



Flood Barrier

BL/HDS

BL/HDS	Article index: 361 / 362 / 364
Description	3
Installation inside a doorway or gate	4
Installation outside a doorway or gate	5
Installation flush with the masonry	6
Various barrier profiles	7
U-shaped profiles	8
Horizontal details	9
Vertical details	10
Span widths	11
Deployment	12
Covers	13
Mobile posts	14
Installation guide	14
Reference examples	15

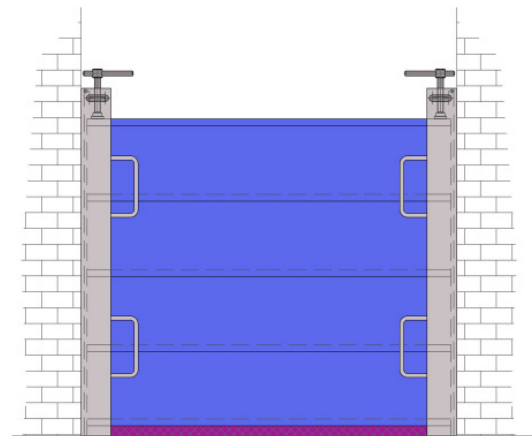
Flood Barrier BL/HDS

Article index: 361, 362, 364

BL/HDS: Flood Barrier System



- **secure against vandalism**
- **stackable**
- **slide-insert**
- **tongue-and-groove principle**



Dimensions:

BL/HDS	150-80	BL361	Aluminium body 150 x 80 x 4 mm
BL/HDS	200-50	BL362	Aluminium body 200 x 50 x 4 mm
BL/HDS	150-100	BL364	Aluminium body 150 x 100 x 4 mm

The HDS system was developed specifically for public areas and is especially secure against vandalism: the mounting fixtures contain no loose parts, seals or guide rails that can be tampered with or damaged.

Our registered sealing system is based on a mobile sealing rail with an all-round seal, a mobile pressure rail and an adjustable pressing unit that enable the system to mould itself to the ground. It is designed to allow sealing in either direction, depending on the water level. Tensioning via the pressure rail ensures a high degree of stability.

The U-shaped posts are made of V2A stainless steel. These fixtures can be dowelled to the wall or completely integrated into it without the need for seals, sealing rails or any kind of screw fastenings.

The aluminium retention barriers are very quick to install on the posts. Since 2011, all our barrier profiles have been furnished with a high-grade Eloxal protective coating (Eloxal = electrolytic oxidation of aluminium).

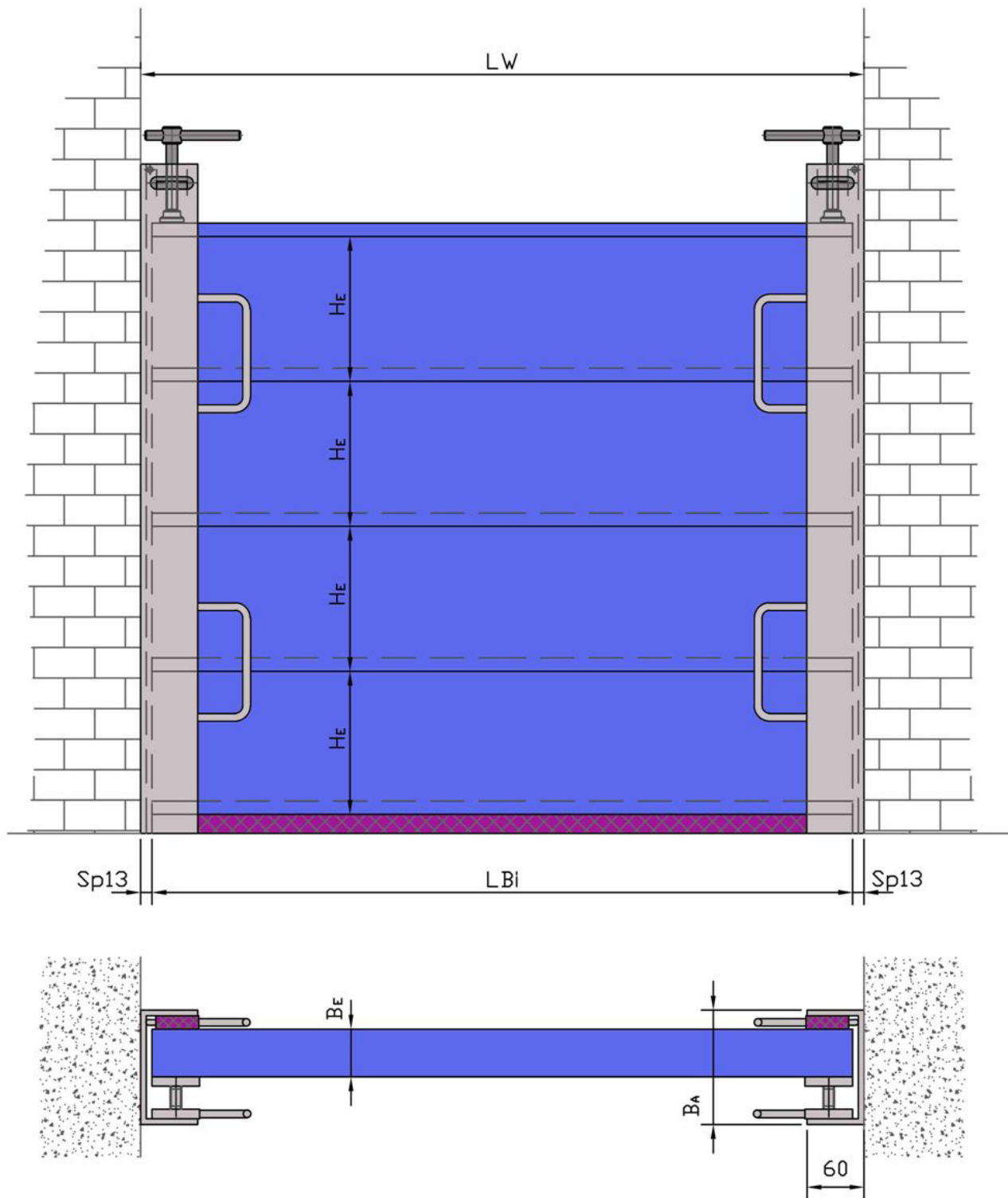
The sealing process occurs by means of a mobile sealing rail, while the mounting and tensioning is done by a mobile pressure rail.

