

easyFlow

The safer liquid transfer solution

Operator manual easyFlow M



agrotop
spray technology

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Imprint

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Translation of the original German operator manual

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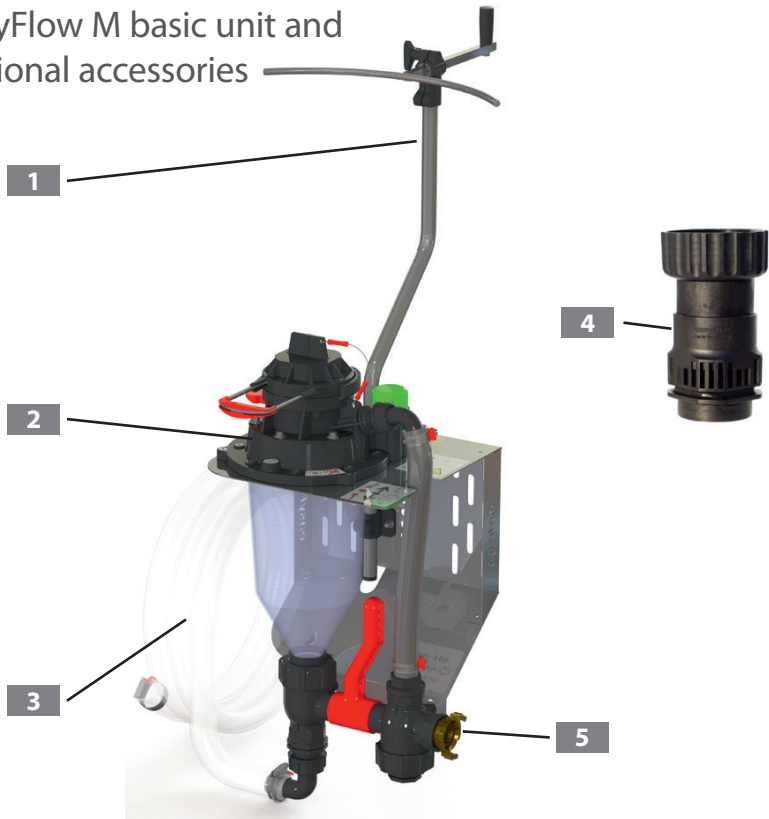
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1. Introduction

1.1 easyFlow M basic unit and optional accessories



1	Container support (optional, recommended for using container >10 l)
2	easyFlow M basic unit
3	3 m discharge hose to the sprayer (optional, recommended when installed as an external unit)
4	easyFlow container adapter (order separately – see page 46 – usually 3-5 are needed)
5	GEKA jaw clutch (optional, for rinsing water connection)
6	Operating and installation instructions

1.2 General safety instructions



READ OPERATING INSTRUCTIONS!

- To ensure proper operation of the system, please read these operating instructions carefully before operating the device. Keep the operating instructions for future reference.
- Non-compliance to the working instructions and operating instructions can endanger persons as well as the environment and the machine. Non-observance of the safety instructions can lead to the loss of any claims for damages.
- Agrotop GmbH assumes no liability for damage and malfunctions resulting from non-compliance with the operating instructions.
- We reserve the right to make technical changes that serve to improve the easyFlow M or that increase the safety standard – even without a separate announcement.

General symbols and notes



DANGER!

This symbol denotes an imminent danger. Failure to avoid it will result in death or serious injury.



WARNING!

This symbol indicates a potentially imminent danger. Failure to avoid it can result in death or serious injury.



ATTENTION!

This symbol indicates a potentially imminent danger. Failure to avoid it may result in minor injury.



NOTE!

This symbol indicates a potentially harmful situation. If it is not avoided, the device or something in its vicinity may be damaged.



WEAR PPE!

This symbol indicates a potentially imminent danger. Wearing prescribed PPE is essential for safe use!



**READ OPERATING
INSTRUCTIONS!**

Instructions in the operator manual must be observed!

- The following manual uses the abbreviation “PPP” for plant protection products.
- Operator must follow all instruction on the label of the PPP.
- For better illustration, work-related parts are colour marked in some of the drawings in this manual. Real parts may vary in colour, size and proportions.
- The installation options shown in this manual use simplified drawings that may differ from the real conditions found on the individual sprayers.

Intended Use

- The easyFlow M must only be used for dosing and transfer of registered liquid PPP, strictly following the instructions for use and installation in this manual. It is not permitted to transfer any inflammable or explosive liquids or other dangerous substances using this kit or any of the containing components. Any use of this device, not explicitly indicated by this manual, is considered unintended and strictly prohibited.

Reasonably foreseeable misuse

- Any use other than that specified under "Intended Use" or beyond this is considered improper use and is prohibited.
- Any other use requires consultation with the manufacturer.



WARNING!

For mobile installation, the unit may only be moved on the trolley completely emptied and without mounted PPP container!



NOTE!

Transferring powdery or otherwise solid substances may damage the easyFlow!

Safety conscious working

- When using the easyFlow with plant protection products (PPP) always wear standard personal protective equipment (PPE) that is recommended (according to the local national guidelines) during mixing and loading of PPP, such as protective gloves, long sleeved shirts and trousers, shoes and safety glasses. Special instructions on prescribed PPE can be found in the PPP manufacturer's instructions on the packaging.
- Before each use, the device must be checked for operational safety.
- The safety instructions listed in this operating manual, the existing regulations for accident prevention and internal operating, operating and internal safety regulations of the operator must be observed.
- For safe operation of the machine, the relevant accident prevention regulations, the corresponding state health and safety regulations or the relevant state health and safety and accident prevention regulations of other member states of the European Union or other contracting states of the European Economic Area must be strictly observed.
- The effectiveness of operating and control components must not be inadmissible influenced or removed.
- If mounted on a trolley, always check that the easyFlow M is placed on an even surface to prevent accidental falls.

