TABLE OF CONTENT

INTRODUCTION

Intended Use

The Ecostorm dosing system is designed for the automatic application of a bacterial solution into flowing water systems. The device ensures accurate and repeatable dosing of a defined quantity of medium at regular intervals set by the operator.

Design and Construction

The dosing system consists of mechanical and electronic components housed within a protective enclosure. All electrical and electronic parts are placed in sealed housings providing protection against water and moisture ingress in accordance with applicable requirements for electrical equipment.

Power Supply

The device is powered by four C-size batteries. The use of other battery types or incorrect installation may negatively affect device functionality or cause damage.

Dosing System

The dosing mechanism uses a DC motor with a gear train to drive the pump. The standard dose is 0.25 ml per operating cycle. The device is compatible with 450ml reservoir bottles. An automatic engagement mechanism ensures quick and safe bottle replacement.

Priming Function

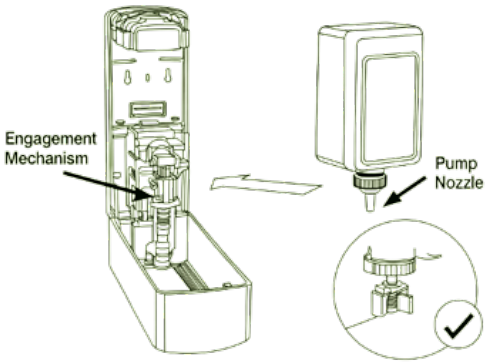
The device is equipped with a priming function for filling the discharge line. Pressing the priming button activates continuous pump operation for several minutes, allowing the line to fill and air to be expelled. Pressing the button again stops the priming process.

Service Interval Settings

A selector switch allows the operator to choose service intervals of 30, 45, or 60 days. The selected interval determines the frequency of dosing cycles.

Status Indication

The device includes an LED indicator that provides confirmation of the selected service interval and alerts the user to low battery voltage.



SAFETY INFORMATION

Please read the following safety instructions before using the device. Following these guidelines helps prevent equipment damage and ensures safe operation.

General Guidelines

- The device may only be operated by trained personnel.
- Do not modify or tamper with any mechanical or electronic components.
- Install the device in a dry, protected area, away from vibration and mechanical impacts.

Electrical Safety

- Use only C-size batteries.
- Insert the batteries with the correct polarity.
- Protect the battery compartment and electronics from water exposure.
- Do not operate the device if any electrical component appears damaged.

Chemical Handling

- Use only the recommended bacterial solutions.
- Wear protective gloves and safety glasses when handling chemical bottles.
- Ensure bottles are undamaged and properly sealed before installation.

Operational Safety

- Before activating the priming function, check that all hoses are correctly connected and secured.
- Keep hands, hair, and loose clothing away from moving parts during operation.
- If unusual noise, vibration, or leakage occurs, switch off the device immediately.
- After replacing the bottle, verify that the engagement mechanism is properly locked.

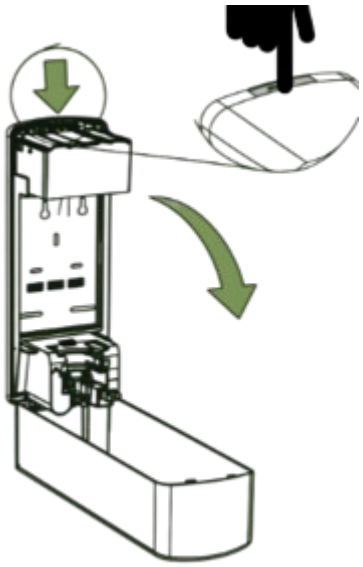
Installation and Environmental Safety

Do not install the device in locations where flooding or submersion could occur.
Operate the device only within the temperature range specified by the manufacturer.
Ensure there is enough space around the device for safe bottle replacement.

