

System description

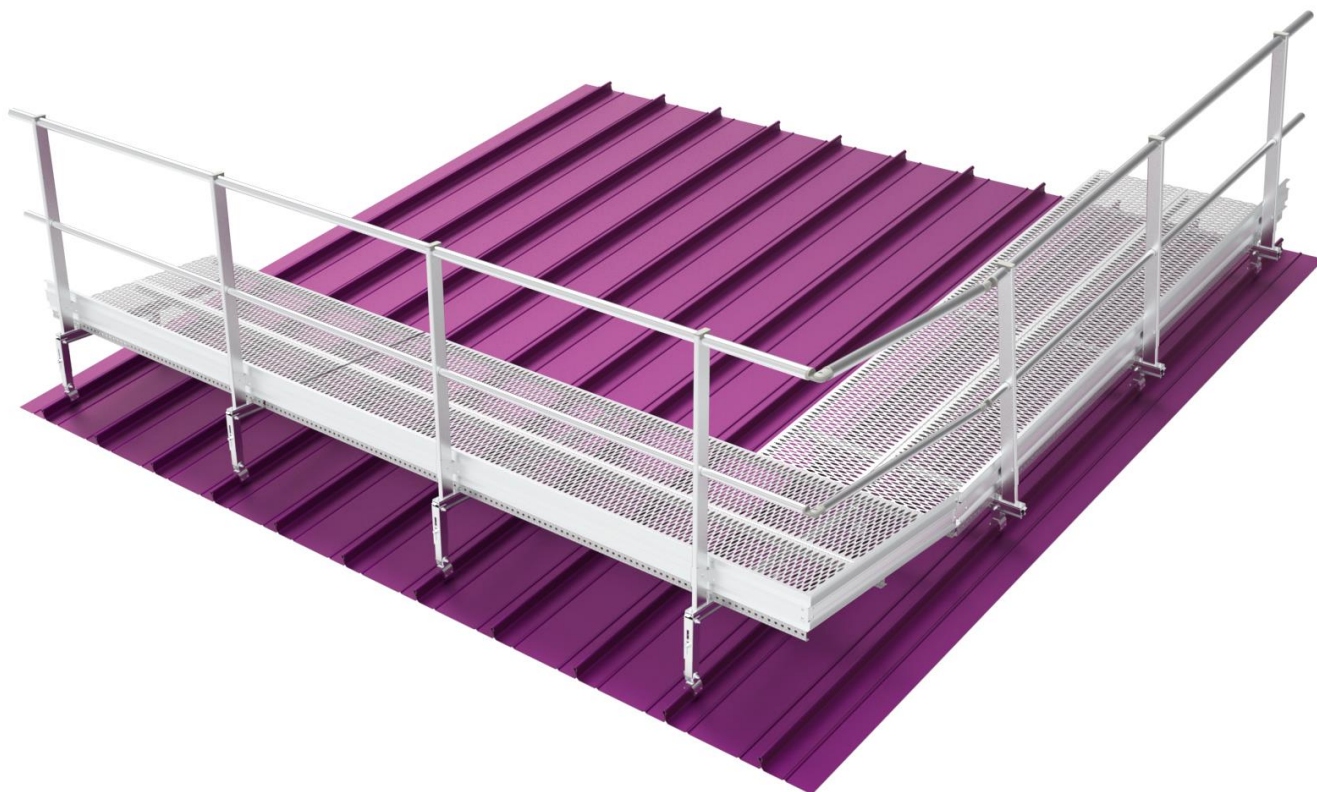
ROOFESCAPE SEAM is a walkway for escape and rescue routes in accordance with DIN 14094-2 on metal roofs with hand-finished rebated roofing or metal profiles and the GARDCO side railing. It can also be used as a maintenance walkway in accordance with DIN EN 516, type C, class 1.

These instruction include the following possible versions

Page 2- 6: ROOFESCAPE SEAM 500 Z/A and 600 Z, width of the grating 500 or 600 mm

Page 7- 11: ROOFESCAPE SEAM 1000 Z/A and 1200 Z, width of the grating 1000 or 1200 mm

Page 12- 14: ROOFESCAPE SEAM platform, minimum 100 x 150 cm



Installation

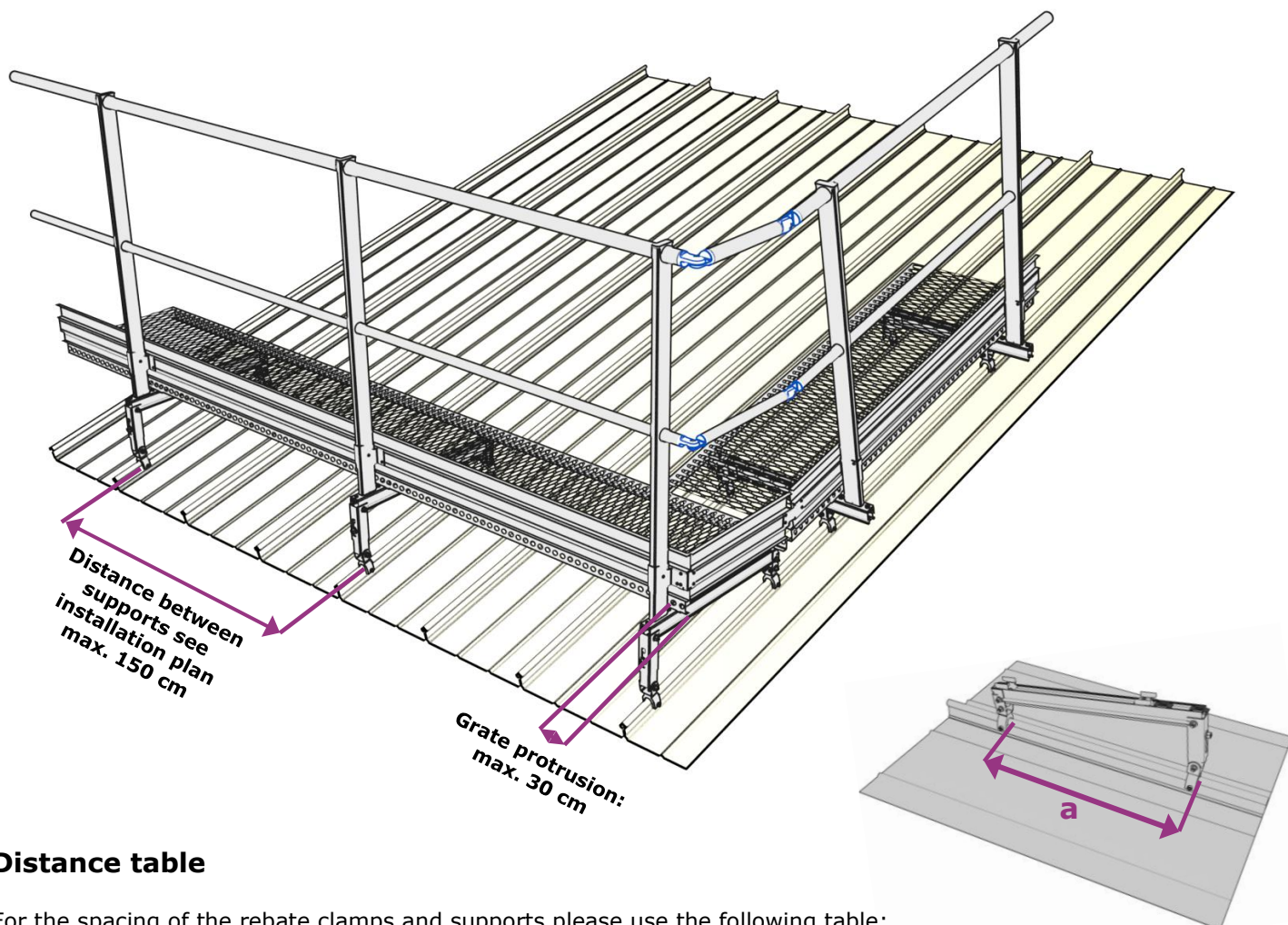
Please read through the installation instructions before installing the walkway.

Before installation, the load-bearing capacity of the roof structure and thus the suitability for installation must be checked by a responsible expert for stability. The dead load of the walkway system is 0.5 kN/m.

In areas with aggressive environmental conditions, e.g. in chemical plants or near the coast, an additional coating or anodising of the aluminium parts and a stainless steel grating may be necessary.

Layout for ROOFESCAPE SEAM 500 Z/A and 600 Z

Please note your installation plan!