Person qualification and training

- The easyFlow M system may only be used, maintained and repaired by persons who are familiar with it and have been instructed in the dangers involved.
- The area of responsibility, competence and supervision of the personnel must be precisely regulated by the operator. If the personnel does not have the necessary knowledge, it must be trained and instructed.
- A person to be trained may only work with the device under the supervision of an experienced person. Furthermore, the operator must ensure that the contents of the operating instructions are understood by the personnel.
- Repairs that are not described in this manual may only be carried out by authorized specialist workshops.
- First time users may need to establish a routine for quick and easy handling. If you do not feel confident with the dosing procedure or any other actions, we recommend doing one or two test runs with an empty PPP-container to get yourself familiar with the handling procedure.

Unauthorized conversion and spare parts production

- Any changes or modifications of this device or parts of it are subject to prior authorization from the manufacturer. Noncompliance to this will result in a loss of any warranty or liability obligations.
- Defect components and assemblies must be replaced immediately! Use original spare parts for replacement only. Noncompliance to this will result in a loss of any warranty or liability obligations.

Abuse and residual hazards

- The operational safety of the delivered system is only guaranteed under normal use. The limits given in the data sheets must under no circumstances be exceeded.
- Residual dangers are special hazards that can not be eliminated despite the safety-compliant design. These residual hazards are not obvious and may be the source of possible injury or health hazards (see European Standard EN 292/1 section 4).
- If unforeseen residual hazards occur, the operation must be stopped immediately and, if necessary, the responsible supervisor or the manufacturer must be informed. This will make the further decisions and does everything necessary to eliminate the danger that has occurred. If necessary, inform the machine manufacturer.

Behavior in case of accidents

- In the event of accidents involving personal injury, the necessary first-aid measures must be initiated immediately, if necessary, medical assistance must be requested and, if necessary, the nearest available supervisor notified.

Instructions for storage

- The easyFlow M must be stored in a frost-protected place.
- To winter the device, remove the hoses, drain the unit completely and put the measuring jug valve in pos. 3 (see page 20).

Service and maintenance

- The easyFlow must be inspected at least once a year.
- The canister sealing on the container adapter and the piston sealing on the easyFlow M basic unit are the most heavily loaded parts, and should be replaced as needed, but at least once a year.



- Both sealings can be easily replaced by pulling out of the seal seat and replaced with new ones.
- After every seal replacement, a complete test run with water must be carried out to prevent leaks.

- Further inspection points as part of the annual inspection:
 - Check the free movement and tightness of the container adapter.
To do this, screw the container adapter onto a water-filled PPP-container and squeeze and pull the container adapter apart. Pay attention to any leaks.
 - Check for general leaks and presence of all components shown in chapter 1.3.1
 - Visual inspection for obvious damage to the easyFlow, hoses and couplings
 - Checking the measuring cup for general damage, transparency and readability of the scale
 - Check the installation on easyFlow on sprayer or trolley (bolts, nuts, ...)
 - Checking for ease of operation of control elements (hand lever, measuring jug lever, venting valve)

Disposal

- When handling used devices, used parts or operating materials always wear the appropriate PPE that prevents or reduces skin contact.

- Disposal of the transport packaging

The packaging protects your device against damage during transport. The packaging materials are selected according to environmental and disposal aspects and therefore recyclable.

The return of the packaging into the material cycle saves raw materials and reduces waste. Note the local regulations of your waste disposal company or return the packaging to your supplier.

- Disposal of operating materials

Remains of PPP, rinsing liquids, solvents or cleaning agents must be collected in a safe and environmentally friendly manner in prescribed collection containers, stored and disposed in accordance with the local regulations.

- Disposal of used devices

Once the device has reached the end of its life cycle, safe and proper disposal, especially of environmentally harmful parts or substances, must be ensured.

- Note the local regulations of your waste disposal company and use the local collection center for the return and recycling of used devices or consult your supplier or our service representatives.

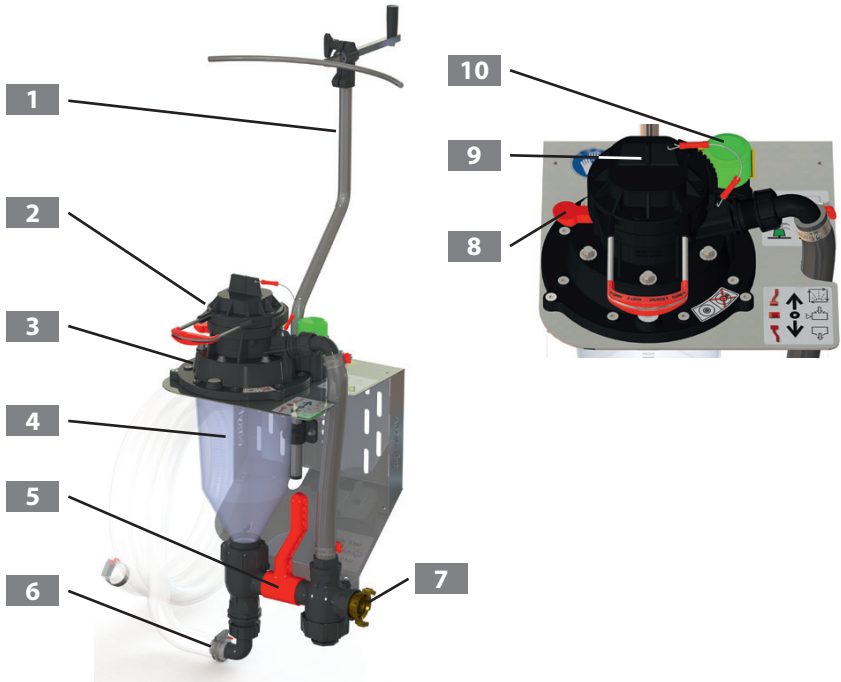
- Defective or dismantled used parts are to be collected separately according to material and supplied to the proper recycling.
- Please ensure that your used device is kept inaccessible to children until it is transported away.