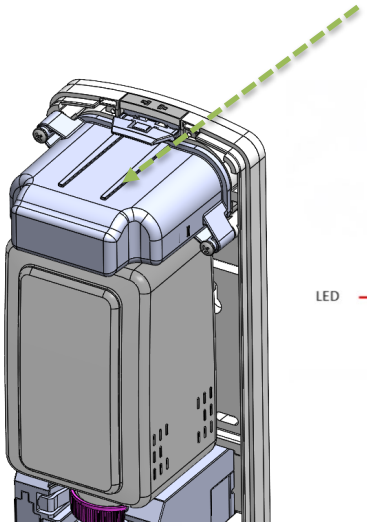
DESCRIPTION

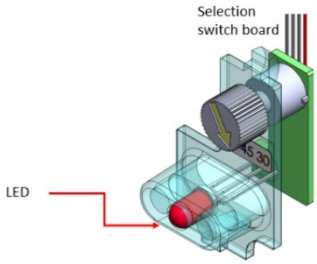
The device is designed for dosing the bacterial solution **FREEFLOW LIQUID CONCENTRATE SUPERCHARGED** into wastewater or drainage systems. The formulation contains selected, high-performance bacterial strains intended to support the degradation of organic matter, improve system hygiene, and reduce the accumulation of residues within the plumbing infrastructure. When used with the dosing system, the product is dispensed in controlled quantities to ensure consistent treatment efficiency and safe long-term operation of the system.

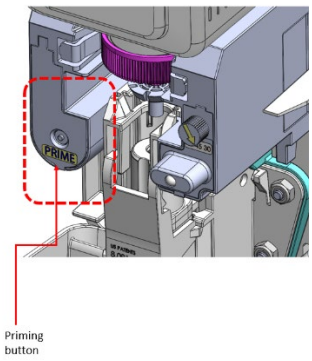
Battery Box
Battery box is located at the top of the backplate and accommodates 4 C size batteries.

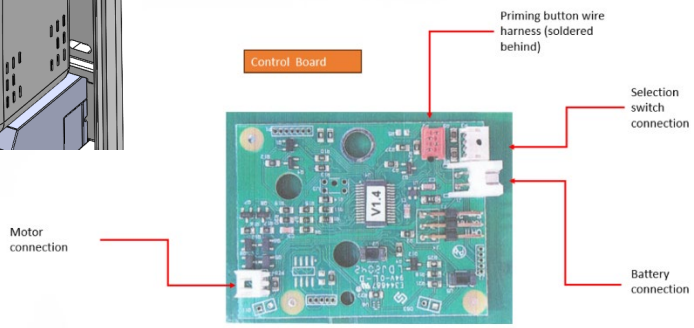


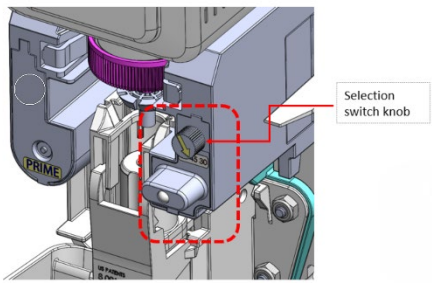
Dimensions
13" x 5" x 5" / (33 x 12,7 x 12,7)cm
Weight
2 lbs / 0.907 kg
Operating temperature
Max: 30°C, Min: 5°C











UK Declaration of Conformity

1. *Product:* *ECOSTORM*
   Type: *ECOSTORM*

2. *Manufacturer:*
   Flexfill s.r.o.
   Vězeňská 859/9, Staré Město, 110 00 Praha Company ID: 27249026

3. *UK Importer:*
   NCH UK Ltd.
   Bilston, Springvale Avenue
   WV14 OQL, West Midlands, UK

4. *Name and address of the person authorised to compile the relevant technical file:*

   Martyn Ruscoe
   NCH, Arrowmere House, Springvale Avenue, Bilston, WV14 0QL

5. *This declaration of conformity is issued under the sole responsibility of the manufacturer.*