The stainless-steel contact pressure rails – which force the barrier bodies down onto the ground – are designed according to the type of installation involved.

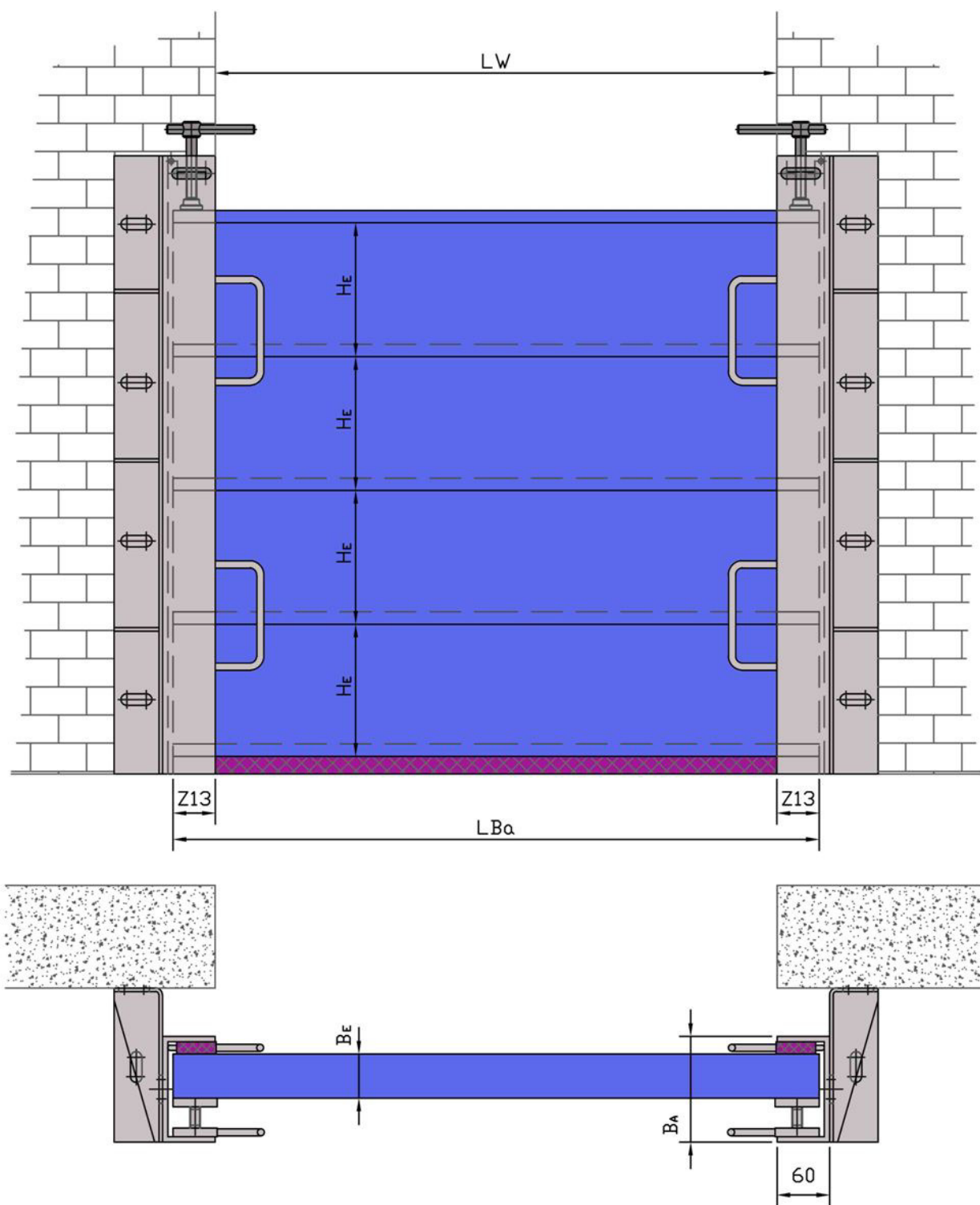
The lowest barrier panel comes fitted with a special seal to offset any unevenness in the ground, and can thus be installed without a ground rail.

Our covers for the ground anchor plates are made of skid-resistant corrugated sheet metal and can be driven over. Other materials are available on request.