■ Never dispose your used appliance in the residual waste.

1.3 System explanation

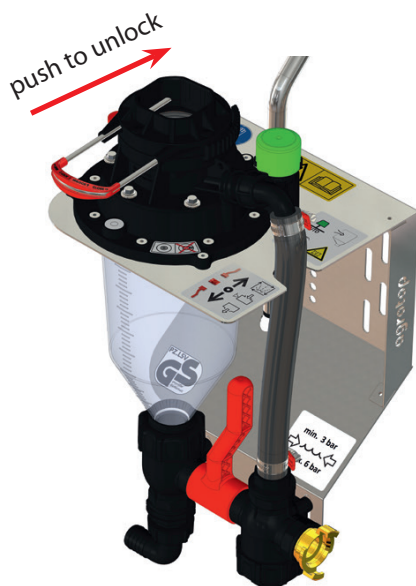
1.3.1 Components and parts of the easyFlow M system



1	Container support (recommended for PPP container larger than 10 l, see page 24)
2	Hand lever (see page 16 ff.)
3	Bullseye level (see page 25)
4	Measuring jug (see page 25)
5	Measuring jug lever (see page 20 ff.)
6	Discharge connection (installation options see page 31 ff.)
7	Rinsing connection (see page 27)
8	Rinsing lever (see page 22)
9	Blind cap
10	Venting valve (see page 23)

1.3.2 Functions of the components and controls

Hand lever



Connecting the PPP-container assembly with the easyFlow system:

- Pull the easyFlow container adapter apart and screw it firmly on the PPP container (see page 35).
- To connect the easyFlow container adapter the hand lever must be turned counterclockwise to the limit stop, then push lever forward. The blind cap can now be removed (if used).

- Engage easyFlow container adapter (firmly mounted on PPP container) into the easyFlow basic unit.
- By pulling the hand lever backwards to the limit the container adapter is locked and ready for dosing.



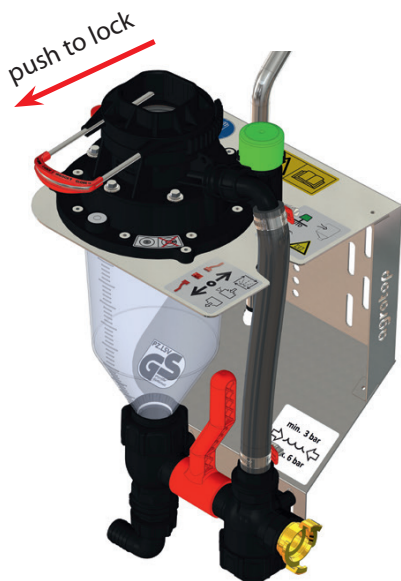
NOTE!

If the lever is hard to pull or inhibited, the container adapter has not latched properly. Slightly push down the PPP container to latch the systems, then pull the lever. The easyFlow is now locked in and dosing can start.



WARNING!

Immediately stop working if any leakage is noticed during operating with the easyFlow system to prevent further contamination!



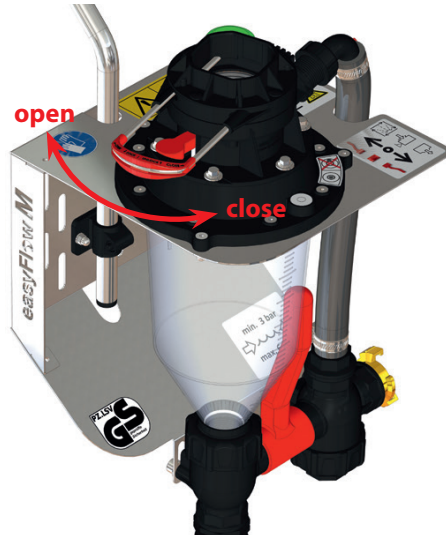
Disconnecting the PPP-container assembly:



ATTENTION!

Before disconnecting the easyFlow container adapter (PPP container is still mounted), make sure the faces are properly rinsed and, if the PPP container is empty that the container rinsing has been carried out efficiently with no remaining PPP residues. For container rinsing see page 35 ff. (partial dosing) or page 38 ff. (empty container).

- Hand lever must be turned counterclockwise until stop before unlocking.
- Push the lever to unlock the easyFlow container adapter.
- After removing the container adapter assembly, insert the blind cap and lock it in by pulling the hand lever.

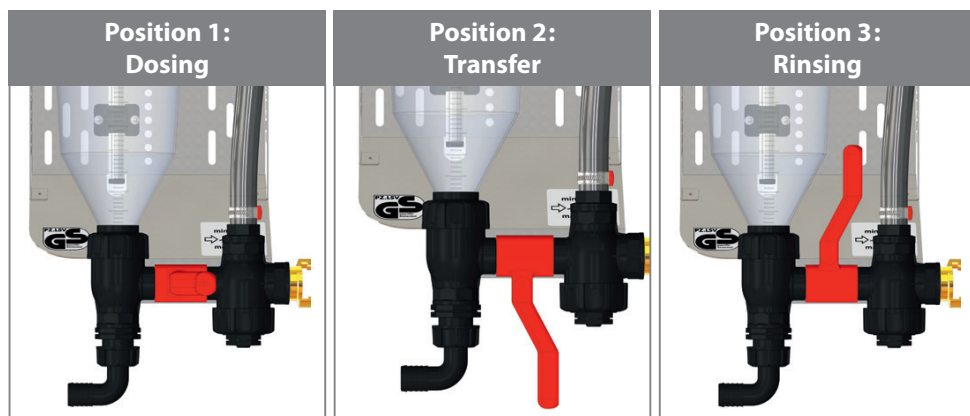


Dosing:

- Turn the hand lever clockwise to open the container adapter for dosing of PPP. The transfer rate increases accordingly with increasing opening angle (maximum 90°).
- For complete container dosing, make sure the measuring jug lever is in position 2 (down). Turn hand lever clockwise until stop. Start rinsing procedure when container is empty (see page 38 ff.).
- For partial dosing, turn the measuring jug lever in position 1 (centre). Gradual turning the hand lever clockwise to meter PPP into the measuring jug. Turning the lever open/close controls the flow rate. Stop dosing when required volume is reached by turning hand lever counterclockwise until stop. Now turn the measuring jug lever into position 2 (down) to transfer PPP to sprayer. Rinse contaminated faces of the easyFlow adapter (see rinsing procedure page 35 ff.) before unlock the system.