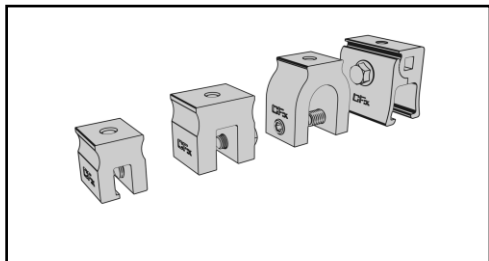


Distance table

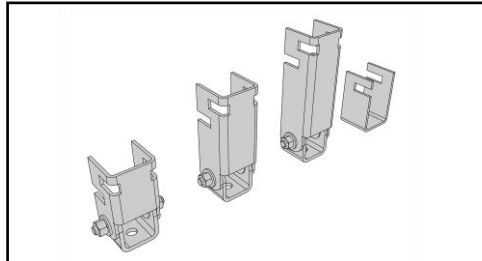
For the spacing of the rebate clamps and supports please use the following table:

ROOFESCAPE SEAM 500 Z/A				ROOFESCAPE SEAM 600 Z			
Roof pitch	a = Clamp distance	Supports 1	Supports 2	Roof pitch	a = Clamp distance	Supports 1	Supports 2
3°	600 mm	SAK	SAM	3°	701 mm	SAK	SAM
5°	602 mm	SAK	SAL	5°	703 mm	SAK	SAL
8°	606 mm	SAK	SAL	8°	707 mm	SAK	S1
10°	610 mm	SAK	S1	10°	711 mm	SAK	S1
15°	622 mm	SAK	S2	15°	726 mm	SAK	S2
20°	641 mm	SAK	S2	20°	747 mm	SAK	S3
25°	666 mm	SAK	S3	25°	776 mm	SAK	S3
30°	699 mm	SAK	S3	30°	815 mm	SAK	S3
35°	741 mm	SAK	S3				

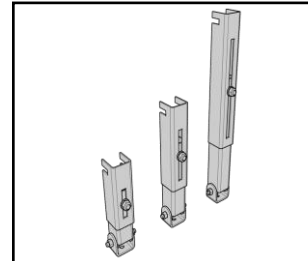
Components for ROOFESCAPE SEAM 500 Z/A and 600 Z



CF:x Clamps



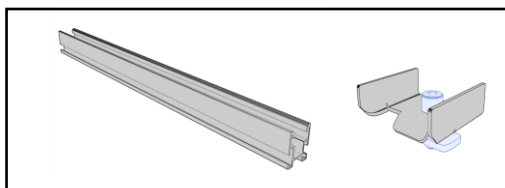
Support: SAK, SAM, SAL and SAFT



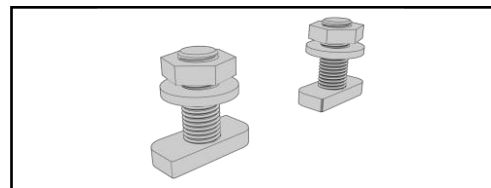
Telescopic support 1-3



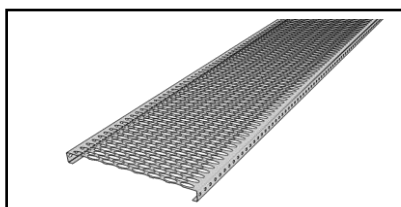
Screw M8x18



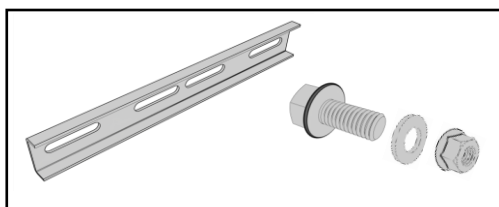
Set: Support rail and 2 grate clamps



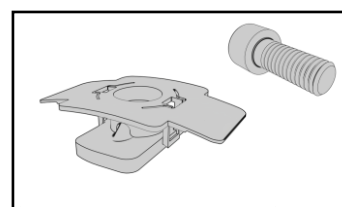
Set for fixing the support rail:
2 hammer head screws M10x25
(Typ 28/15), washer and nut



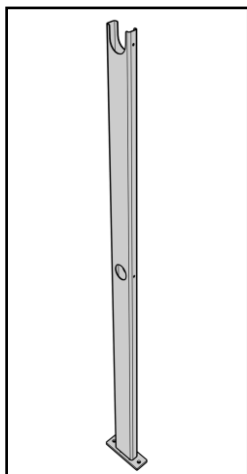
Grating 500 mm galvanized
Grating 600 mm galvanized
Grating 500 mm aluminium



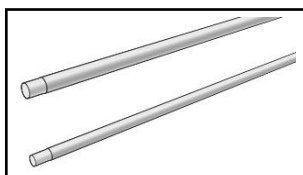
Set of longitudinal connector grate:
longitudinal connector with 4 screws
M8x20, washers and self-looking nuts



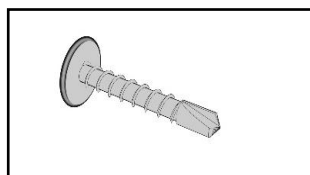
Slot nut with screw
M8x25



Post H 118 cm



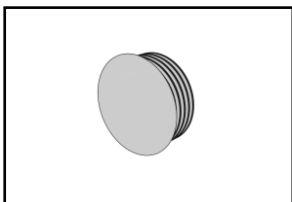
Handrail Ø 45 mm
Kneerail Ø 35 mm



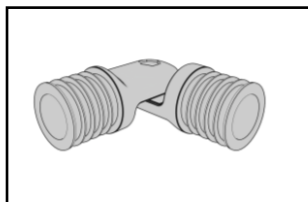
Drilling screw
4,8x25 & 4,8x16



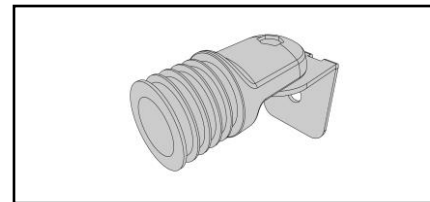
Cap for post



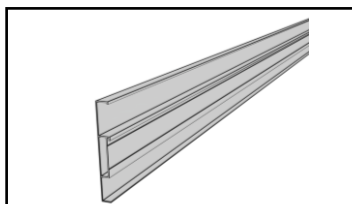
Cap for tube



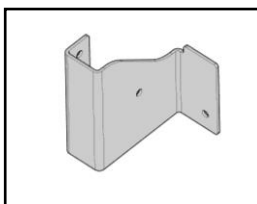
Corner connectors



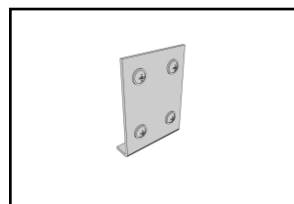
Wall connection for hand-/ kneerail



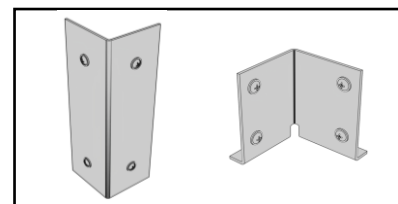
Baseboard 19x150x3000mm



Holder for baseboard

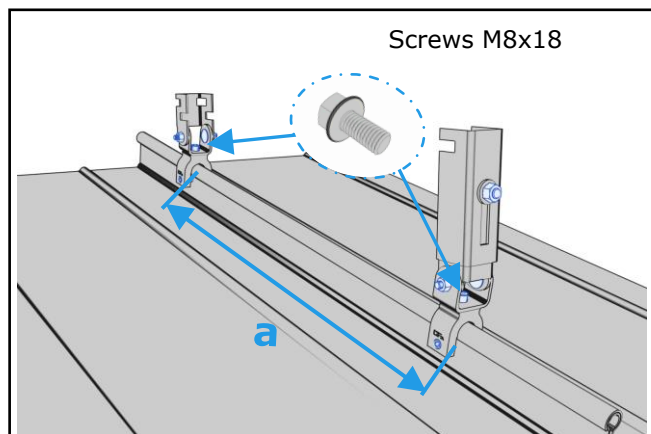


Connector for baseboard

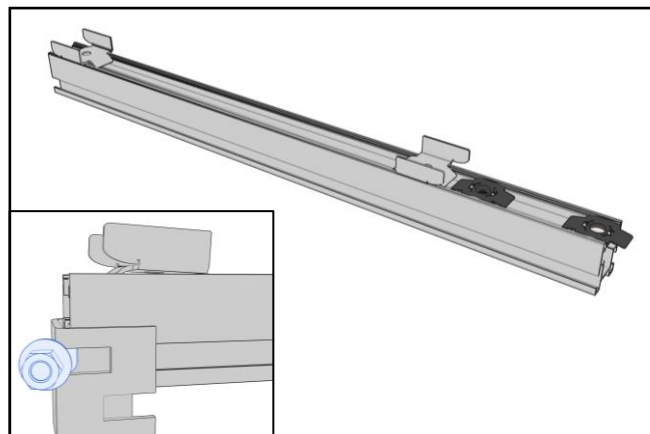


Corner connector for baseboard

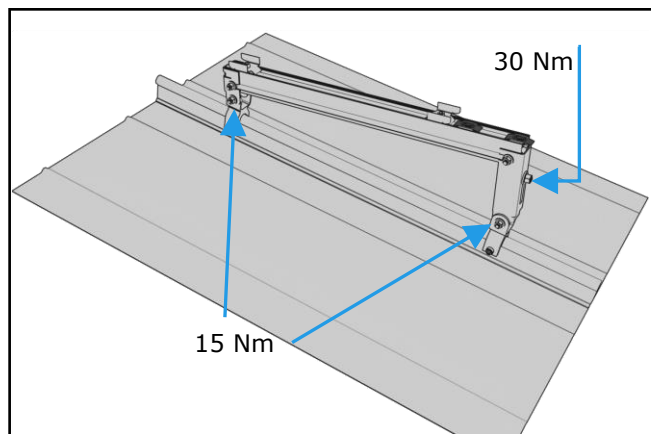
Montage for ROOFESCAPE SEAM 500 Z/A and 600 Z



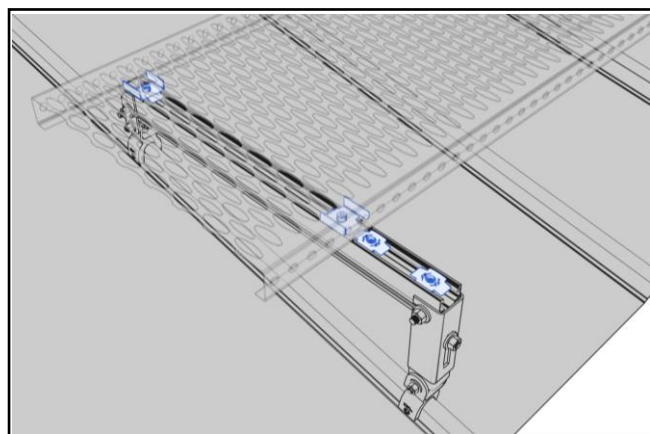
For spacing of the clamps, see table on page 2!
Install the clamps according to their installation Instructions. Place the supports on the clamps and fix them with the screws (15 Nm).