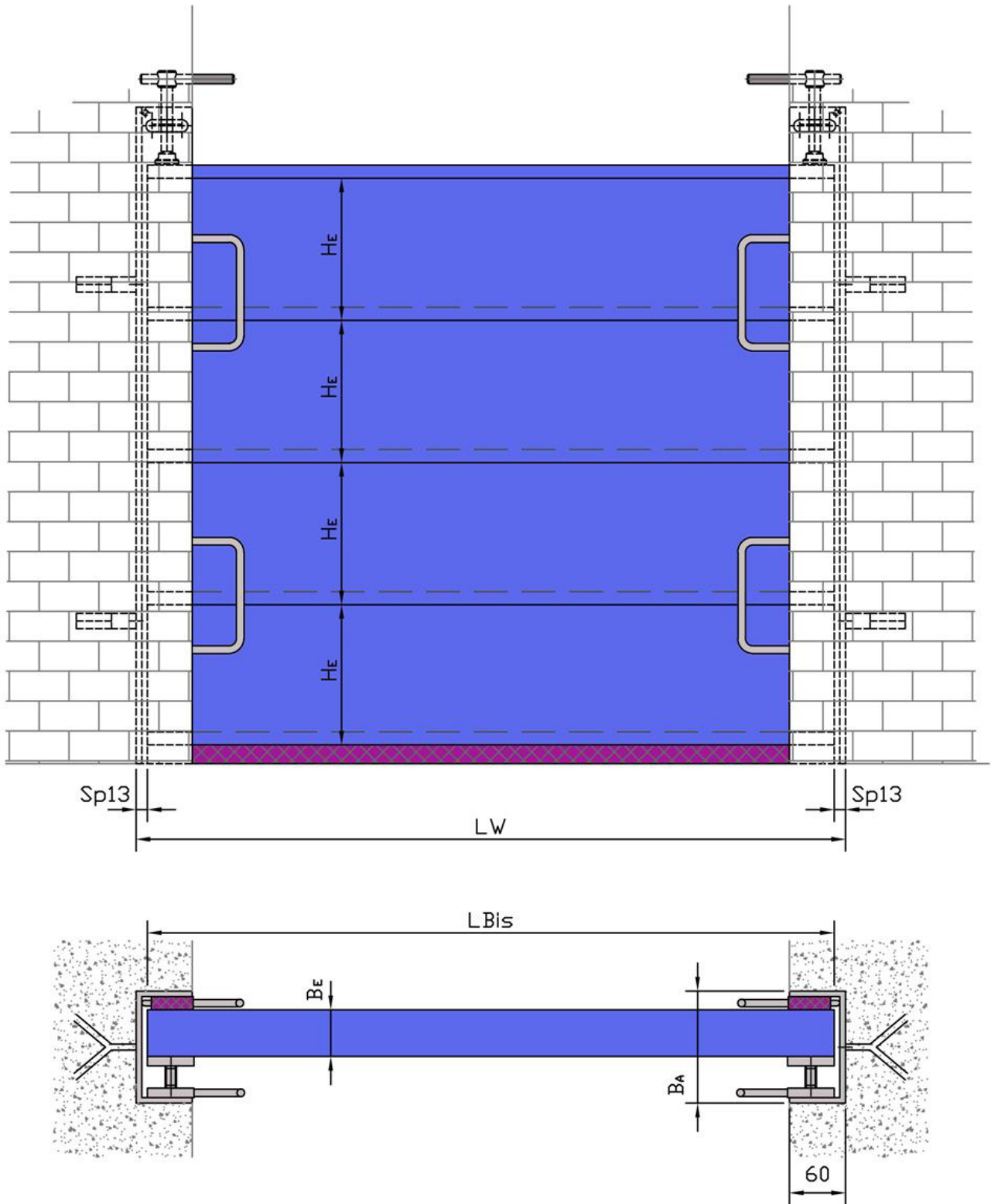
Installation inside a doorway or gate



Installation outside a doorway or gate

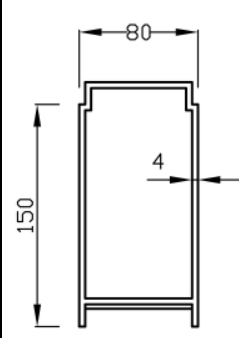
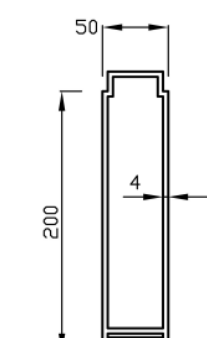
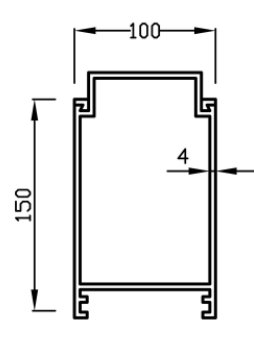


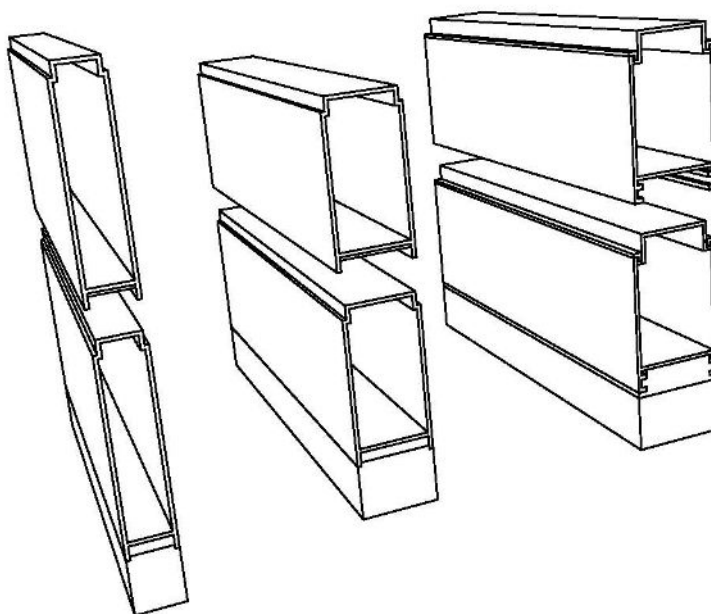
Installation flush with the building



Various barrier profiles

Material: aluminium, alloy Al MgSi 0.5

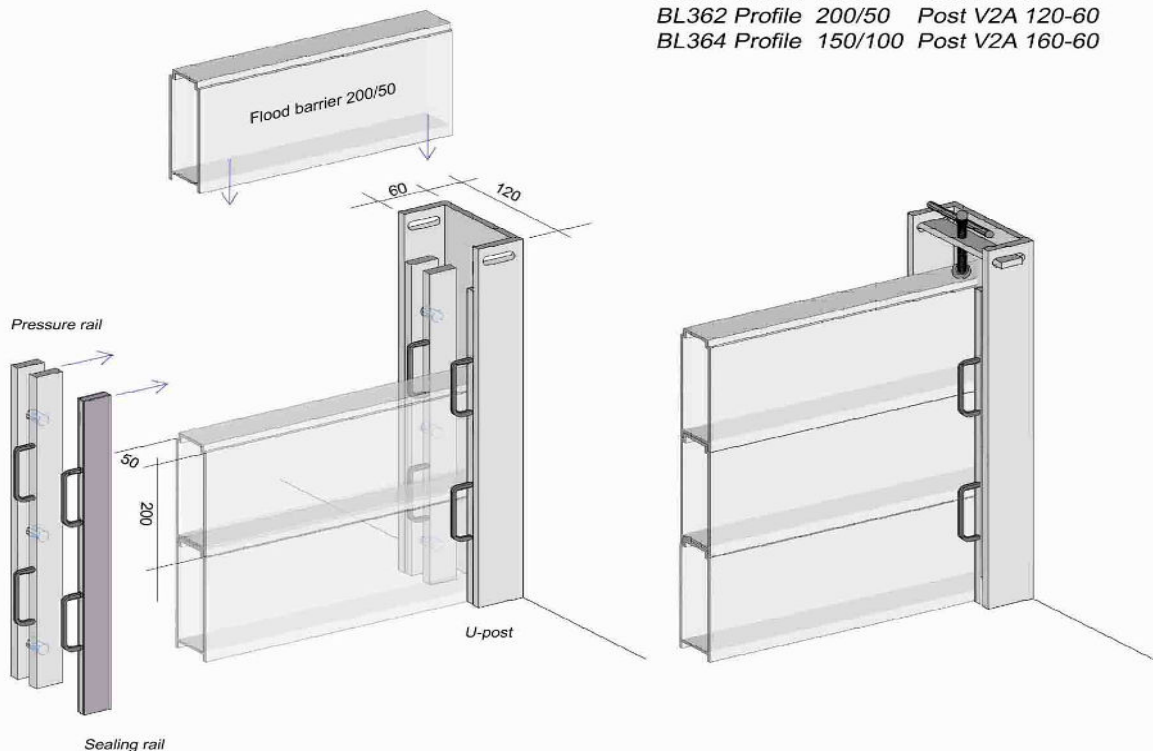
	BL361		BL362		BL364	
Aluminium body, height in mm / H _E	150		200		150	
Aluminium body, width in mm / B _E	80		50		100	
Weight per metre in kg	5.51		5.65		6.61	
Seal, stackable element	DNP 75 x 3 / No. 175375		DNP 75 x 3 / No. 175375		EPDM / No.17514068740	
Seal, ground element Sandwich seal	DND 75 x 10 / No. 1757510w DPU 80 x 60 / No. 1758060		DND 75 x 10 / No. 1757510w DPU 80 x 60 / No. 1758060		DNP 100 x 30 / No. 17610030w DPU 100 x 60 / No. 17560100	