Measuring jug lever

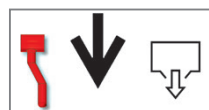
The measuring jug lever offers three positions. It simultaneously operates the shut-off valve of the measuring jug and the rinsing water valve.



To dose PPP into the measuring jug, turn the red lever in the horizontal position 1 (dosing). Both valves are closed in this position.



Setting the lever in position 2 (down) opens the valve of the measuring jug to transfer the PPP to the sprayer, the rinsing valve is closed. Transfer could be made by gravity or by using a pump, e.g. connecting it to the plumbing system of the sprayer pump.





WARNING!

While transferring liquid out of the easyFlow M system via pump or venturi, don't exceed a flow rate of 100 l/min!

Excessive suction power may close the venting valve (green cap). This could damage the easyFlow M system and cause user contamination.

Position 3 (up) starts the rinsing procedure of the device, for both, the partial dosing or full container transfer. The rinsing water is drained into the plumbing circuit of the sprayer.



DANGER!

Check the discharge hose of the easyFlow M and all connected parts (valves, induction hoppers, etc.) of the discharge/suction line on the sprayer for unobstructed runoff before using the rinsing function. The connected plumbing must allow a free flow at all times. All components must have a min. diameter of 1" (hoses, valves, pumps and couplings). Turn on the sprayer pump and open the valves to the easyFlow M before starting PPP transfer. Restrictions in the discharge or suction pipe can cause damage to the easyFlow M and could cause operator contamination. Do not exceed 6 bar pressure at the clean water rinsing connection.



NOTE!

To prevent contamination if the measuring jug is overfilled, the rinse may only be carried out with an installed container adapter mounted on a empty PPP container or blind cap attached!

To start the rinsing procedures for an empty PPP container, turn the hand lever on the easyFlow M basic unit clockwise until stop. Rotate the container clockwise during the rinsing to get to all parts of it.



NOTE!

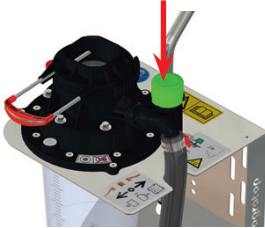
Cleaning must not be carried out on partially emptied PPP container. This can lead to the deterioration of the PSM and damage to the PSM container.

Rinsing Lever



Pushing down the rinsing lever separates the interfaces of container adapter and the easyFlow M basic unit in order to ensure rinsing. This procedure is required before disconnecting the container adapter after a partial dosing, but also at the end of the rinsing of an empty container. To operate set the measuring jug valve in pos. 3, then push the rinsing lever at least 3 times for 3 seconds each. The hand lever must be closed (turn counterclockwise to stop), but still locked (don't push the lever).

Venting valve



The valve is needed for pressure compensation, when operating the easyFlow M as a closed system. The valve closes automatically in case of overflow from the measuring jug during dosing or rinsing, avoiding leaking. It reopens automatically when the liquid level falls.

The integrated button is spring loaded and stays open during normal operation. Pressing the valve button shuts down the valve. This will build up a vacuum, if the easyFlow M is connected to an active suction line.



ATTENTION!

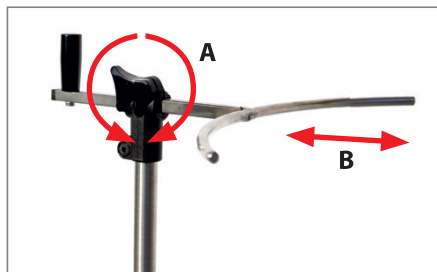
This function may only be used in connection with the hose adapter for discharge from large containers!



NOTE!

This is only needed initially; afterwards the valve must stay open to prevent damage from the PPP container and the easyFlow system!

Container support



PPP-containers with volumes larger than 10 l need additional support for secure handling on top of the easyFlow M.

Turn the star knob (A) counterclockwise to adjust the sliding guide (B) to the shape of the container, putting it in a vertical position upon the easyFlow M basic unit.

Fix the knob (A), by turning it clockwise, in the position where the PPP-container is perpendicular, but still with enough free space to rotate.



ATTENTION!

It is not allowed to turn the filled-up PPP-container beyond the retaining area of the container support. A tilt over can cause damage to the easyFlow system!



NOTE!

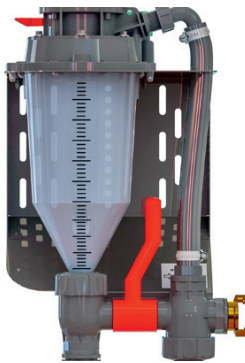
When moving the easyFlow mounted on a trolley, the slider must be fully retracted to the stop (in direction of the easyFlow)!

Bullseye level



Use the bullseye to check the proper positioning of the device. The levelling ensures a correct reading of the measuring jug.

Measuring jug



The graduated scale allows an exact reading even for small volumes. Up to 400 ml the scale has steps of 20 ml, over 400 ml there are steps of 50 ml. The measuring jug has a max. capacity of 2250 ml, measuring starts at 60 ml.

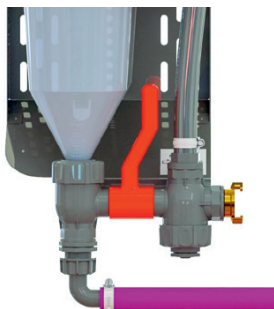


NOTE!

The measuring jug is interchangeable as needed. Rinse the system completely before replacing the jug and test it for leaks with clean water before reusing the easyFlow M for dosing of PPP!