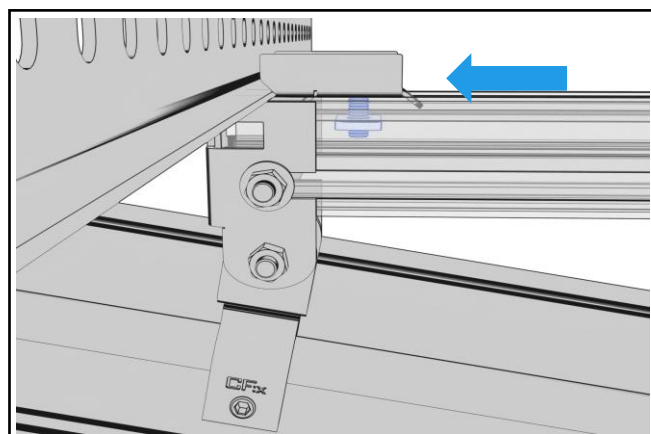
Slide the grate clamp into the support rail on the ridge side and the insert nut on the eaves side. Fasten the support rail to the supports on both sides with 2 hammerhead screws each (30 Nm).



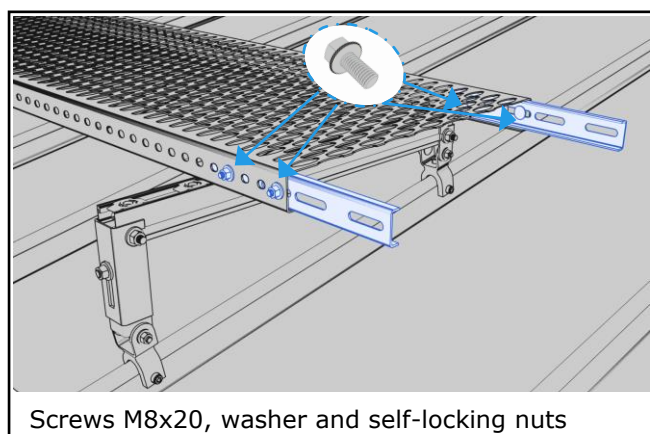
Align the support rail horizontally and tighten the remaining screws.



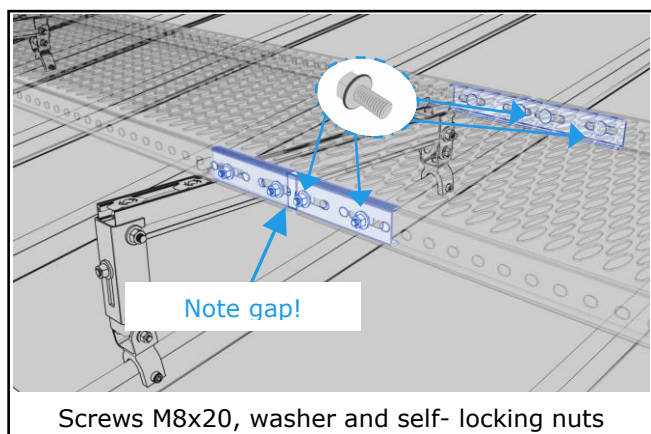
Place the a grate on the substructure.



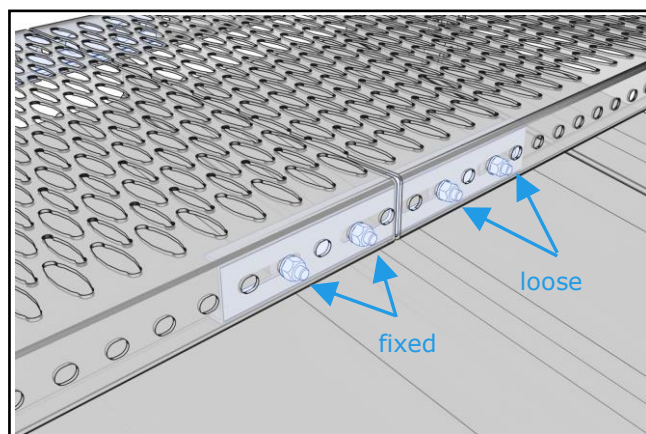
Push the grate clamps outwards over the back edge of the grate and tighten the screws (7 Nm).



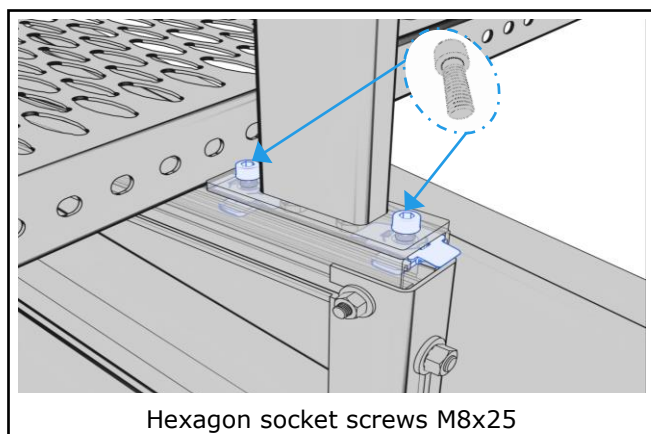
Fix 2 longitudinal grate connectors to the grate with 2 screws each (15 Nm).



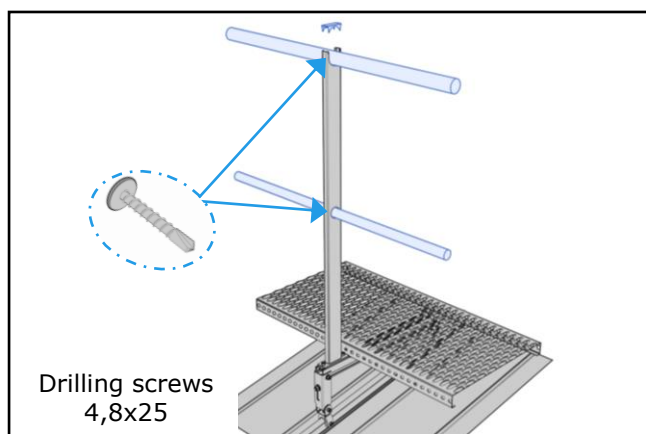
Place the next grate on the base and push it against the already mounted grate, leaving a gap 5-10 mm. Fasten the grate clamps and loosely fix the longitudinal connectors with 2 screws each.



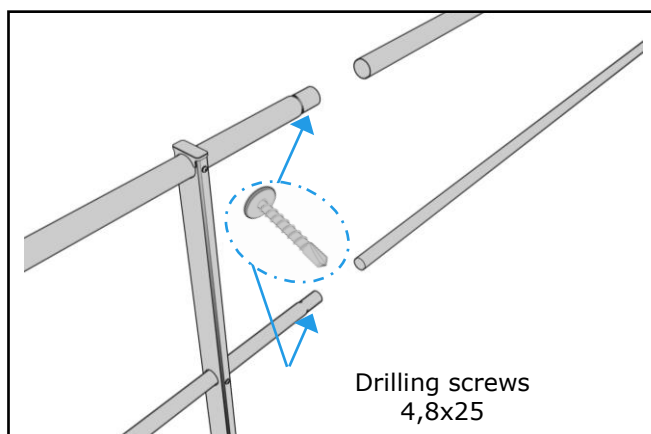
Due to thermally induced length changes, the screws are screwed tightly on one side and loosely on the other.



