</td>
</tr>
</tbody>
</table>

1) Operating Pressure in accordance with ATS 5200.103-2004: 250 – 1250 kPa
   Operating Pressure Recommended by BWT: 250 – 800 kPa
## 13 Technical Specifications

<table>
<thead>
<tr>
<th>Water softener</th>
<th>Type</th>
<th>Bewamat 75 A</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nominal connection width</td>
<td>DN</td>
<td>32</td>
</tr>
<tr>
<td>Connection type</td>
<td>G1¼”</td>
<td></td>
</tr>
<tr>
<td>Nominal capacity in accordance with DIN EN 14743</td>
<td>mol (m³ x°dH)</td>
<td>13,4 (75)</td>
</tr>
<tr>
<td>Capacity / kg of regenerative salt in accord. with DIN EN 14743</td>
<td>mol</td>
<td>3,8</td>
</tr>
<tr>
<td>Peak flow when blending from 20 to 8°dH</td>
<td>m³/h</td>
<td>3</td>
</tr>
<tr>
<td>Operating flow when blending from 20 to 0°dH</td>
<td>m³/h</td>
<td>1,8</td>
</tr>
<tr>
<td>Nominal flow in accordance with DIN EN 14743</td>
<td>m³/h</td>
<td>1,8</td>
</tr>
<tr>
<td>Nominal pressure PN</td>
<td>kPa</td>
<td>1000</td>
</tr>
<tr>
<td>Operating pressure, min./max. 1)</td>
<td>kPa</td>
<td>250 - 1250</td>
</tr>
<tr>
<td>Pressure drop at operating flow</td>
<td>kPa</td>
<td>100</td>
</tr>
<tr>
<td>Application</td>
<td>residential units persons</td>
<td>-</td>
</tr>
<tr>
<td>Ion exchange material fill quantity</td>
<td>l</td>
<td>21</td>
</tr>
<tr>
<td>Supply of regenerative, max.</td>
<td>kg</td>
<td>50</td>
</tr>
<tr>
<td>Consumption of regenerative per regeneration, max.</td>
<td>kg</td>
<td>3,5</td>
</tr>
<tr>
<td>Flushing water consumpt per regeneration at 400 kPa, max.</td>
<td>l</td>
<td>128</td>
</tr>
<tr>
<td>Flushing water flow during regeneration, max.</td>
<td>l/h</td>
<td>500</td>
</tr>
<tr>
<td>Regeneration time, max.</td>
<td>min</td>
<td>40</td>
</tr>
<tr>
<td>Water temperature, min. – max.</td>
<td>°C</td>
<td>5 - 25</td>
</tr>
<tr>
<td>Ambient temperature, min. – max.</td>
<td>°C</td>
<td>5 - 40</td>
</tr>
<tr>
<td>Humidity</td>
<td>non condensing</td>
<td></td>
</tr>
<tr>
<td>Mains power</td>
<td>V/Hz</td>
<td>230/50</td>
</tr>
<tr>
<td>Unit voltage</td>
<td>VDC</td>
<td>18</td>
</tr>
<tr>
<td>Power during operation</td>
<td>W</td>
<td>4</td>
</tr>
<tr>
<td>Max. power during regeneration</td>
<td>W</td>
<td>38</td>
</tr>
<tr>
<td>Max. fault message output</td>
<td>VDC / A</td>
<td>-</td>
</tr>
<tr>
<td>Protection class</td>
<td>IP44</td>
<td></td>
</tr>
<tr>
<td>Operating weight if filled to max.</td>
<td>kg</td>
<td>100</td>
</tr>
<tr>
<td>Shipping weight, approx.</td>
<td>kg</td>
<td>50</td>
</tr>
<tr>
<td><strong>Production number</strong></td>
<td>PNR</td>
<td>6-501199</td>
</tr>
<tr>
<td><strong>Order number</strong></td>
<td></td>
<td>11379</td>
</tr>
</tbody>
</table>

1) Operating Pressure in accordance with ATS 5200.103-2004: 250 – 1250 kPa
   Operating Pressure Recommended by BWT: 250 – 800 kPa
## 13.1 Dimensions

<table>
<thead>
<tr>
<th>Model</th>
<th>Bewamat 25 A</th>
<th>Bewamat 75 A</th>
</tr>
</thead>
<tbody>
<tr>
<td>Height</td>
<td>A 640</td>
<td>1090</td>
</tr>
<tr>
<td>Width</td>
<td>B 390</td>
<td>390</td>
</tr>
<tr>
<td>Depth</td>
<td>C 460 / 560</td>
<td>460 / 560</td>
</tr>
<tr>
<td>Water inlet connection height</td>
<td>D 500</td>
<td>960</td>
</tr>
<tr>
<td>Water outlet connection height</td>
<td>E 500</td>
<td>960</td>
</tr>
<tr>
<td>Overflow connection height</td>
<td>F 280</td>
<td>650</td>
</tr>
<tr>
<td>Regenerative container height</td>
<td>J</td>
<td>-</td>
</tr>
<tr>
<td>Diameter or width of regenerative container</td>
<td>K</td>
<td>-</td>
</tr>
<tr>
<td>Filling height, min.</td>
<td>L</td>
<td>-</td>
</tr>
<tr>
<td>Distance from wall, min.</td>
<td>M</td>
<td>-</td>
</tr>
<tr>
<td>Min. sewage system connection</td>
<td>DN 50</td>
<td>50</td>
</tr>
<tr>
<td></td>
<td>Start-up</td>
<td>Maintenance</td>
</tr>
<tr>
<td>----------------</td>
<td>--------------------------------------------------------------------------</td>
<td>-------------------------------------------------------------------</td>
</tr>
<tr>
<td></td>
<td>Hardness of drinking water inlet ______ °d</td>
<td>Hardness of drinking water inlet ______ °d</td>
</tr>
<tr>
<td></td>
<td>Network pressure ______ kPa</td>
<td>Brine extraction time (min.)</td>
</tr>
<tr>
<td></td>
<td>Water meter reading ______ m³</td>
<td>Fault memory read out?</td>
</tr>
<tr>
<td></td>
<td>Date of initial start-up ______</td>
<td>Date/name</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Operator</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Regenerative refilled at: (date)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Water meter reading (m³)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Comments</td>
</tr>
</tbody>
</table>
Further information:

Reece. Works for you. ™

Call 1800 032 566 or visit www.reece.com.au for your nearest Reece store.

Due to limitations in the printing process the colours in this brochure are a guide only.

The manufacturer/distributor reserves the right to vary specificyctions or delete models from their range without prior notification. The manufacturer/distributor takes no responsibility for printing errors.

www.reece.com.au