U-shaped profiles

Material: stainless steel (X5CrNi 18-10/1,4301)

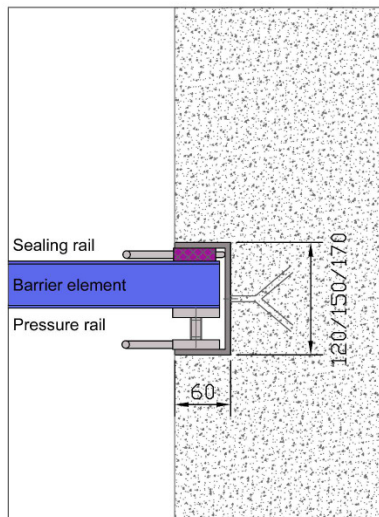
	BL361	BL362	BL364
U-shaped profile	150 x 60 x 5 mm	120 x 60 x 5 mm	160 x 60 x 5 mm
Width B _A in mm /	150	120	160
Installation inside the opening	$L_{Bi} = LW - (2 \times Sp_{13})$ $Sp_{13} = 15 \text{ mm}$		
Installation outside the opening	$L_{Ba} = LW + (2 \times Z_{13})$ $Z_{13} = 50 \text{ mm}$		
Installation flush with the masonry	$L_{Bis} = LW - (2 \times Sp_{13})$ $Sp_{13} = 15 \text{ mm}$		
Total height in mm	Retention height + 83 + 3 x number of retention barriers		
Seal	DNP 50 x 10 / No. 1751050w		



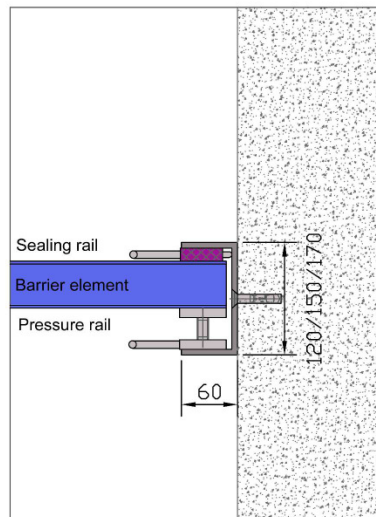
Horizontal details

Installation possibilities for the stainless-steel, U-shaped posts

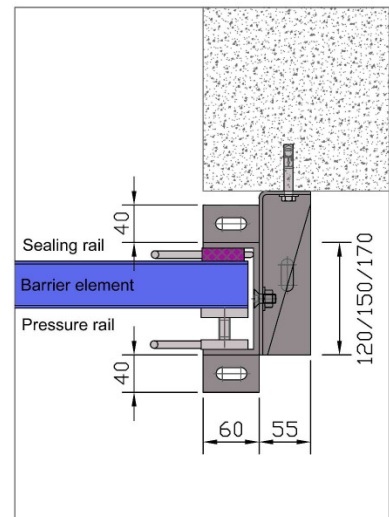
Inconspicuously concreted in,
flush with the wall. Covers
available for the posts.



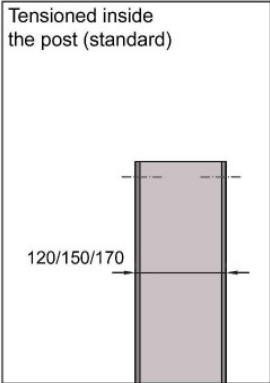
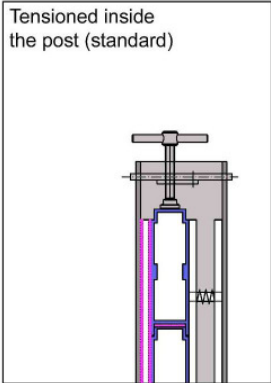
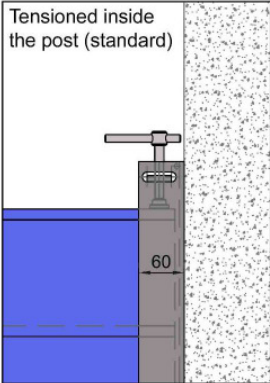
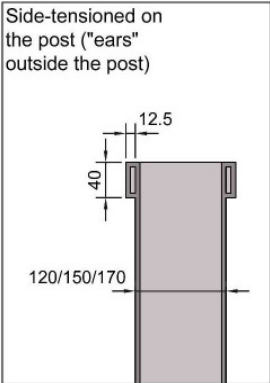
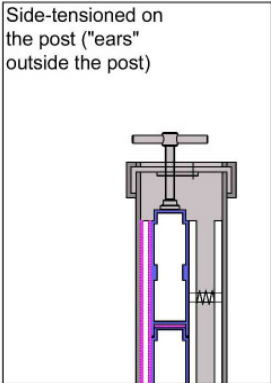
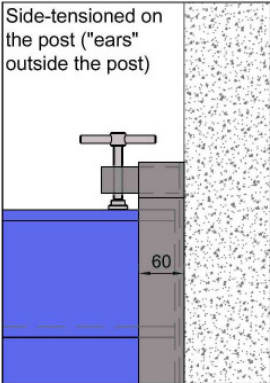
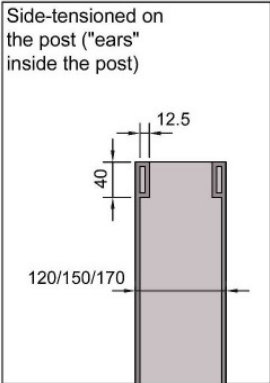
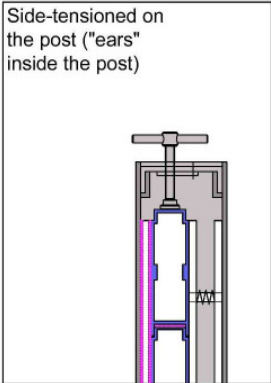
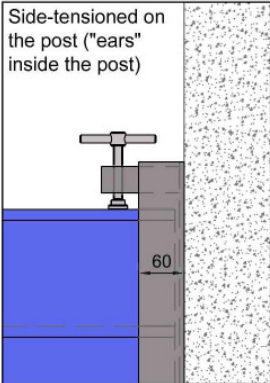
Fastened inside the opening:
dowelled directly to the opening.