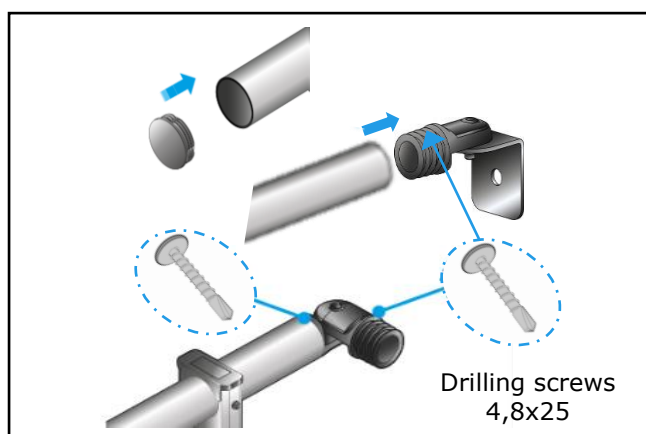
Fasten the post to the insert nuts with 2 screws (15 Nm).



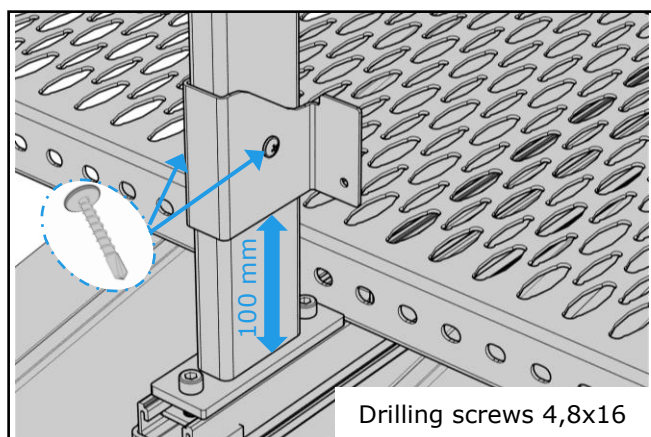
Thread the kneerail and insert the handrail. Put on the cover cap. Fix the kneerail and the handrail with 2 drilling screws.



Insert the handrail and the kneerail into each other and fix each with a drilling screw placed diagonally from below.

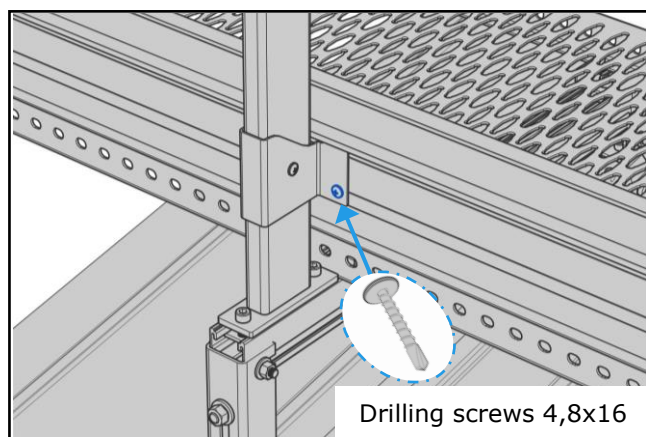


Put on the cover caps at the ends. Insert the handrails and kneerails into wall connections or into flexible corner connectors and fix them with drilling screws.



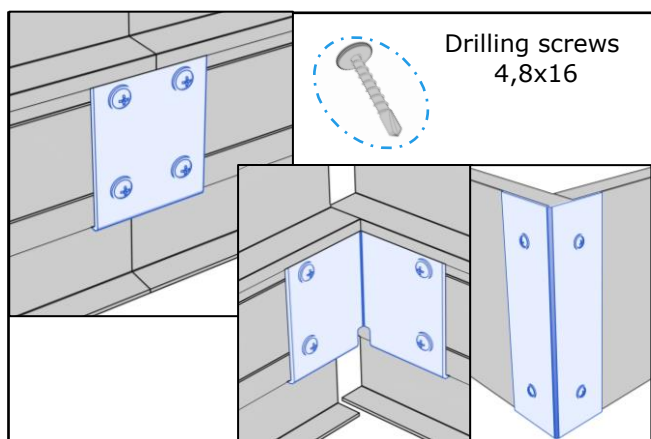
Drilling screws 4,8x16

Fix the baseboard holder to the post at a height of 100 mm with 2 drilling screws.



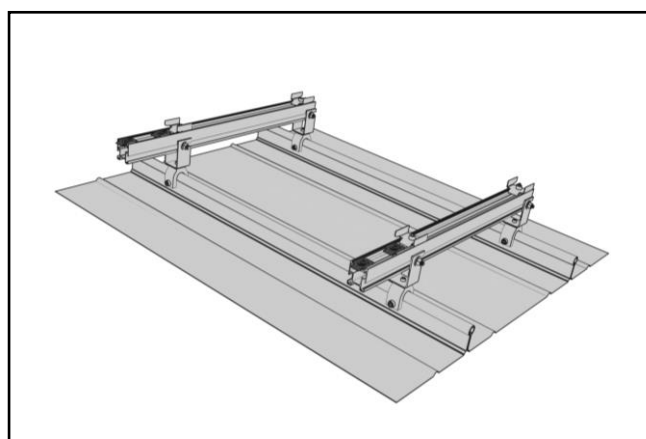
Drilling screws 4,8x16

Hang the baseboard and fix it with a drilling screw. The lower edge of the baseboard is flush with the grating surface.



Drilling screws 4,8x16

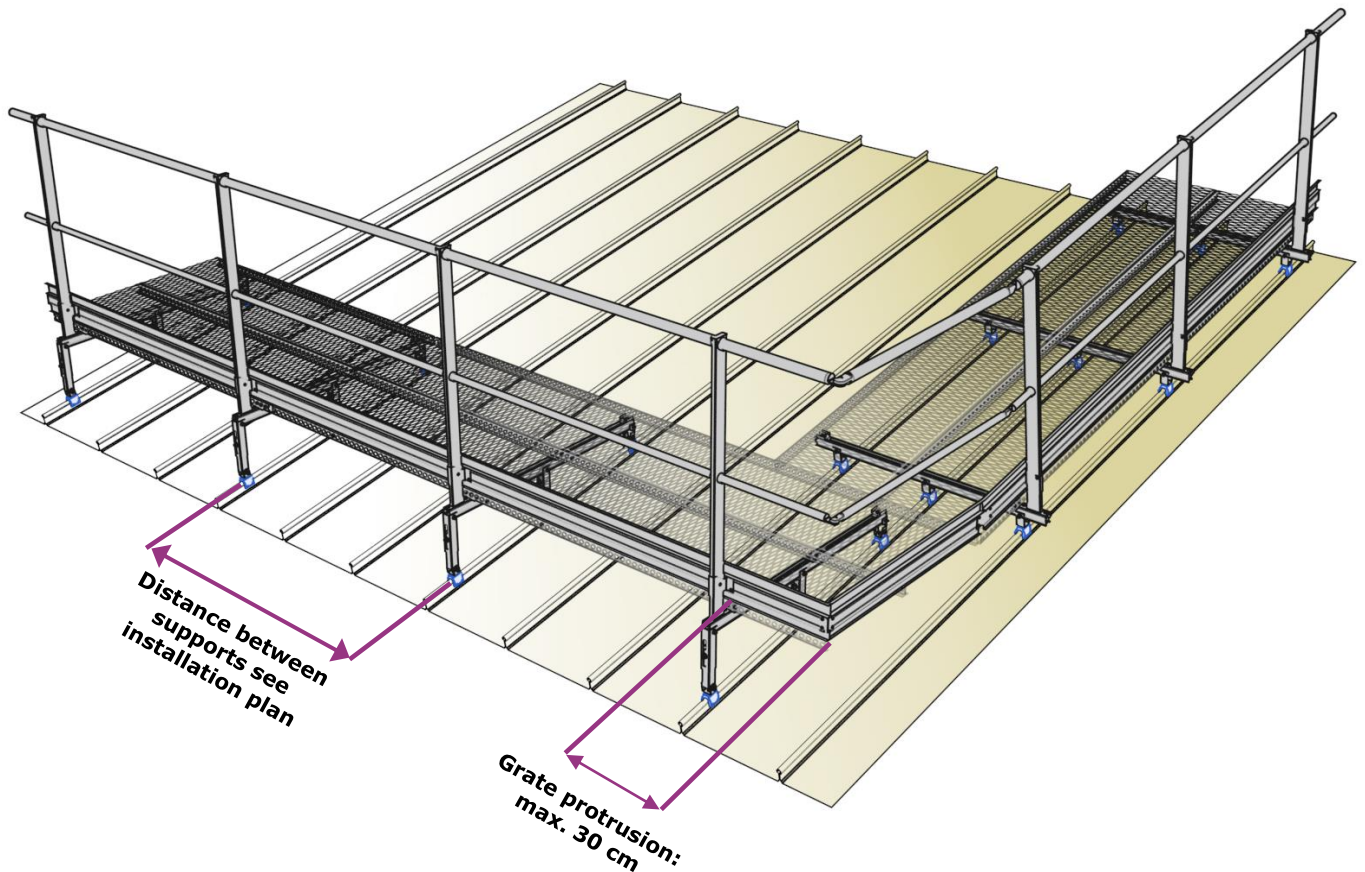
Join the baseboard at the joint. Insert the connector and fix it with 4 drilling screws. Place the corner connectors on the inside and outside of the corners and fix each with 4 drilling screws.



