

Counterweight Railing User Guide



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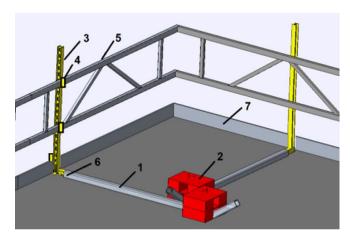
1. Introduction

Kaidetar Oy's counterweight railing provides a safe and easy way to protect work areas on roofs and construction sites. The installation complies with the requirements of EN 13374 Class A. The railing is CE marked and complies with the requirements of the Occupational Safety and Health Act (738/2002) and the Construction Safety Regulation (205/2009). The counterweight railing meets the strength requirements of EN 13374 Class A and is designed to prevent falls on flat and gently sloping surfaces (up to 10°).

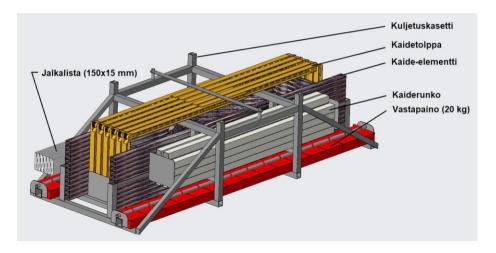
2. List of parts

The railing systems consists of the following parts:

- Part 1: Rail frames, 8 pcs (36m) or 11 pcs (50m)
- Part 2: Weights (20kg)
- Part 3: Rail stanchions
- Part 4: Brackets of the horizontal rails
- Part 5: Double railings
- Part 6: Locking pins (spare pins 5 pcs)
- Part 7: Skirting boards
- **Protective caps** (for 45-degree corner installation)
- Frame fixing parts 8 pcs (36m) or 11 pcs (50m)



Key parts of the railing system.



Overview of the cassette for lifting the parts.

3. Safety instructions

3.1. Personal protective equipment

Wear a safety helmet, protective gloves, safety shoes, and a safety harness.

3.2. Protecting the work area

Isolate the installation area and mark it with warning signs.

3.3. Lifting work

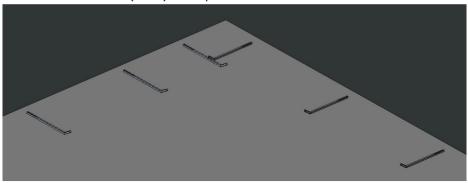
Use only appropriate lifting equipment.

3.4. Weather conditions

Do not perform installation in strong winds (over 6 m/s) or on icy or slippery surfaces.

4. Installation sequence

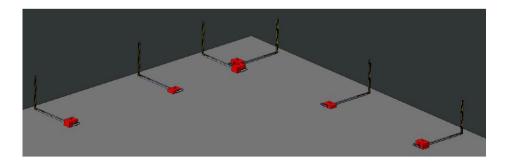
1. Place the **rail frames** (Part 1) on the platform at intervals of no more than 5 meters.



The surface must be clean, level, and stable so that the railing cannot slide on it.

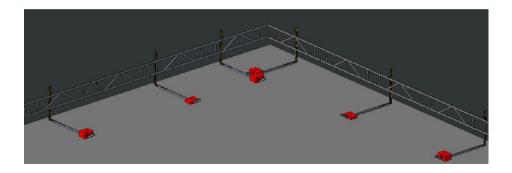
2. Install the weights (Part 2) on the rail frames.

Install 20kg weights at the opposite end of the frame so that every other rail stanchion has 2x20kg and every other has 20kg.



3. Add protective caps to the ends at a 45-degree angle.

4. Install the **rail stanchions** (Part 3) on the **rail frame** (Part 1) and lock with a pin.

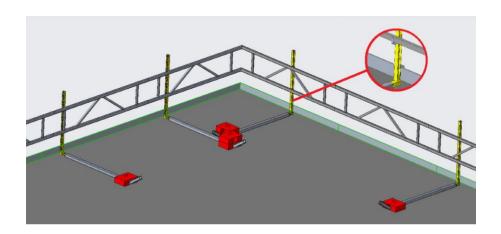


- 5. Install **the upper most bracket of the horizontal rail** (Part 4) minimum of 1 meter high.
- 6. Connect 2 double rails (Part 5) together and lock with pins (Part 6) (2 pcs).

Lift the combined double rail onto the rail

brackets. Lock the double rail in place with the

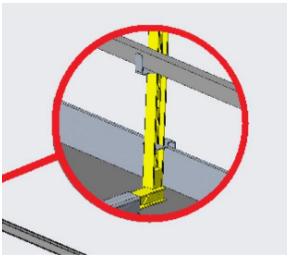
handle screws (4 pcs).