Fastened outside the opening:
with wall angle.



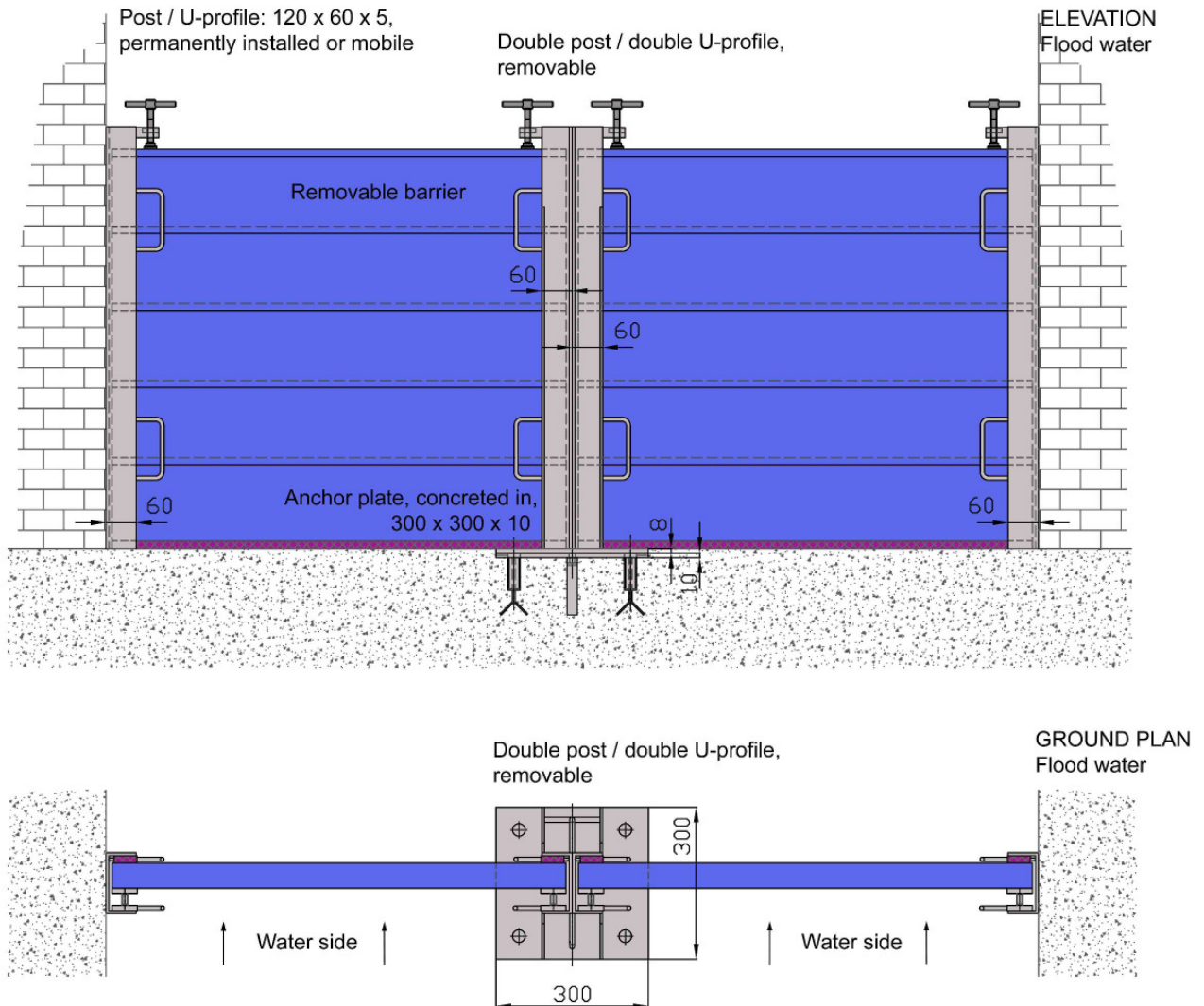
Vertical details

Contact pressure rail: variations			
Tensioned within the mounting fixture: contact pressure rail is slotted into the slits in the posts.	Tensioned inside the post (standard)  Low water	Tensioned inside the post (standard)  High water	Tensioned inside the post (standard)  60
Tensioned outside the mounting fixture: contact pressure rail is slotted into "ears" on the sides of the post.	Side-tensioned on the post ("ears" outside the post)  Low water	Side-tensioned on the post ("ears" outside the post)  High water	Side-tensioned on the post ("ears" outside the post)  60
Tensioned within the mounting fixture: contact pressure rail is slotted into "ears" located inside the post.	Side-tensioned on the post ("ears" inside the post)  Low water	Side-tensioned on the post ("ears" inside the post)  High water	Side-tensioned on the post ("ears" inside the post)  60