6. *Object of the declaration.*
   Product: Bacterial solution dispenser
   Specification: Automatic plastic dispenser

7. *The object of the declaration described above is in conformity with the relevant legislations:*

   - Electromagnetic Compatibility Regulations 2016/1091
   - Restriction of the Use of Certain Hazardous Substances in Electrical and Electronic Equipment Regulations 2012 ('The RoHS Regulations'

8. *References to the relevant standards used, including the date of the standard, or references to the other technical specifications, including the date of the specification, in relation to which conformity is declared:*
   - **BS EN ISO 12100:2010** – Safety of machinery – General principles for design – Risk assessment and risk reduction
   - **BS EN IEC 63000:2018** – Technical documentation for the assessment of electrical and electronic products with respect to the restriction of hazardous substances
   - **BS EN 61000-6-3:2007 + A1:2011** – Electromagnetic compatibility (EMC) – Part 6-3: Generic standards – Emission standard for residential, commercial and light-industrial environments

   "Used for the ECOSTORM model – identical to the "KX soap dispenser" type, for which a REACH/RoHS assessment has been issued."

9. *Additional information:*
   The technical documentation for the machinery is available from the manufacturer above.

Signed for and on behalf of: Flexfill s.r.o.
Place of issue: Praha, Czech Republic
Date of issue: 07.01.2026
Name: Mr. James Charlesworth
Position: Managing Director
Signature:

EU DECLARATION OF CONFORMITY

ES & EU Declaration of Conformity

1. *Product product:* Ecostorm

   Type Ecostorm

2. *Manufacturer*

   Name Flexfill s.r.o.

   Address Vězeňská 859/9,

   Staré Město, 110 00 Praha

3. *This declaration is issued under the sole responsibility of the manufacturer.*
4. *Object of the declaration:*

   Product Bacterial solution dispenser

   Specification Automatic plastic dispenser

5. *The object of the declaration described above is in conformity with the relevant legislations:*

   - EMC Directive 2014/30/EU
   - RoHS Directive 2011/65/EU + (EU) 2015/863

6. *References to the relevant standards used, including the date of the standard, or references to the other technical specifications, including the date of the specification, in relation to which conformity is declared:*

   - EN IEC 63000:2018 – Technical documentation for the assessment of electrical and electronic products with respect to the restriction of hazardous substances (RoHS)
   - EN ISO 12100:2010 – Safety of machinery – General principles for design – Risk assessment and risk reduction
   - EN 61000-6-1 and EN 61000-6-3 – Electromagnetic compatibility (EMC)

   "Used for the ECOSTORM model – identical to the "KX soap dispenser" type, for which a REACH/RoHS assessment has been issued."

7. *Additional information:*
   The technical documentation for the machinery is available from the manufacturer above.

   Signed for and on behalf of: Flexfill s.r.o.

   Place of issue: Lovosice, Czech Republic

   Date of issue: 1st December 2025

   Name: Mr. James Charlesworth

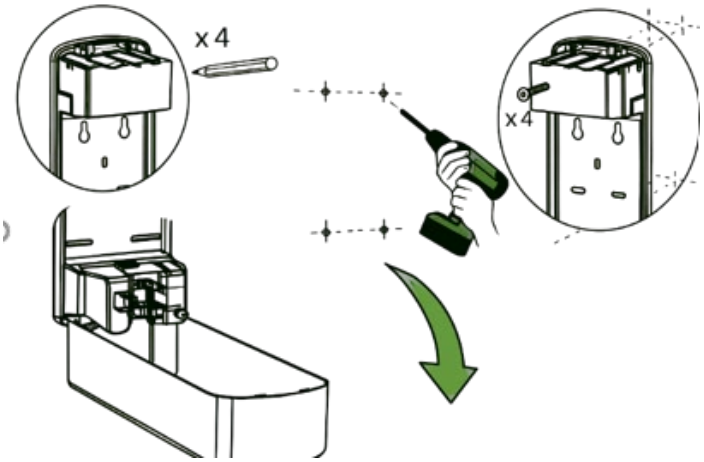
   Function: Managing Director

INSTALL

Check Velve

Check Velve

Installation kit includes:
- 10’ of tubing
- Elbow assembly
- Check valve
- Mounting screws and anchors for unit
- Mounting screws and P-clips for tubing