7. Install skirting boards

Install the bottom **skirting board** (Part 7) and secure it with a horizontal rail bracket, which is installed upside down at the bottom of the rail stanchion and holds the skirting board firmly in place.

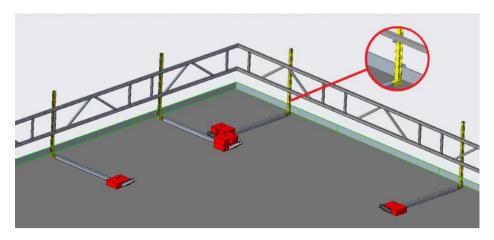
NOTE! Make sure that the bracket is installed correctly.



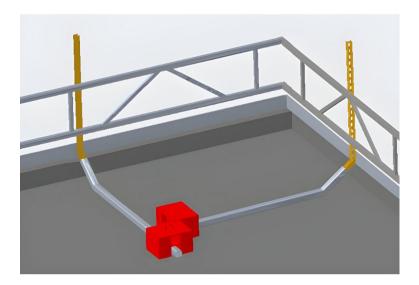
Close-up of the bracket and skirting board showing the correct installation direction.

5. Installation complete

Option A: Installation on the edge of the roof with a skirting board at a 90-degree angle.



Option B: Installation at the edge of the roof, without a skirting board.



6. Dismantling

These instructions have been drawn up in accordance with the Occupational Safety and Health Act (738/2002), Government Decree 205/2009, and EN 13374 Class A standard.

6.1. Safety preparations before dismantling

Restrict the work area

- Prevent unauthorized persons from entering the area.

Check weather conditions

 Do not start dismantling if the wind speed exceeds 6 m/s or the roof surface is slippery/icy.

Check personal protective equipment

- Remember to use a safety harness if working near the edge of the roof.

Visually inspect the railing structure

- Make sure that there are no loose or damaged parts in the railing.
- If necessary, mark the damage and report it to the supervisor.

6.2. Dismantling sequence

Proceed in reverse order to the installation sequence.

STEP 1. Remove the skirting boards

Loosen and remove the horizontal rail brackets that hold the skirting boards in place, which are installed upside down at the bottom of the rail stanchion.

Pull off the skirting board and inspect its condition.

STEP 2. Remove the double rails

Loosen the handle screws that lock the double rail to the brackets.

Hold the rail firmly during removal; do not let it fall!

Lower the rail sections and transfer them to the rack cassette.

STEP 3. Remove the rail stanchions

Remove the locking pins from the rail stanchions and pull the stanchions out of the frame, then reattach the pins to the frame.

Do not twist or turn them, so as not to damage the frame mounting.

STEP 4. Remove the counterweights

Start at one end – first remove the weights that are no longer attached to the stanchions.

Then remove the weights from the stanchions that had either 1×20 kg or 2×20 kg weights.

Use an aid or another person to secure the lift.

Do not drop the weights – there is a risk of damage to the frame or uncontrolled movement.

STEP 5. Move the rail frames

Check the friction surface of the frame base (if anti-slip devices are used).

Sort the frame parts into the transport cassette and place the rail stanchions in the storage position last.

7. Installation along the eaves line

Installing a railing under the eaves requires special attention due to the roof edge structures. In the eaves area, the railing can be installed either above the roof edge or along the eaves line.

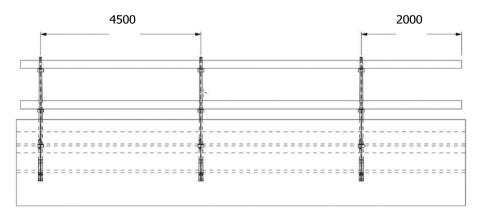
7.1. Instructions for installation along the eaves line

- 1. Ensure that the eaves structures can withstand the load of the railing.
- 2. Install the rail frame parallel to the eaves line.
- 3. Secure the weights safely, taking into account the slope of the roof.
- Ensure that the upper surface of the double railing is at least 1 meter above the edge of the eaves.