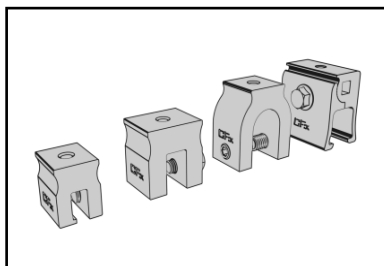
Orientation from **eaves to ridge**:
Here the support rails are mounted on the clamps at right angles to the rebate.

Layout for ROOFESCAPE SEAM 1000 Z/A and 1200 Z

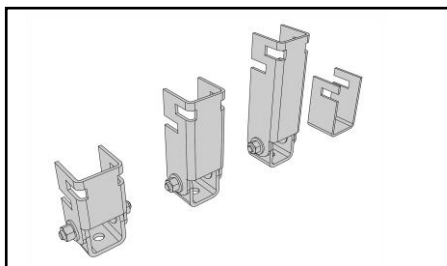
Please note your installation plan!



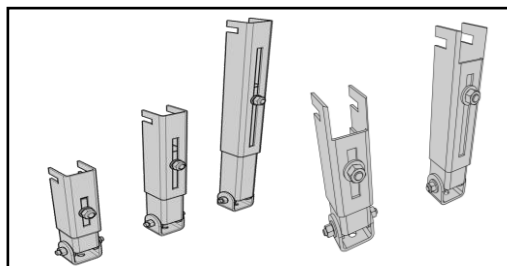
Components for ROOFESCAPE SEAM 1000 Z/A and 1200 Z



CF:x Clamps



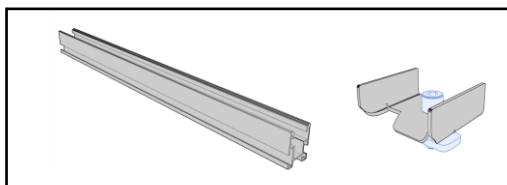
Support: SAK, SAM, SAL & SAFT



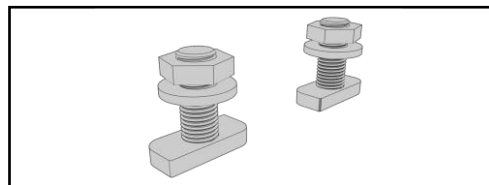
Telescopic support 1-3, TM 1 + TM2



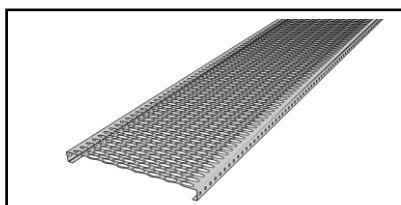
Screw M8x18



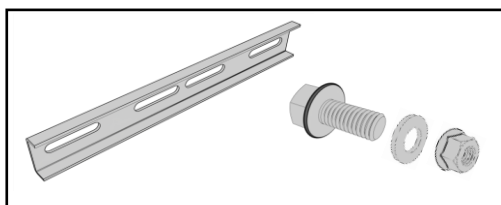
Set: support rail and 2 grate clamps



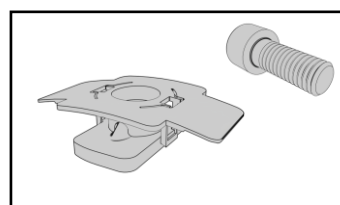
Set for fixing the support rail:
2 hammer head screws M10x25
(Typ 28/15) with washer and nut



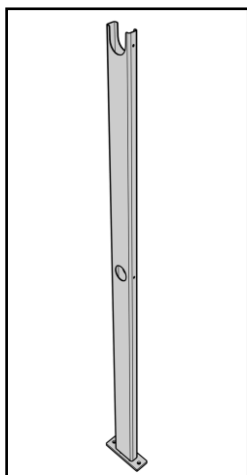
Grating 500 mm galvanized
Grating 600 mm galvanized
Grating 500 mm aluminium



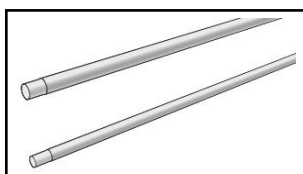
Set of longitudinal connector grate:
longitudinal connector with 4 screws
M8x20, washers and self-looking nuts



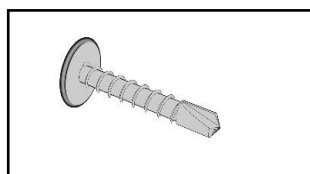
Slot nut with screw
M8x25



Post H 118 cm



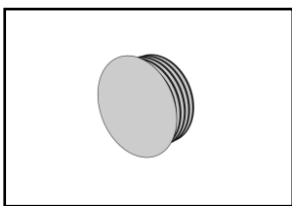
Handrail Ø 45 mm
Kneerail Ø 35 mm



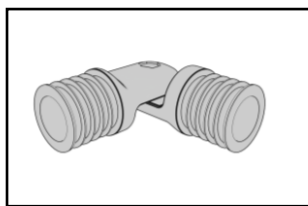
Drilling screw
4,8x25 & 4,8x16



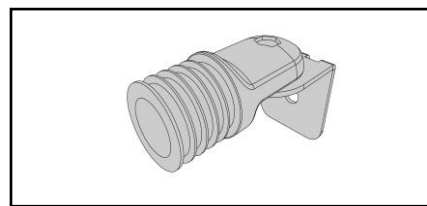
Cap for post



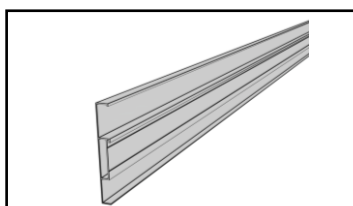
Cap for tube



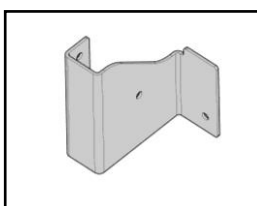
Corner connector for tubes



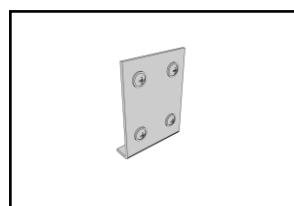
Wall connection for hand-/ kneerail



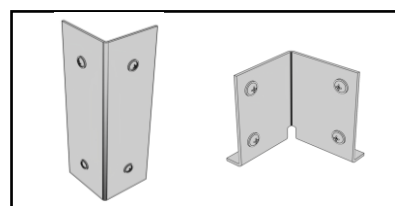
Baseboard 19x150x3000mm



Holder for baseboard

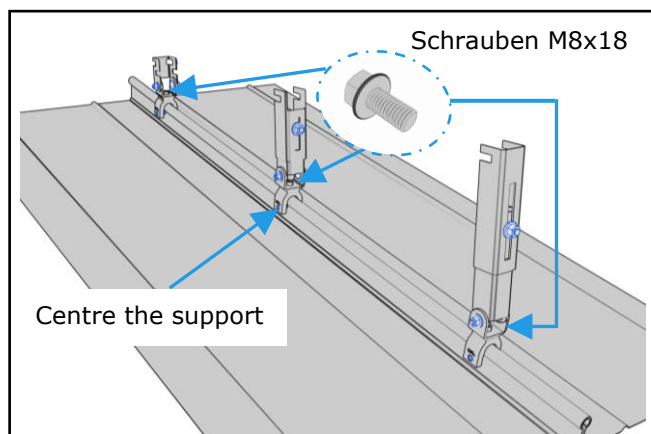


Connector for baseboard

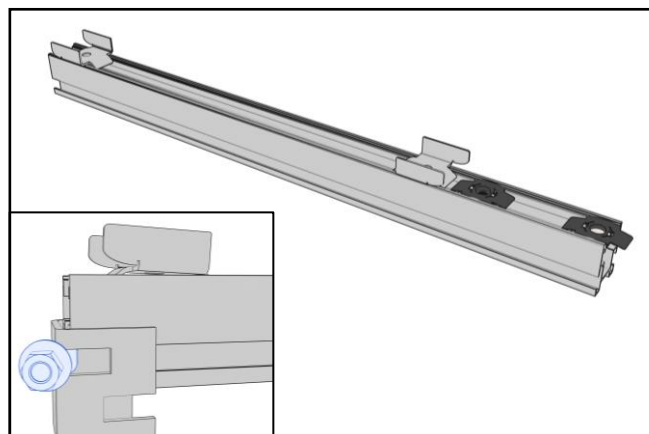


Corner connector for baseboard

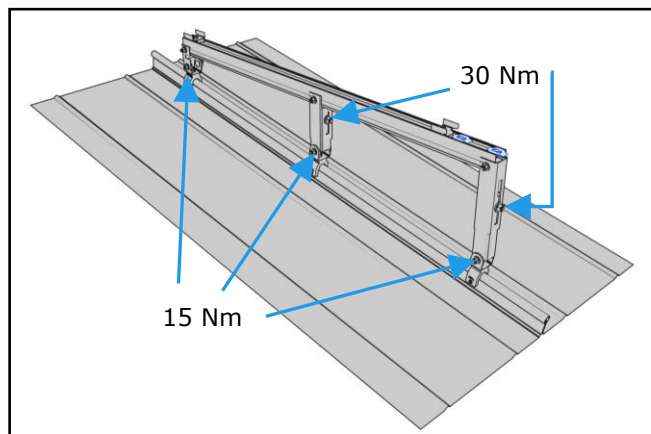
Montage for ESCAPE SEAM 1000 Z/A and 1200 Z



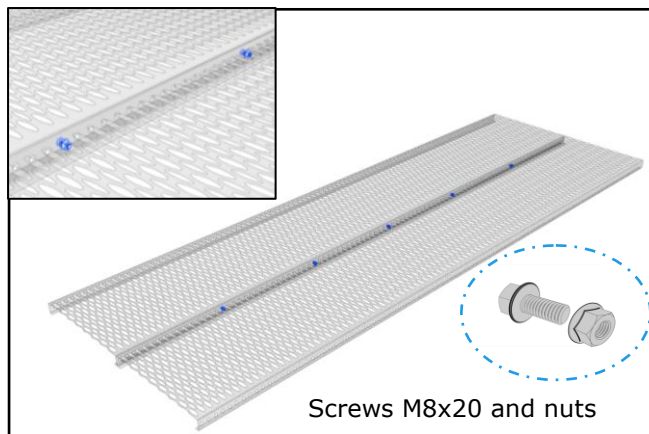
Install the clamps according to their installation instructions, aligning the centre one in the middle. Place the supports on the clamps and secure with the screws (15 Nm).