1.3.3 External connections

Discharge hose



The discharge hose is connected to the valve of the measuring jug. It links the easyFlow to the sprayer.



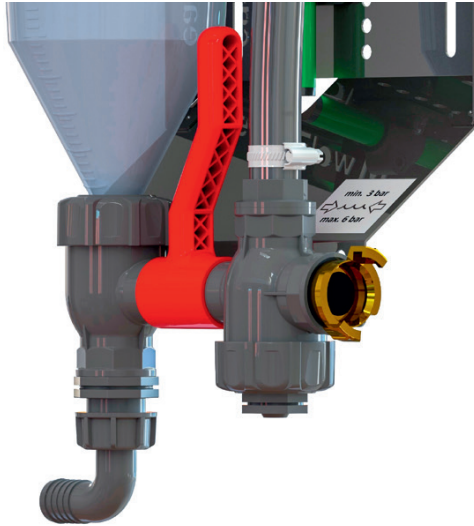
NOTE!

If the easyFlow M is used as a stand-by solution the discharge hose should be connected with a dry coupling for a contamination free connection to the sprayer, to reduce the risk of contamination!

The easyFlow M discharge hose must be connected to the suction side of the pump either by a T-fitting onto the suction line or onto the connection to the induction hopper. If connected to the suction line with a straight link to the induction hopper, ensure that the port to the hopper can be closed (may require an additional valve). This will guarantee full suction power from the pump.

More information connecting the discharge hose can be found from page 31 ff.

Rinsing connection



The rinsing water connection has a G 1" BSP female thread. In case of using an external rinsing water hose we recommend for fast and easy connection a G1" GEKA-jaw-clutch (to order see page 46) or any other suitable quick coupling. Make sure the coupling is properly sealed up to the adapter to prevent leakage.



NOTE!

Use clean water for final rinsing only!

2. Installation and startup

2.1 General installation instructions

The easyFlow M can be installed directly on a sprayer or at a stationary or mobile filling station or nurse truck.

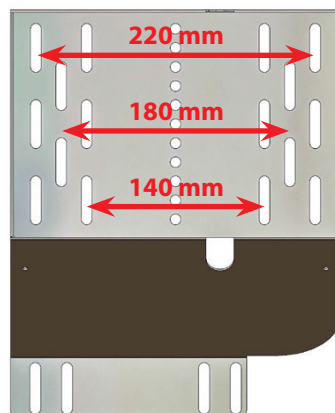
In either case we recommend connecting the easyFlow M onto the suction side of the sprayer pump, before the suction filter. When installing the easyFlow M on the sprayer a fixed connection can be set on the suction pipe. A connection to the suction line from the induction hopper is also possible, if there is enough suction power (min: $-0,3$ bar, max: $-0,8$ bar @ max. 100 l/min). In either case we recommend the use of a valve directly on to the connection to the suction line, maintaining it closed when not using the easyFlow M.

Using the easyFlow M on an external filling station requires the use of dry break. Options for anti-spill quick coupling can be found in our agrotop product catalogue.

Please notice the dimensions (see page 30) of the easyFlow M to find a suitable place for an installation. Consider also some extra operational space needed for handling and operation of the device and for connecting the PPP containers.

The easyFlow M is assembled on a stainless-steel frame. The perforated plate on the back has several fixing options, facilitating the mounting of it on a sprayer or external support. Use stainless screws M8 to fix the plate.

Different installation options for the easyFlow M can be found from page 31 ff.



2.2 Installation container support (optional)

Set up both pipe connector pads (A) onto the bolts (B).

Secure the pads using the cap nuts and the washers. Tighten the nuts with torque 6 Nm. (see fig. 1).

Insert the pole mounting tube from the container support through the pads until the desired position of the container support is reached. Check with PPP containers size intended to use (see fig. 2). Then fix the tube with the pads using an Allen key.

Turn the tube until the crossbar of the container support is positioned like shown in figure 4. To fix, tighten the bolt (C) (see fig. 3) with an Allen key using torque 2.5 Nm.

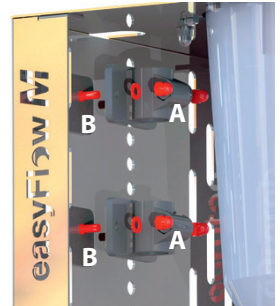


Fig. 1



Fig. 2

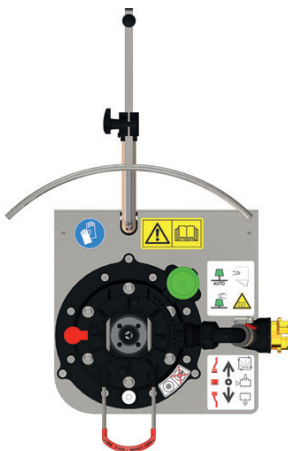


Fig. 4

Position container support (top view)