Span widths

BL361		BL362		BL364	
Retention height in mm	Maximum barrier length in mm	Retention height in mm	Maximum barrier length in mm	Retention height in mm	Maximum barrier length in mm
150 / 1 profile	6000	200 / 1 profile	4900	150 / 1 profile	6000
300 / 2 profiles	5500	400 / 2 profiles	4100	300 / 2 profiles	6000
450 / 3 profiles	5000	600 / 3 profiles	3050	450 / 3 profiles	6000
600 / 4 profiles	4650	800 / 4 profiles	2750	600 / 4 profiles	6000
750 / 5 profiles	4400	1000 / 5 profiles	2600	750 / 5 profiles	6000
900 / 6 profiles	4200	1200 / 6 profiles	2400	900 / 6 profiles	6000
1050 / 7 profiles	4050	1400 / 7 profiles	2300	1050 / 7 profiles	5700
1200 / 8 profiles	3900	1600 / 8 profiles	2200	1200 / 8 profiles	5500
1350 / 9 profiles	3800	1800 / 9 profiles	2100	1350 / 9 profiles	5300
1500 / 10 profiles	3700	2000 / 10 profiles	2050	1500 / 10 profiles	5100
1650 / 11 profiles	3600	2200 / 11 profiles	1950	1650 / 11 profiles	4900
1800 / 12 profiles	3550	2400 / 12 profiles	1900	1800 / 12 profiles	4800
1950 / 13 profiles	3450	2600 / 13 profiles	1850	1950 / 13 profiles	4650
2100 / 14 profiles	3400	2800 / 14 profiles	1800	2100 / 14 profiles	4550
2250 / 15 profiles	3350	3000 / 15 profiles	1750	2250 / 15 profiles	4425
2400 / 16 profiles	3300	-----	-----	2400 / 16 profiles	4350
2550 / 17 profiles	3250	-----	-----	2550 / 17 profiles	4250
2700 / 18 profiles	3200	-----	-----	2700 / 18 profiles	4150
2850 / 19 profiles	3150	-----	-----	2850 / 19 profiles	4075
3000 / 20 profiles	3100	-----	-----	3000 / 20 profiles	4000

Deployment



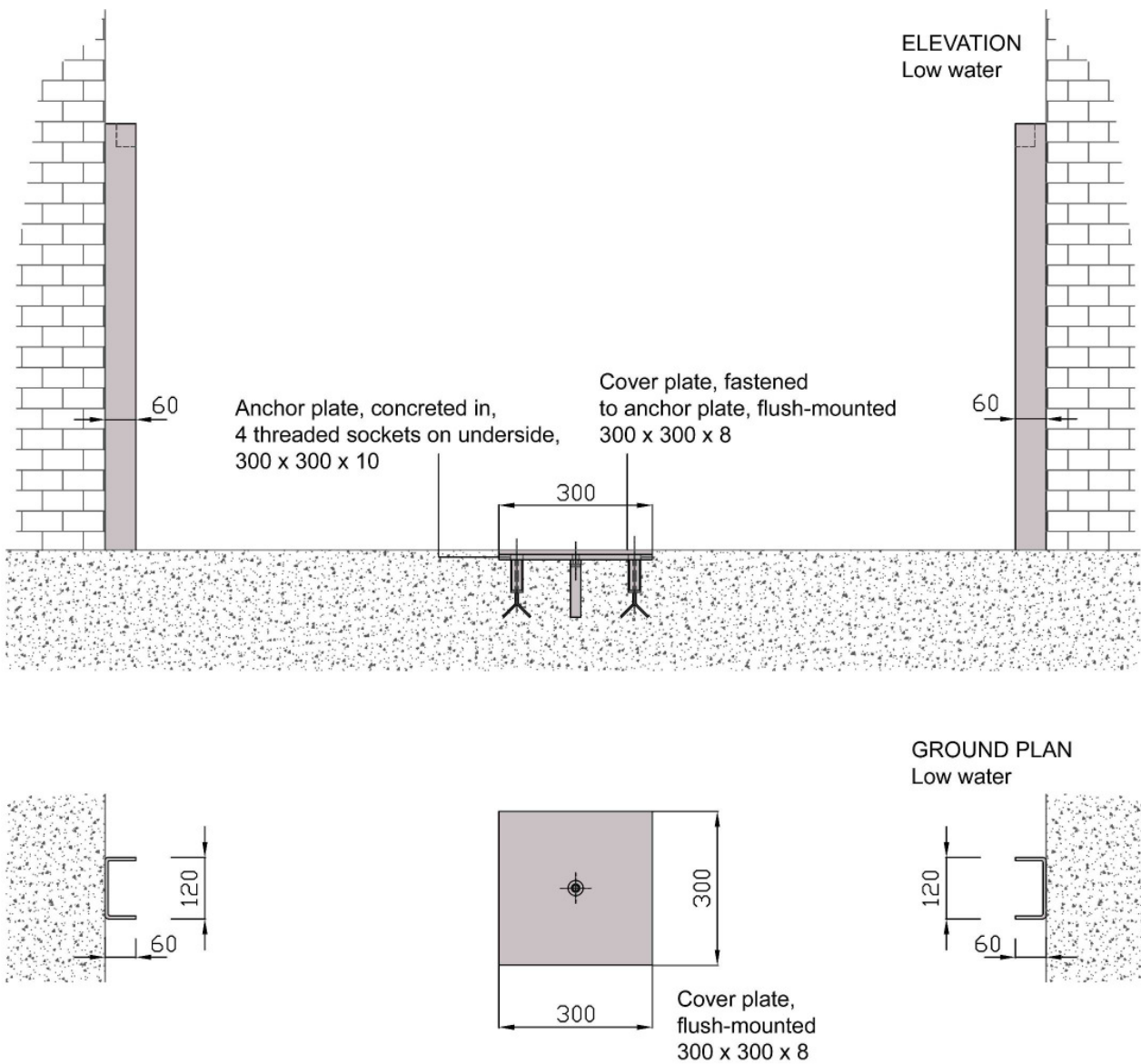
The maximum length of a mobile flood barrier is restricted by:

1. the maximum press length (= 6000 mm)
2. the maximum permissible sag, which is determined by length and retention height
3. on-site constraints (storage facilities, transport routes)

Installing a double mounting fixture makes it possible to seal openings of any length. For this purpose, anchor plates with four M20 threaded sockets on the underside are concreted into the ground at regular intervals. The mobile posts are fixed into these sockets in the event of flooding.