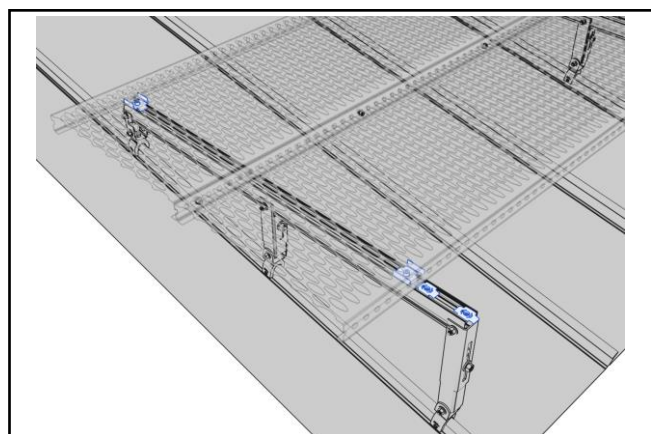
Push 2 grate clamps on the ridge side and 2 insert nuts on the eaves side into the support rail. Fasten the support rail to the supports on both sides with 2 hammerhead screws each (30 Nm).



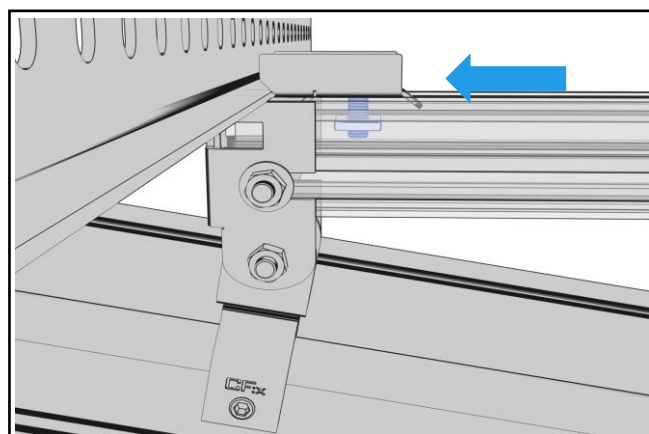
Align the support rail horizontally and tighten the remaining screws.



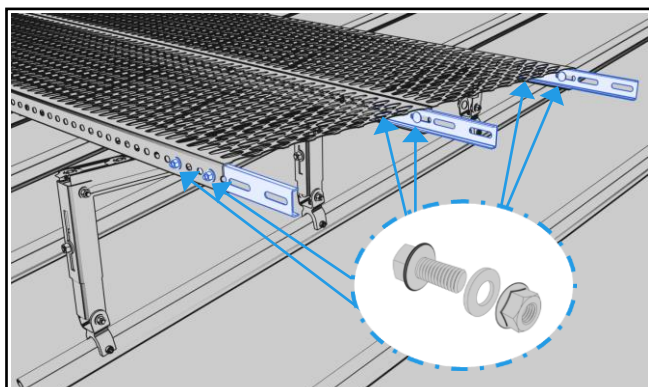
Screw 2 grate together with 5 screws. Max. distance of 50 cm between the grate.



Place the prepared grates on the substructure.

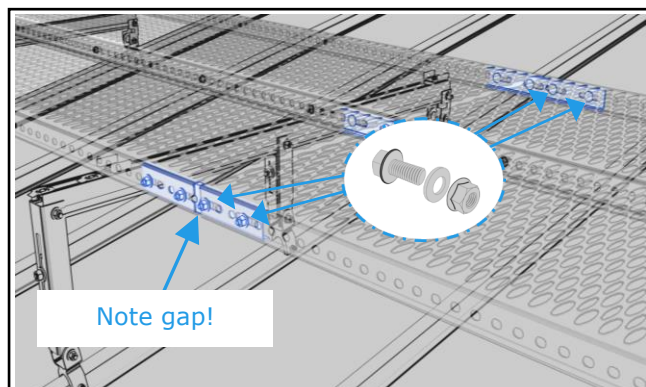


Push the grate clamps outwards over the back edge of the grate and tighten the screws (7 Nm).



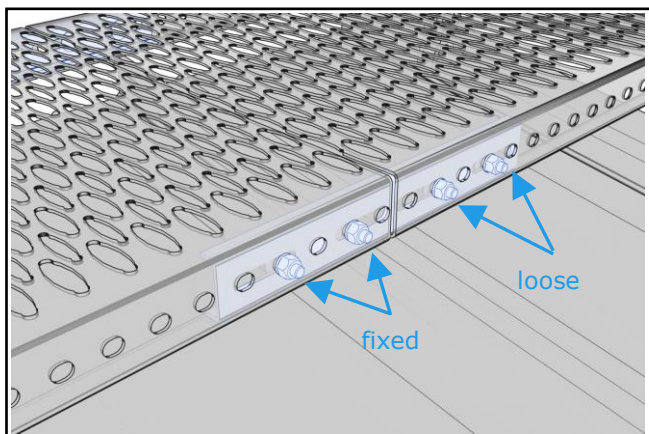
Screws M8x20, washer and self-locking nuts

Fix 3 longitudinal grate connectors to the grate with 2 screws each (15 Nm).

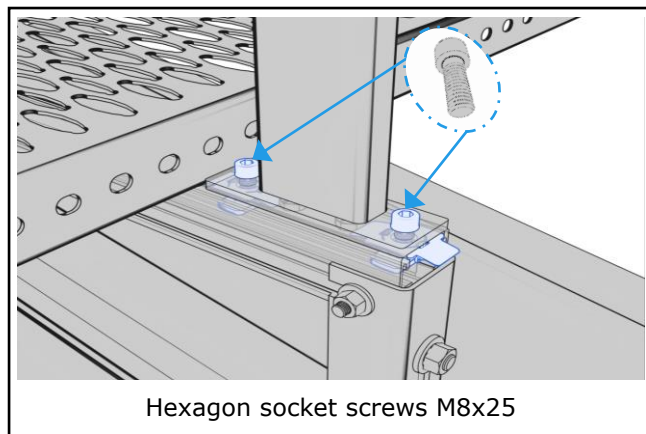


Screws M8x20, washer and self-locking nuts

Place further grates on the substructure and push them against the already installed grates, leaving a gap of 5- 10 mm. Fasten the grate clamps and fix the outer longitudinal connectors loosely with 2 screws each.

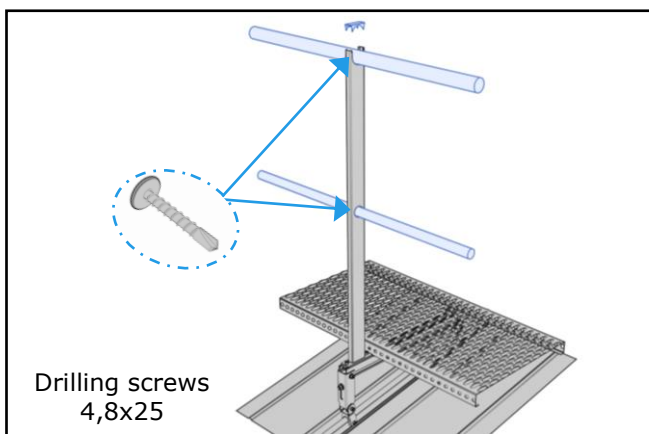


Due to thermally induced length changes, the screws are screwed tightly on one side and loosely on the other.