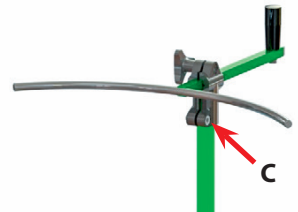
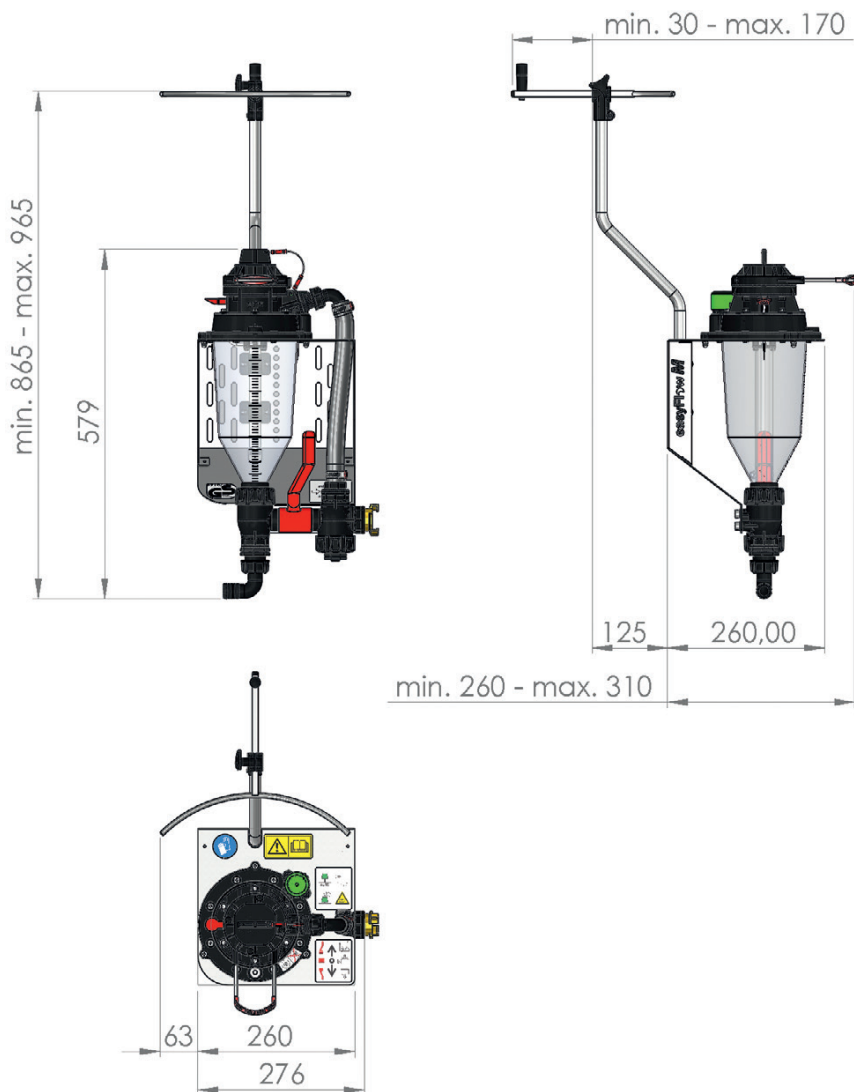


Fig. 3

2.3 Dimensions easyFlow M, incl. container support



2.4 Mounting the easyFlow M

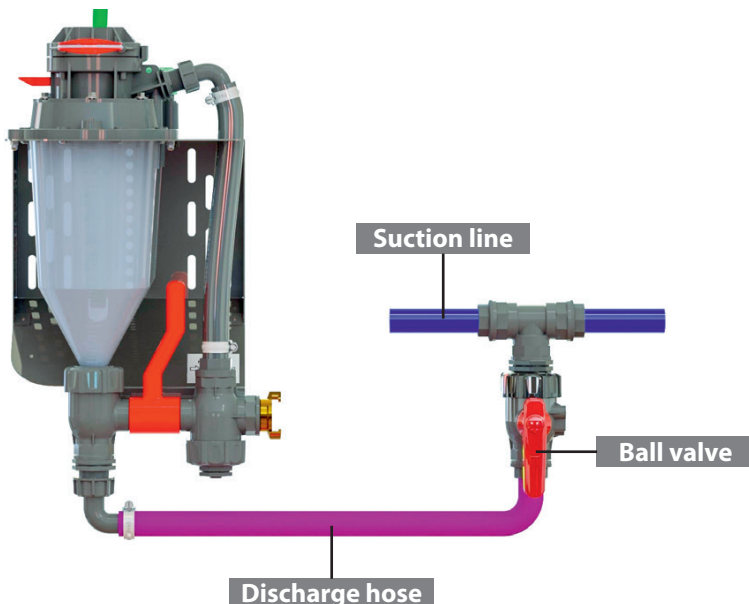
2.4.1 Mounting easyFlow M discharge hose

Installation on a sprayer

Connect the discharge hose to the suction side feeding the pump on the sprayer before the suction filter.

Install a valve on the T-fitting to close the connection to the easyFlow M. Keep the valve shut during normal sprayer operation to maintain max. suction performance of the sprayer pump. Open the valve for transfer and dosing of liquid PPP using the easyFlow M closed transfer system.

The Universal-Assembling Kit, part no. 16742, contains all required parts and fittings for this installation option (see page 47).



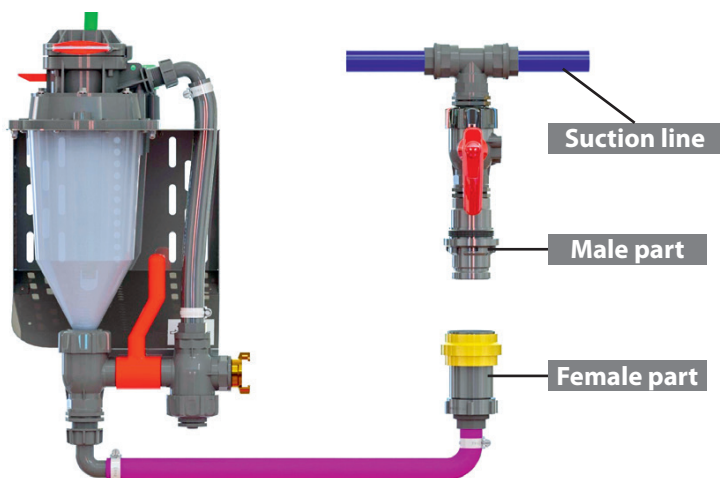
Installation as an external unit

This installation option is for external mobile units (e.g. nurse trucks) or fixed installed filling stations.

The connection to the sprayer is made by a dry break antispill coupling. Depending on the connection options on the sprayer different installation options are possible.