The double mounting fixture consists of two posts welded together at the back and a 300 x 300 mm base plate that is 8 mm thick.

Covers

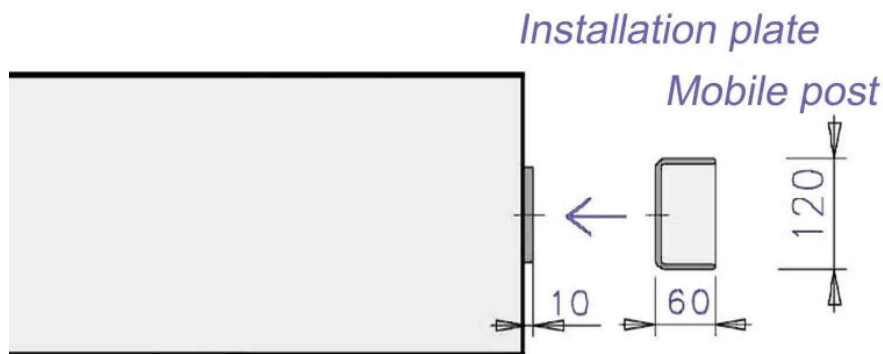


When the barrier is not needed, the ground anchor plates are protected by skid-resistant, corrugated, stainless-steel

sheeting that is recessed into the ground so that it can be driven over. Covers in other materials are available on demand.

Mobile posts

In addition to permanently installed posts, we also offer a mobile version. This variant merely involves fitting a 10-mm steel installation plate, to which the post is attached in the event of an emergency.



Installation guide

Deployment / Closure

- Fasten the mobile double posts to the anchor plate with 4 bolts
- Slot the lowest retention barrier (= the barrier with the greatest sealing capacity) into the U-shaped posts
- Insert the **sealing rail** into the U-post – on the side facing away from the water
- Repeat this process for each additional retention barrier
- Insert the **pressure rail** into the U-post
- Insert the **contact pressure rail** with bolts into the post eyelets
- Slightly compress the seal (by approx. 10–20 %) on the lowest barrier seal
- Slightly compress **the side** seal (by approx. 10–20 %) by turning apart the pressure rail

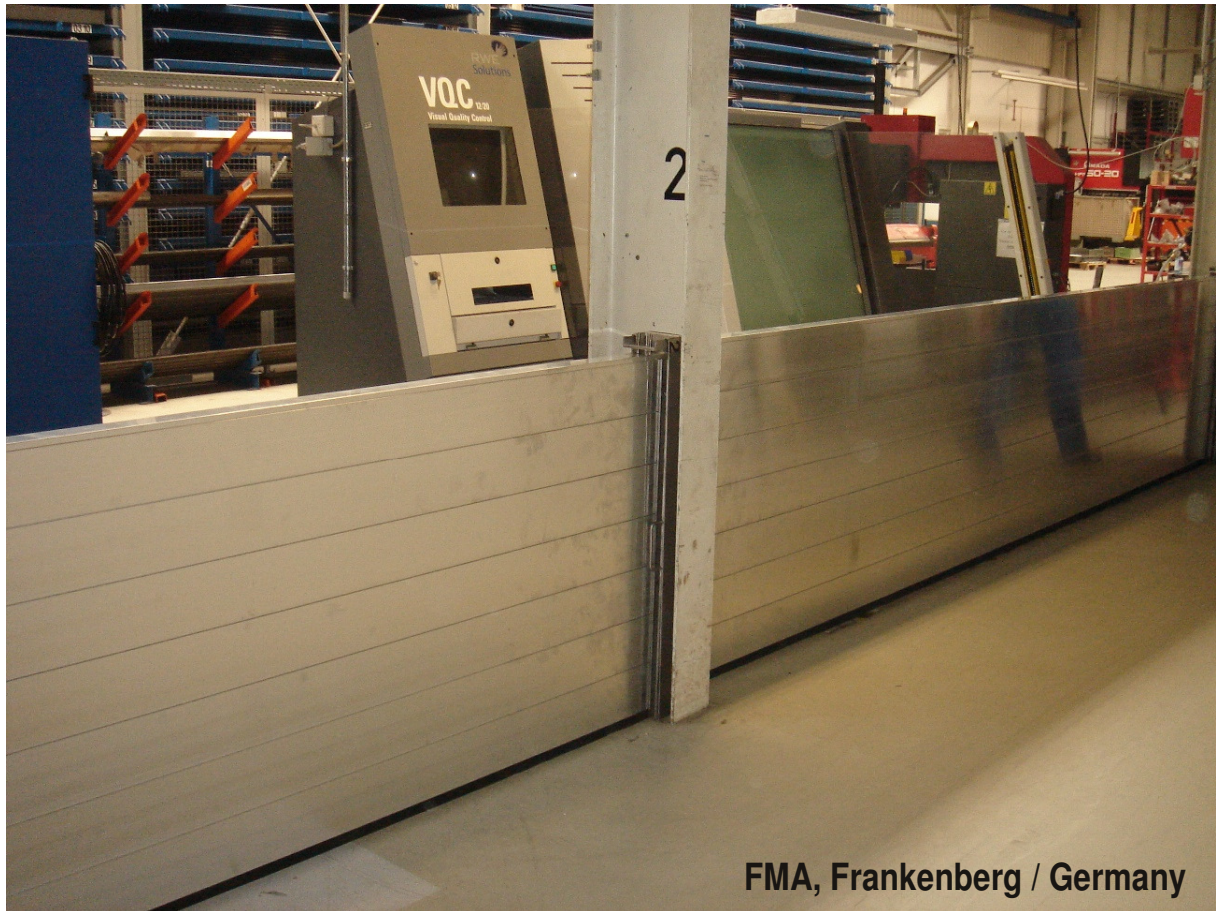
Opening / Removal

- Loosen the pressure rail
- Unscrew the bolts on the contact pressure rail
- Remove the contact pressure rail from the eyelets on the post
- Remove the sealing rail
- Remove the retention barrier
- Remove the double posts

