

## **GB** – Cold frame





#### You can find mounting instructions for

- A) Mounting for cold frame having plastic covering on side and lid (PAGE 3)
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#### C) Mounting for cold frame with wood (PAGE 4)

Univent® with the Easy clip\* can be used for

- Windows
- Sliding doors
- Half-doors and side windows
- Cold frame:

\* Easy clip: The sill bracket (7) and arm L (6) can be separated by pressing the arm gently. The Easy clip gives easy access to the greenhouse or cold frame while, at the same time, making automatic ventilation possible. (Fig. 1)

### **Technical data**

- Maximum window opening, approx. 45cm (1723/32 in) depending on adjustment and load
- Maximum opening at 30 °C (86°F)
- Start opening temperature 17 °C-25°C (62,60°F-77°F)
- Can lift up to 7 kg = a window weighing 15 kg (331b)

#### Warranty

The window opener comes with a 2-year warranty when it has been fitted and used correctly.

#### Components

- 1. Threaded cylinder (E)
- 2. Cylinder housing
- 3. Clutch
- 4. Arm K (4)
- 5. Window bracket
- 6. Arm L (6)
- 7. Sill bracket with "Easy clip"
- 8. Pullback spring
- 9. Hairpin split, see screw bag
- 10. Clamps x 2, see screw bag
- 11. Screws x 4, see screw bag
- 12. Mounting bracket for cold frame

#### **Special components**

13. Strap (Security) for winter protection



#### **Cold frames**

- 14. Turn the sill bracket (Part no. 7)  $90^{\circ}$  around like shown on Fig. 1
- 15. The opener should be fitted as close to the edge as possible and in the centre of the front and the lid.
- 16. It's important before mounting the opener, that the cylinder is put in the refrigerator to cold down in 30 min.
- 17. Check whether the cold frame cover can be opened and closed freely and without obstruction.

#### A: Mounting for cold frame having plastic covering on side and lid

1: Push the cylinder with hole A into hole B on the clutch (3) and connect hole A and hole B with a hairpin split pin (9). It is important that hole B is used.

Use the supplied bolts (11) and clamping devices (10) from the bag.

Ensure that the frame fitting is located in the centre of the window.

For fitting onto a plastic panel, you will have to drill the necessary holes in the plastic yourself. Use the supplied Clamps (10) to drill the necessary holes. Place the Clamps on the outside of the plastic panel to drill the necessary holes. **Fig. 3** 

2: Disconnect the sill bracket with "Easy clip" (7) from the arms of the opener (6) and fit the sill bracket (7) to the front panel as close to the edge as possible. **Fig. 2** 

4: Install the window bracket (5) to the cover as close to the edge as possible. Fig. 4

5: Clip the arms (6) onto the sill bracket as shown on **Fig. 6**.

Check that the cover can be closed. - Should this not be the case, then the position of the window fitting must be adjusted.

6: Open the cover so far that the cylinder thread (E) reaches into the cylinder housing (2). Now tighten the cylinder (1). The equal amount of thread must be visible on both sides of the housing (2) (**Fig. 5**).



#### B: Mounting for cold frame with glass covering on side and lid

1: Ways of fitting the opener onto a cold frame window and its sill:

# If it is not possible for the window bracket or the sill bracket to reach close enough to the edges of the Framework then use the enclosed extra mounting bracket for cold frame (12).

The mounting bracket/s for cold frame can be ordered free at info@orbesenteknik.com

1a: Fit one clamp loosely onto the window brackets (5) of the opener using the enclosed screws.

1b: Choose the most suitable holes on the sill bracket (7) of the opener and fit the second clamp onto this loosely. Make sure that the upper edge of the sill bracket is as close as possible to the edge and centre of the windowsill.

1c: Push the cylinder with hole A into hole B on the clutch (3) and connect hole A and hole B with a hairpin split pin (9). It is important that hole B is used.

1d: Tighten the sill bracket of the opener.

1e: Tighten the window bracket onto the window frame right above the sill bracket. The window must remain closed during this operation.

1f: Open the window so far that the cylinder thread (E) reaches into the cylinder housing (2). Now tighten the cylinder (1). The same amount of thread must be visible on both sides of the housing (2) (**Fig. 5**).

#### **C:** Mounting for cold frame with wood

On wooden frames the brackets can be fitted directly into the woodwork, use screws specially meant for wood fixing.

Follow the mounting for cold frame having plastic covering.

#### Adjustment of opening temperature

If a different temperature is required, the cylinder can be turned.

- Turn clockwise, if an earlier start/higher opening temperature is required.
- Turn anti-clockwise, if a later start/lower opening temperature is required.

One twist of the cylinder equates to approximately 0.5 °C. You should be aware that the temperature can vary somewhat within the same greenhouse. If there are several windows, this can give varying openings.

It is best to adjust the opener when the temperature is constant - either in full sunlight or when the sky is completely overcast.

#### **Concluding remark**

• this window opener is not suitable for use in places where the temperature exceeds 70 °C (158°F)