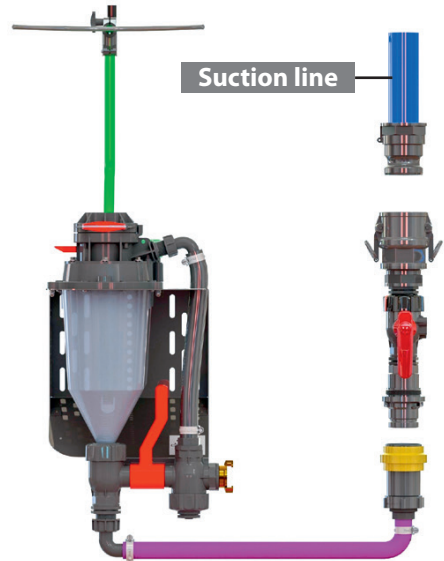
The following articles described in this installation guide are optional and not part of this easyFlow M package. Using the agrotop part numbers these items can be purchased through local dealers.

- a) There is no free port available on the suction side of the sprayer? In this case you can use the universal connection kit part no. 16742, installing it on the suction side of your sprayer. For connecting the discharge hose with the connection kit you need a anti-spill coupling, such as the anti-spill dry coupling consisting of the female part no. 16536 and the male part no. 15638. Install the male part on an easily accessible position on the sprayer. You can mount it directly on the valve of the connection kit (therefore a symmetrical nipple 1" part no. 10852 is required) or use a hose to connect the valve and the male part.



In all other cases:

- b) Connect to an existing 2"-cam-lock (male) using adapter kit part no. 14716. Connect the female coupling, part no. 16536, to the discharge hose from the easyFlow M using the straight hose barb fitting.



or:

- c) Connect straight to an anti-spill valve (part. no. 15638, male) already mounted on the sprayer or the induction hopper. Connect the female coupling, part no. 16536, to the discharge hose from the easyFlow M using the straight fitting. Most of the sprayer with connection options for VacuFill®/Eco-Fill transfer systems have this connection option.



In any case, it is recommended to set the connection on the sprayer before the main filter. Ask your sprayer manufacturer in case you have any questions regarding the correct installation.

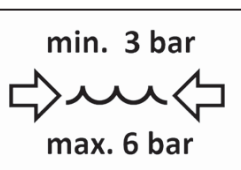


NOTE!

In case of transfer of liquids from the easyFlow M to the sprayer only by gravity (no pump or pump is not running), make sure the run-out point is below the level of the measuring jug of the easyFlow M, avoiding a backup of the liquid!

2.4.2 Rinsing water connection

For the rinsing water connection use a pressure of min. 3.0 bar to a max. 6.0 bar.



ATTENTION!

All legal requirements of the country in which the sprayer is operated must be fulfilled, when connecting the rinsing water connection to a tap from the public water network. An installation of a non-return valve is always recommended here; this is mandatory in many countries!

If the water source may contain particles use an adequate filter (min. 50 mesh) before the rinsing water connection to the easyFlow.



NOTE!

It is possible to use the recirculation water of the sprayer for initial container rinsing. However, make sure to use clear water for the final rinse in this case, to guarantee a completely clean container!

3. Operation

3.1 Partial discharge

1. Unscrew original cap from the PPP container.
2. Before mounting check if the cap seal of the easyFlow container adapter is in perfect condition and tighten the cap firmly on the container. Check if the easyFlow container adapter is stretched out completely before mounting it onto a PPP container, like shown in the picture (seal cutter must be draw-in).



Screw on easyFlow container adapter firmly on the PPP container. The current container adapter fits on PPP container with 63 mm threads. If the container is sealed do **not** remove or punch the seal. An automatic seal breaking is integrated in the container adapter.

3. If you don't use the easyFlow for a longer time, it's recommendable to flush the measuring jug before using it again. This enables a better cleaning result after transferring PPP. Turn the measuring jug lever into position 3, while the blind cap is still locked in. After a short flush turn the measuring jug lever into position 2 to get the cleaning water out of the easyFlow.

4. Turn the hand lever counterclockwise to limit stop and unlock the blind cap by pushing the hand lever. Remove the blind cap.
5. Set the measuring jug lever in pos. 1 (centre, for partial dosing only).
6. Mount the easyFlow container adapter on the easyFlow M basic unit. The container adapter must click in place. Normally the weight of a full container will do this, if not slightly press down the container until the adapters click in and secure by pulling the hand lever. If the hand lever is hard to move, the adapters are not clicked in. Make sure that they are aligned correctly and press down the container.

For larger PPP container the use of the container support (see page 24) might be recommended, for secure handling of the container.
7. Push down the container. If the container is sealed, the integrated seal cutter will open the seal by three quarters. The seal stays connected to the container and will be rinsed with the standard rinsing procedure after emptying the container completely.
8. Turn the hand lever clockwise to open the container adapter, dosing the PPP into the jug. Use gradual opening of the valve for exact dosing. When the required volume is reached close the container adapter by turning the hand lever counterclockwise to limit stop. Do **not** yet disengage the container adapter by pushing the hand lever forward.
9. Set measuring jug lever in pos. 2 (down) to transfer the PPP.
10. For rinsing put the measuring jug lever into pos. 3 (up).
11. Simultaneously press the rinsing lever at least 3 times for 3 seconds each, rinsing the face plates of the adapters.
12. Finish rinsing by setting the measuring jug valve into position 2 (down). Wait until the system is completely drained.

13. Close the measuring jug valve by putting the measuring jug lever into pos. 1 (centre).
14. Push the hand lever, remove the container with the easyFlow container adapter connected.
15. Stretch out the container adapter (like shown under point 2). **Don't** remove the container adapter from the container! Store the container while the container adapter is still attached to the container.
16. Install and secure the blind cap by pulling the hand lever.

3.2 Total discharge

1. Unscrew original cap from the PPP container.
2. Before mounting check if the cap seal of the easyFlow container adapter is in perfect condition and tighten the cap firmly on the container. Check if the easyFlow container adapter is stretched out completely before mounting it onto a PPP container, like shown in the picture (seal cutter must be draw-in).