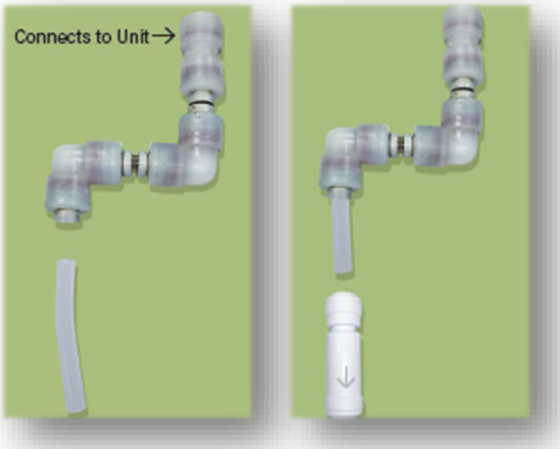


Opening the Unit

To open the unit, press the button located on the top of the device. Once the latch is released, the front cover will swing forward. The hinge is positioned at the bottom of the unit. Ensure at least **8 inches (20.5 cm)** of clearance below the unit to allow the cover to fully open.

Screw Mounting

Assess the installation location and determine the best position for mounting the unit.
Use a minimum of **two screws** to secure the unit to the wall. Wall anchors are included and may be used for additional support if required.



Installation of the Check Valve

The check valve must be installed onto the elbow assembly:

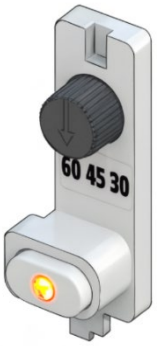
1. Cut approximately **2 inches (5 cm)** of tubing straight across.
2. Insert this tubing into the push-to-connect fitting on the elbow assembly (not into the straight connector).
3. Locate the arrow on the check valve body. The arrow must point **away from the elbow assembly**, indicating the direction of fluid flow toward the drain.
4. Insert the tube fully into the push-to-connect fitting on the side marked with the arrow.
5. Gently pull on the check valve to verify that the connection is secure.

Insert the remaining tubing into the push-to-connect fitting located at the point of the arrow on the check valve.

The straight end of the elbow assembly must be attached to the nozzle at the base of the unit. Firmly press the push-to-connect fitting onto the nozzle and pull gently to verify that the connection is secure. The purpose of the elbow assembly is to allow the tubing to rotate out of the way when the cover is open.

Cut the free end of the tubing at a **45° angle** to the required length. P-clips may be used to secure the tubing in place if needed.

SETUP



Setting the Service Interval
Turn the dial to the desired setting:

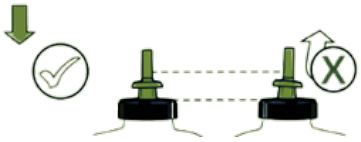
- **30** – the bottle will be dispensed over 30 days
- **45** – the bottle will be dispensed over 45 days
- **60** – the bottle will be dispensed over 60 days

Inserting the Bottle

Removing the Cap
Remove the bottle cap by pulling it straight upward. Do not tilt or angle the cap during removal, as this may damage the pump nozzle. The pump nozzle should not be extended.

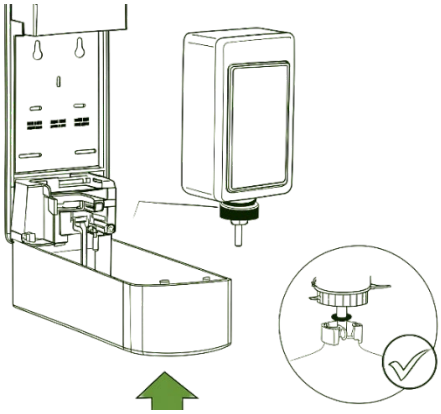
Inserting the Bottle

1. Disengage the engagement mechanism by pressing it downward until it locks into place.
2. Point the pump nozzle downward and insert the bottle by pushing the pink collar into the holder on the unit as shown.