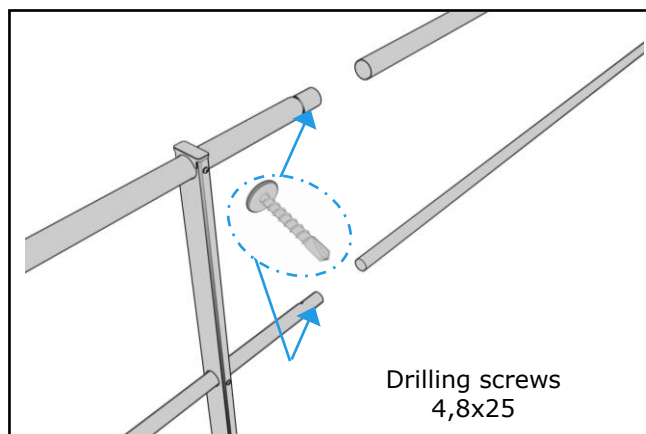
Hexagon socket screws M8x25

Fasten the post to the insert nuts with 2 screws (15 Nm).



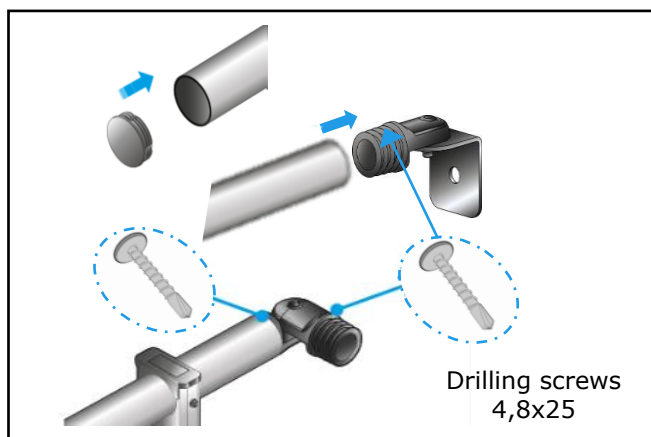
Drilling screws 4,8x25

Thread the kneerail and insert the handrail. Put on the cover cap. Fix the kneerail and the handrail with 2 drilling screws.

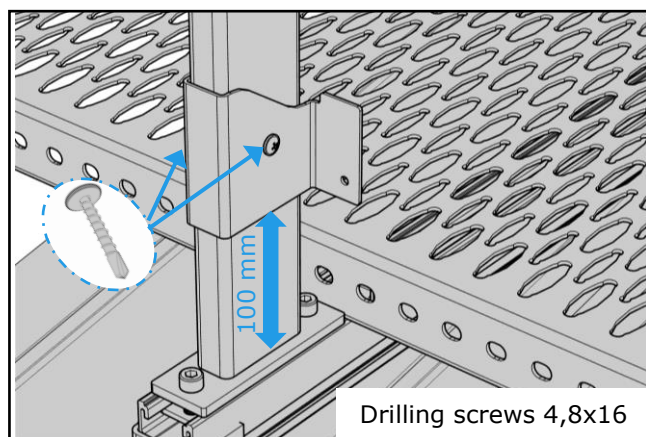


Drilling screws 4,8x25

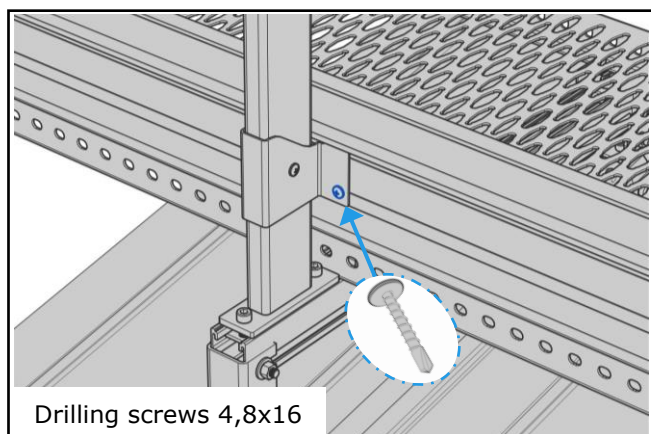
Insert the handrail and the kneerail into each other and fix each with a drilling screw placed diagonally from below.



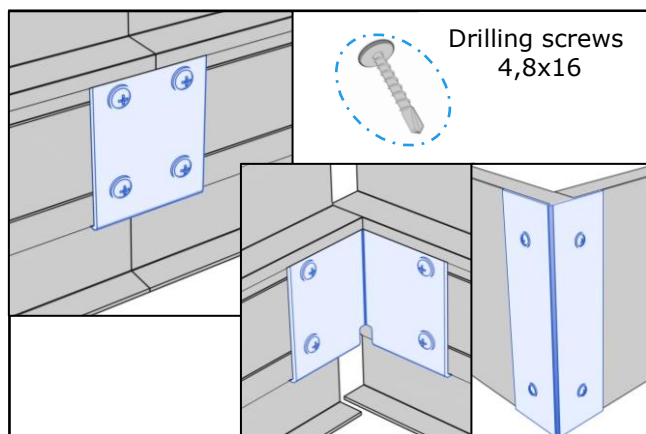
Put on the cover caps at the ends. Insert the handrails and kneerails into wall connections or into flexible corner connectors and fix them with drilling screws.



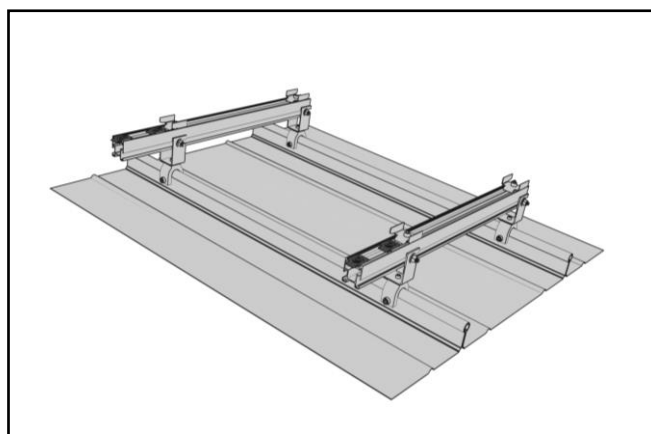
Fix the baseboard holder to the post at a height of 100 mm with 2 drilling screws.



Hang the baseboard and fix it with a drilling screw. The lower edge of the baseboard is flush with the grating surface.



Join the baseboard at the joint. Insert the connector and fix it with 4 drilling screws. Place the corner connectors on the inside and outside of the corners and fix each with 4 drilling screws.



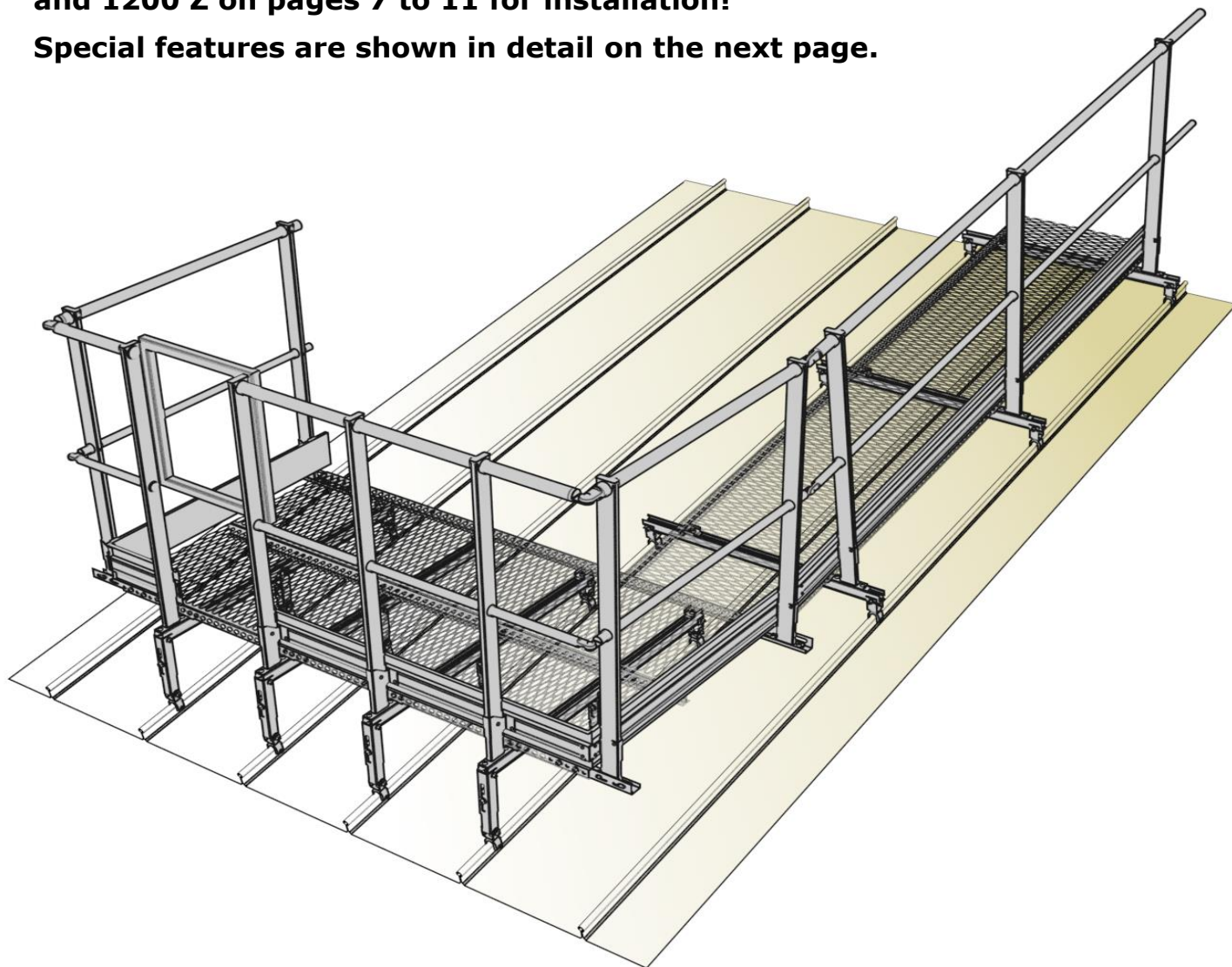
Orientation from **eaves to ridge**:
Here the support rails are mounted on the clamps at right angles to the rebate.