Screw on easyFlow container adapter firmly. The current container adapter fits on PPP container with 63 mm threads. If the container is sealed do **not** remove or punch the seal. An automatic seal breaking is integrated in the container adapter.

3. If you don't use the easyFlow for a longer time, it's recommendable to flush the measuring jug before using it again. This enables a better cleaning result after transferring PPP. Turn the measuring jug lever into position 3, while the blind cap is still locked in. After a short flush turn the measuring jug lever into position 2 to get the cleaning water out of the easyFlow.
4. Turn the hand lever counterclockwise to limit stop and unlock the blind cap by pushing the hand lever. Remove the blind cap.

5. Set the measuring jug lever in pos. 2 (down).
6. Mount the easyFlow container adapter on the easyFlow M basic unit. The container adapter must click in place. Normally the weight of a full container will do this, if not slightly press down the container until the adapters click in and secure by pulling the hand lever. If the hand lever is hard to move, the adapters are not clicked in. Make sure that they are aligned correctly and press down the container.

For larger PPP container the use of the container support (see page 24) might be recommended, for secure handling of the container.
7. Push down the container. If the container is sealed, the integrated seal cutter will open the seal by three quarters. The seal stays connected to the container and will be rinsed with the standard rinsing procedure after emptying the container completely.
8. Turn the hand lever clockwise into stop for starting the discharge.
9. After PPP container is empty set the measuring jug lever in pos. 3 (up) to start the rinsing process.
10. Rotate the PPP container clockwise continuously until all residues are removed and container is completely rinsed out (depending on the PPP used, but at least 3 x for 10 seconds each turn).



ATTENTION!

By turning counterclockwise, the PPP container can come off the container adapter!

11. Turn the hand lever counterclockwise to limit stop.
12. Simultaneously press the rinsing lever at least 3 times for 3 seconds each, rinsing the face plates of the adapters.

13. Finish rinsing by putting the measuring jug lever in pos. 2 (down). Wait until the jug is completely drained.

If there is still liquid in the PPP container, turn the hand lever briefly clockwise to allow it to drain completely. Then turn the hand lever counterclockwise into the stop.

14. Set the measuring jug lever in pos.1 (centre).
15. Push the hand lever, remove the container with the easyFlow container adapter connected.
16. Stretch the easyFlow container adapter and screw it off from the empty and clean PPP container. Place the PPP container on an even surface and remove the container adapter upwards. Return the container to the official recycling system for empty PPP containers according to your country's legislation.

The easyFlow container adapter can be reused on the next PPP container.

17. Install and secure the blind cap.

3.3 Transfer from bulk containers

1. Connect the easyFlow CTS hose adapter to the easyFlow M basic unit and secure it by pushing the hand lever of the basic unit.
2. Connect the anti-spill coupling on the suction hose to the corresponding male coupling at the PPP bulk container.



NOTE!

Before use, please check which connection to the bulk container is available!



ATTENTION!

Use only bulk containers using a safety valve for pressure compensation! Otherwise excessive vacuum pressure may damage the easyFlow system and/or the bulk container!

3. Set the measuring jug lever into pos. 2 (down).
4. Turn the hand lever clock wise. Turning the lever will continuously increase the PSM transfer rate, till fully open at stop.
5. Press and hold the green cap of the venting valve to start transfer.



NOTE!

The integrated metering jug can not be used when using the hose adapter. If a exact dosing is required we recommend using a flow meter in front of the easyFlow hose adapter, e.g. Sotera 850 (Part No. 15636).

6. If the required volume is reached release the green cap to open the venting valve stopping the transfer. In case the valve doesn't open automatically, slightly pull the green cap to open the venting valve.
7. Rinse the system by removing the female anti-spill coupling from the bulk container and connect it to a rinsing connection or pedestal.



NOTE!

Ensure that the rinsing water connection has enough flow for a complete and efficient rinsing of the system.



ATTENTION!

When the rinsing water is connected to a domestic or public water supply, the regulations and limitations of the respective country, for filling of sprayers or atomizers, must be followed before use. The use of a check valve is generally recommended, and mandatory in many countries!

8. Press again the green button at the venting valve to start the rinsing process
9. When connecting hoses from the container adpter is completely rinsed, release the green cap. If the valve doesn't open automatically, slightly pull the green cap to open the venting valve.
10. Turn the hand lever counter clock wise to stop.
11. Turn the measuring jug lever in pos. 3 (up) to rins the easyFlow M basic unit.
12. Press several times the red rinsing button, for cleaning of the adapters interfaces.
13. Finish rinsing by putting the measuring jug lever in pos. 2 (down). Wait until the jug is completely drained.
14. Turn the measuring jug lever in pos. 1 (centre)
15. Push the hand lever and disconnect the hose adapter from the easyFlow M basic unit.
16. Install and secure the blind cap by pulling the hand lever.

4. Notes

[illegible]

[illegible]

5. Spare parts easyFlow M



easyFlow M

Part no.: 16532



**easyFlow
container adapter**

Part no.: 15954



**easyFlow
container support**

Part no.: 16740



**Anti spill dry coupling
female part**
incl. hose barb 25 mm

Part no.: 16536



**easyFlow
discharge hose 1"**

Part no.: 16873



**GEKA jaw clutch
with male thread 1"**

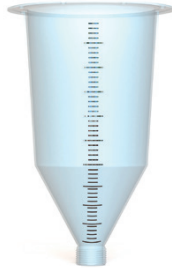
Part no.: 16650



easyFlow CTS hose adaptor

for transfer from
bulk containers

Part no.: 16899



Measuring jug easyFlow M

Part no.: 16571



Anti spill dry coupling male part with female thread 1" BSP

Part no.: 15638



Adapter for 2" Quick coupling

Part no.: 14716



Universal mounting kit T-piece for suction line

for installation onto suction line,
incl. gate valve 1" and hose barb
fittings 40/50/60 mm

Part no.: 16742



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