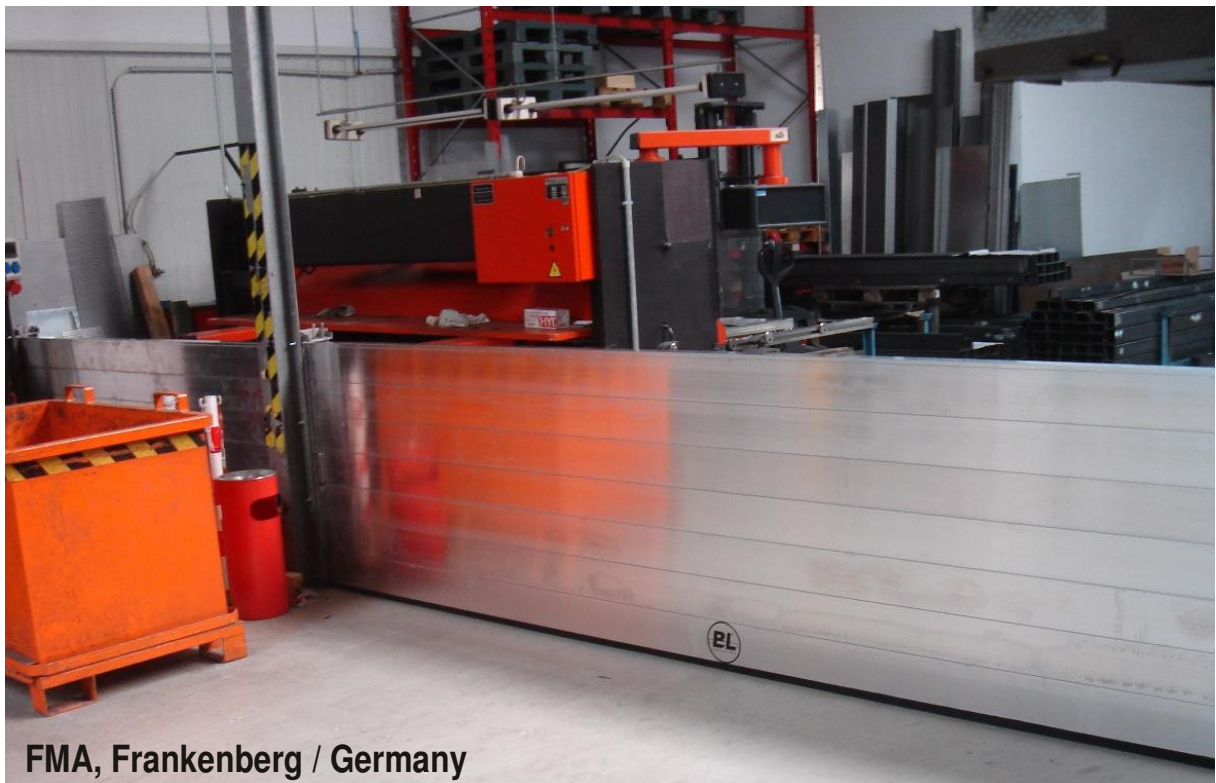
Reference examples



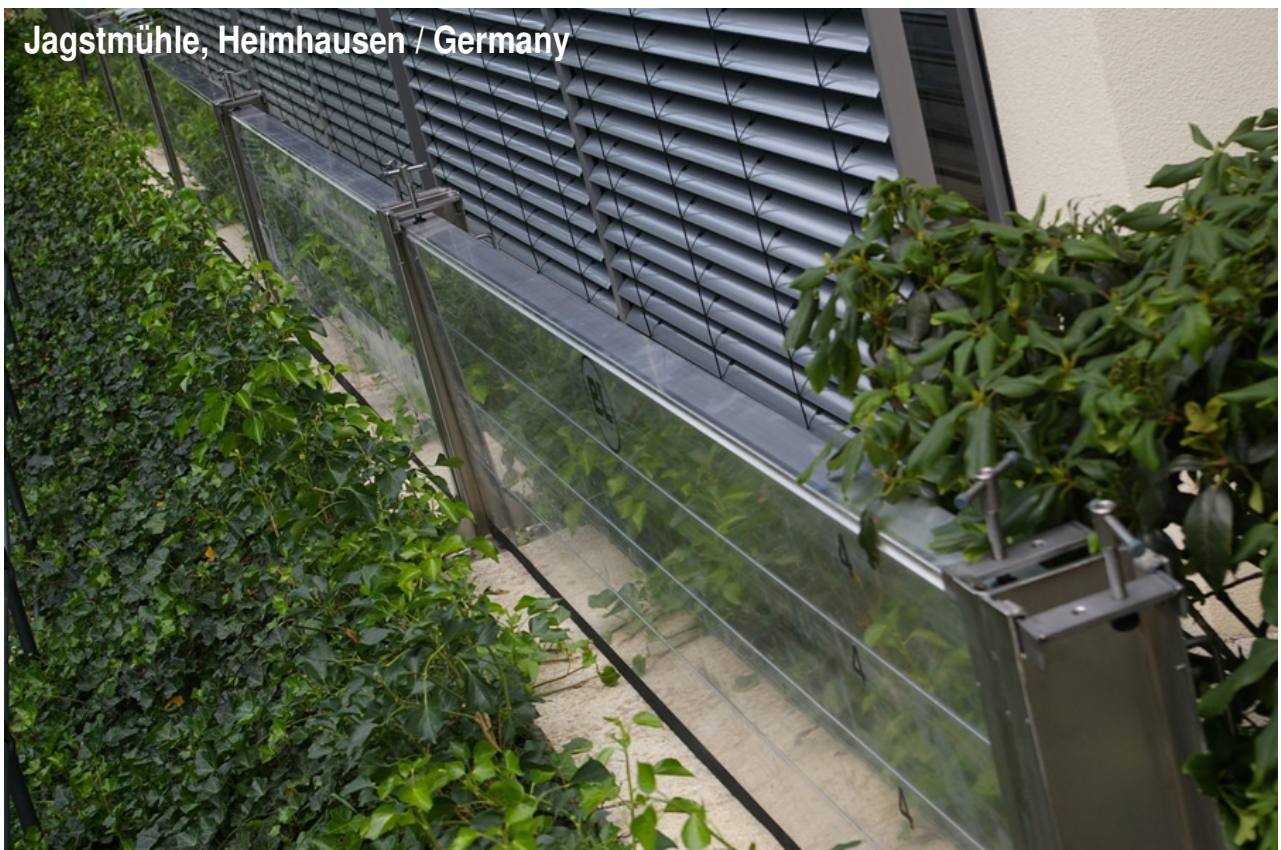




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