Layout for ROOFESCAPE SEAM platform min. 100 x 150 cm

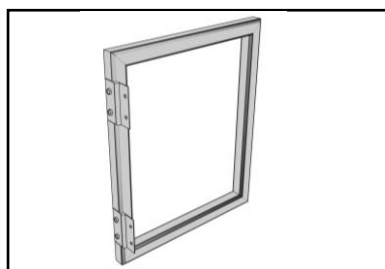
Please not your installation plan!

Please use the installation instructions for ROOFESCAPE SEAM 1000 Z/A and 1200 Z on pages 7 to 11 for installation!

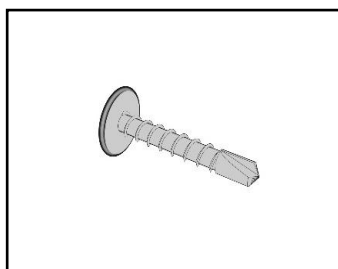
Special features are shown in detail on the next page.



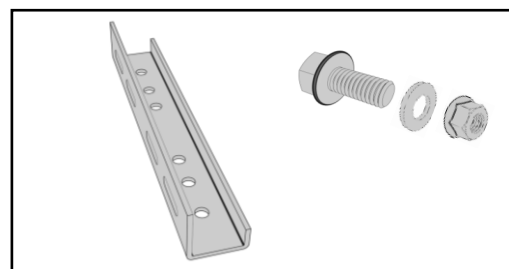
Further components ROOFESCAPE SEAM platform



Door element

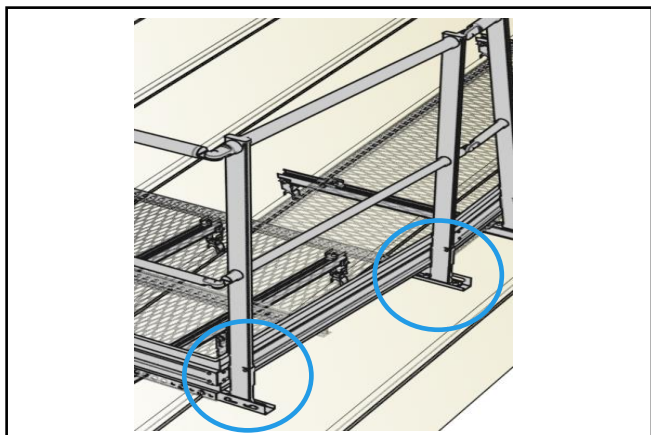


Drilling screw
4,8x25

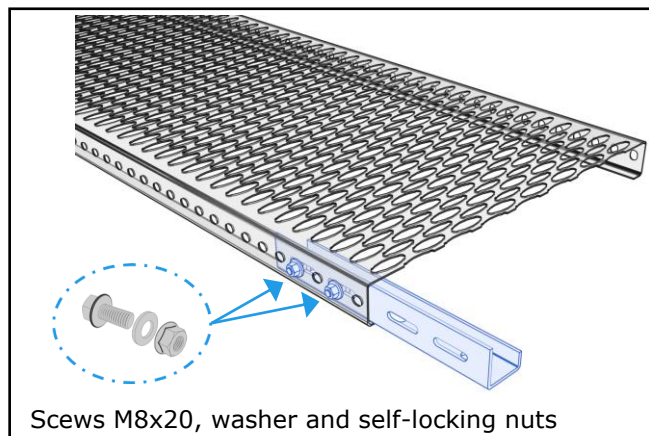


Set of head railings:
Base rail, 2 screws M8x20 with washer
and self-locking nuts

Addition for montage for ESCAPE SEAM platform

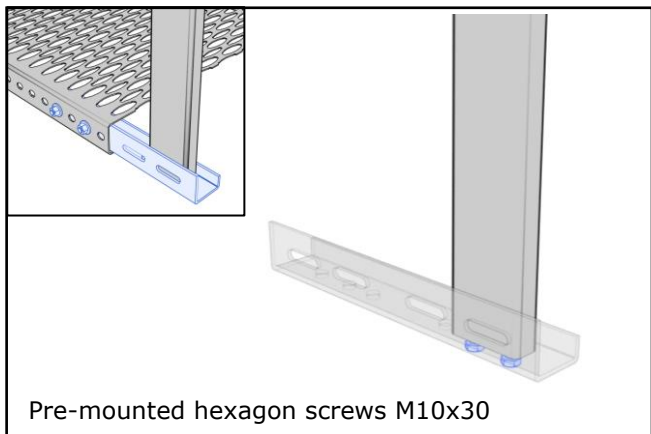


Design of the head railing.



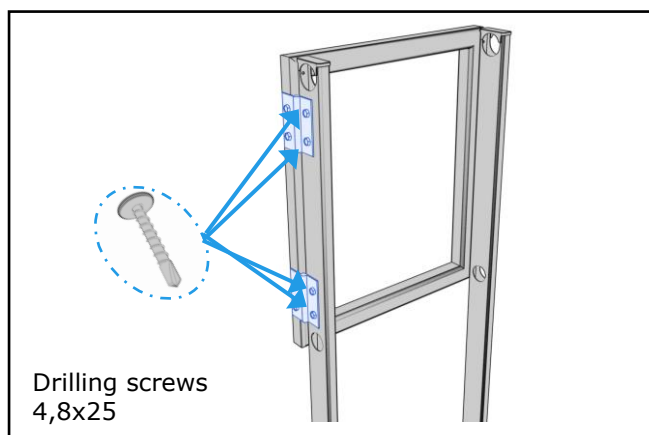
Screws M8x20, washer and self-locking nuts

Tighten the base rail of the head railing with 2 screws (15 Nm).



Pre-mounted hexagon screws M10x30

Loosen the pre- mounted hexagon screws from the post. Place the post on the basis rail and fasten with the 2 screws.



Drilling screws
4,8x25

Fasten the door element flush tot he inside of the railing with 4 drilling screws.

Storage

The gratings are made of aluminium or galvanised steel, the supporting structure and the railing are made of aluminium. When exposed to moisture, the surfaces can oxidise and lose their shine or develop stains. This oxidation does not attack the metal itself, but forms a natural protective layer. The visual changes have no effect on the quality of the components and the maintenance route. We recommend storing the components in a dry, ventilated place protected from moisture until they are installed.

Maintenance

ROOFESCAPE SEAM must be inspected at intervals of max. 3 years. Particular attention must be paid to loose or deformed parts and corrosion. The results of inspections and repairs must be documented and retained.

If there are any concerns regarding the functionality of the walkway or the anchorage device, these must be inspected and, if necessary, serviced before the roof is next accessed.

General safety instruction

For the duration of the assembly, protection against falling must be provided, e.g. by means of an appropriate scaffold or anchoring devices. Care must be taken to ensure that assembly is only carried out by instructed specialists in compliance with the specifications for carrying out work at the appropriate height. Openings between side guardrail systems and other structures must be as small as possible, not exceeding 120 mm for guardrail rails and 20 mm for toe board. The guardrail system must not be used as an anchor device.

Only undamaged original parts are to be used for assembly, and no changes may be made to them that impair their function or safety. Should it be necessary to dismantle the catwalk, this must be done in reverse order to the assembly instructions.

Workplaces and traffic routes on the roof may only be accessed by persons who have been instructed for this work. Workplaces and traffic routes on the roof may only be accessed when they are free of snow and ice. For roof pitches > 10°, other PPE must be used on the ridge side when entering the roof above the maintenance walkway.

After a fall of a person as well as after an incorrect installation, the catwalk and the anchor device may only be used again if they have been checked by a competent person and approved in writing for the intended use.

Marking



- 1 Product and type identification
- 2 Standard and classification
- 3 Year of manufacture and serial number

- 4 Note that instructions for use must be observed
- 5 Manufacturer

Disclaimer

The load-bearing capacity of the substrate must be checked by the customer. Solid-C cannot make any statements about this. In addition to these installation instructions, the installing company has to observe the valid regulations and rules of technology. Solid-C GmbH is not liable for the dimensioning instructions contained in commercial offers, since it is generally not possible to agree on all technical framework conditions within the scope of tender submissions. The installation company is responsible for the mechanical durability of the mounted products to the building envelope, especially for their tightness. The components of Solid-C GmbH are designed for this purpose according to the expected loads and the valid state of the art. Solid-C GmbH does not assume any liability for damages caused by improper installation.