Before Priming
Verify that all tubing connections are tight to prevent leaks.

Starting the Priming Process
Press the priming button located on the lower left side of the unit. A loud snap will indicate that the unit has engaged the pump umbrella. The device will continue actuating and filling the tubing until approximately **10 feet (3 m)** of tubing is primed, which takes about **2 minutes**.
If a shorter tube is used, priming can be stopped early by pressing and holding the button again until the actuation stops.



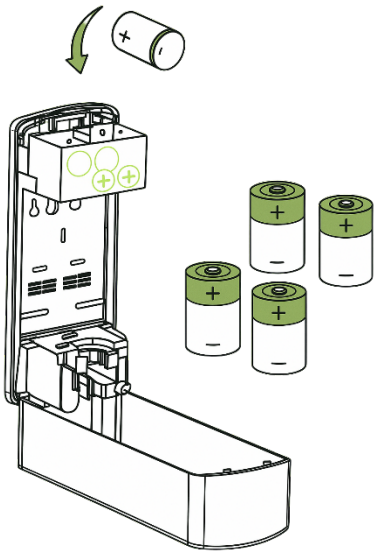
Notes:

- Observe all tubing connections during priming to check for leaks. Any leaking connection can be corrected by firmly pushing the fitting and tubing or nozzle together. Wipe away any excess fluid.
- After priming, verify that the pump umbrella is fully seated below the retaining lip on the unit. If the umbrella is not engaged on both sides, press it into place using your finger or a suitable tool (e.g., a screwdriver).

OPERATION

Batteries

To access the battery compartment, remove the thumbscrews at the top of the unit and slide off the cover. Install **four C-size batteries** into the battery tray. Reinstall the battery cover and secure it with the thumbscrews. For best performance, it is recommended to replace the batteries **every three months**.

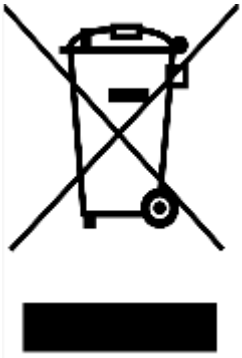


Indicator Lights

After the batteries are installed, the LED located at the bottom right of the unit will flash several times. During normal operation, the green LED will flash at regular intervals to indicate that the device is functioning correctly.When the batteries are low, the LED will begin to flash red, signaling that the batteries need to be replaced.

Cautions

It is the installer's responsibility to ensure that the installation complies with all applicable codes, standards, and regulatory requirements. Do not install the dispenser above heat sources or near open flames or ignition sources. Do not install the unit where a mounting failure could result in damage to surrounding equipment or create a potential safety hazard.



CLEANING AND MAINTENANCE

Clean the exterior surfaces of the dispenser using warm water and mild soap. **Do not use abrasive cleaners.** Dry with a soft cloth. If any residual fluid has collected inside the cover during operation, wipe it away using a damp cloth.

RECYCLING AND DISPOSAL

This product contains materials that must be disposed of in accordance with local environmental regulations. Do not dispose of the dispenser, batteries, or chemical containers with household waste.

- **Batteries:** Used C-size batteries must be collected and disposed of at designated battery recycling points.
- **Chemical Bottles:** Empty chemical bottles should be rinsed (if permitted by the product SDS) and disposed of according to local waste-handling requirements for chemical packaging.
- **Electronic Components:** At the end of its service life, the device must be sent to an authorized electronic waste recycling facility in compliance with WEEE regulations.
- Always follow local laws and municipal guidelines for waste separation and recycling.

ELECTRICAL WIRING DIAGRAMS