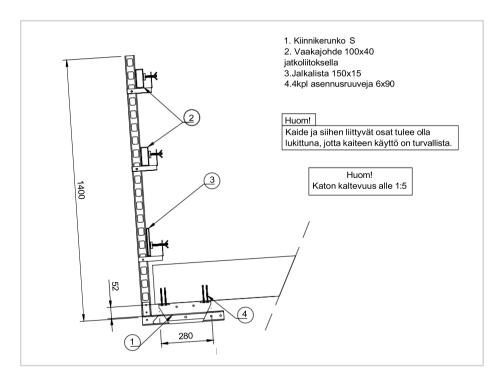
8. Separate installation of the safety rail stanchion

- 1. The loose piece of frame is fixed to the underside of the roof framework, on the outer edge by using 4 mounting screws Assy 3.0 6x90mm and 6x120mm or equivalent. For softwood or softwood-based materials, no pre-hole is required.
- 2. The horizontal frame of the rail stanchion is adjusted to the roof angle and locked so that the rail stanchion is in vertical position. The distance between the horizontal frames, when using stamped wood 50x100mm, the installation distance is max. 2.7m. With an aluminium railing 100x40mm, the installation distance is max. 3.6m.
- 3. The rail stanchion is inserted into the frame piece and locked with a cotter pin at the appropriate distance.
- 4. Adjust the horizontal rail brackets (max gap 500mm)
- 5. Install the horizontal rail brackets and lock with finger screws, the protection height of the top horizontal rail bracket is minimum 1.0m, for working heights above 6.0m, the protection height must be 1.2m. Crossing of the last horizontal rail when using aluminium rail 100x40, crossing max. 2.0 metres. The guardrail system must always have an upper rail, an intermediate rail and a skirting board.
- Once the system is installed, check the railing structure before commissioning. The installation spacing of the rail stanchions shall never exceed the maximum spacing specified by the manufacturer.
- 7. Dismantling is carried out in reverse order. Note! The safety of the guardrail system should be monitored during weekly maintenance checks and daily inspections.





Permissible installation intervals with aluminium rail 100x40mm.



Dimension drawing of safety rail stanchion. 1. Fastening frame S 2. Horizontal rail 10x40 with an extension joint 3. Skirting board 150x15 2. Mounting screws 6x90, 4 pcs. NOTE! The railing and its related parts must be locked in place to ensure safe use of the railing. NOTE 2! Roof slope less than 1.5

8.1. Mounting screws

- Screw 6 x 90mm 0181 806 90
- Screw 6 x 120mm 0181 806 120
- Screw 8 x 100mm 0181 808 100
- Screw 8 x 120mm 0181 808 120

No pre-hole is required in softwood or wood-based materials made from softwood.

For more detailed information about screws, see

www.klimas.com

9. Maintenance and inspection

9.1. Regular inspection

- Check the locks, weights, and skirting boards at least once a week during the period of use.
- Ensure that all parts are in place and intact.

9.2. Commissioning and dismantling inspection

- Always perform a check before use and after installation.
- Ensure that all locks are securely fastened and weights are correctly positioned.

9.3. Damage inspection

- Check the railing immediately if it has been subjected to external damage, impact, or abnormal loads.
- Damaged parts must be replaced or repaired before further use.

10. Lifting and storage

10.1. Lifting instructions

These lifting instructions apply to lifting the **transport cassette**.

- Lifting with approved lifting hooks from the lifting corners. The lifting angle must not be less than 30 degrees.
- Never exceed the lifting capacity of the lifting device.
- Ensure safe working conditions during lifting.
- When lifting with forklift forks, the lifting forks must be on both sides of the center grid, and lifting must only be done from the bottom of the structure.



10.2. Storage instructions

- A maximum of two full transport cassettes may be stacked on top of each other.
- A maximum of four empty transport cassettes may be stacked on top of each other.
- Store all parts in a dry and well-ventilated place.
- Protect metal parts from moisture and corrosion.
- Store parts systematically in a rack cassette.
- Check the condition of parts regularly during storage.

- Clearly mark damaged parts and remove them from use.

Tuotenimi: VP-50

Suurin sallittu kuorma (WLL): 693 kg (vain telineosille)

Valmistaja: Kaidetar Oy

Vimpelintie 663 62830 Luoma-aho

a-aho _{www.kaidetar.fi}

Valmistuspäivämäärä:07/2025

Standardi: SFS-EN 13155:2003

Ei sallittu henkilöiden nostoon. Käyttö vain asianmukaisesti tarkastetulla nostolaitteella.

Sarianumero:

20250701

Brand name: VP-50

Maximum permissible load (WLL): 693 kg (only for rack parts)
Manufacturer: Kaidetar Ov Serial number:

Vimpelintie 663 20250701 62830 Luoma-Aho www.kaidetar.fi

Date of manufacture: 07/2025 Not permitted for lifting persons. Standard: SFS-EN 13155:2003 Use only with appropriately

inspected lifting equipment.



Turvallisuutta elämääsi Safety in your life



