

Schlüter®-SCHIENE

Floor covering profiles
for reliable edge protection

1.1

Product data sheet

Application and Function

Schlüter®-SCHIENE is an extruded profile that finishes and protects the edges of tiled coverings, as well as other surfacing materials.

Applications include: transitions between different surface coverings (e.g. tile to carpet); dado coverings; edge protection at expansion joints; decorative edging for stairs; as well as a finishing profile for all types of surfaces, such as carpet, parquet, laminates, natural stone coverings, or cold cured resin coverings.

The profile's unique design combines specific angle positions and material wall thicknesses to transmit point loads into the substrate and surface covering, thus protecting the covering's edges against damage.

The joint spacer, which is integrated from a profile height of 6 mm (8 mm for SCHIENE-ES), defines a joint chamber with the tile. The anchoring leg of Schlüter®-SCHIENE, in all material types, can be punched with a special radius perforation "R" so that the profile can be used to form curves.



Material

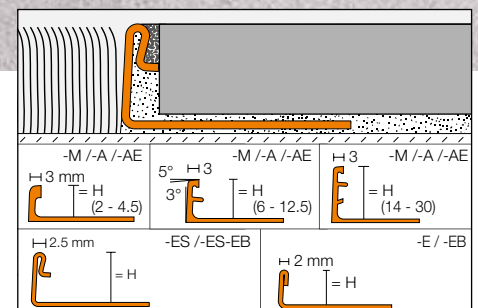
The profile is available in the following finishes:

- E = stainless steel
V2A, material no. 1.4301 = AISI 304
V4A, material no. 1.4404 = AISI 316L
- EB = brushed stainless steel
- A = aluminium
- M = brass
- AE = anodised aluminium

Material properties and areas of application

In special cases, the suitability of a proposed type of material must be verified, based on anticipated chemical, mechanical and/or other stresses.

Schlüter®-SCHIENE-M are profiles made of brass. Minor manufacturing flaws are unavoidable on their untreated surfaces. They are suitable for absorbing high mechanical stresses, e.g. as an edge protection for movement joints in industrial floor coverings with conveyor traffic. Brass is resistant to virtually all chemicals used in conjunction with tile coverings.





Exposure to moisture or aggressive substances may result in heavy oxidation and staining at the surface.

Schlüter®-SCHIENE-A are profiles made of aluminium. Minor manufacturing flaws are also unavoidable on their untreated surfaces. The suitability of the profiles should be reviewed based on the anticipated chemical stresses. Aluminium is sensitive to alkaline. Cementitious materials, in conjunction with moisture, become alkaline. Since aluminium is sensitive to alkaline substances, exposure to the alkali (depending on the concentration and time of exposure) may result in corrosion (aluminium hydroxide formation). For this reason, remove mortar or grouting material immediately from all visible areas and do not cover freshly installed coverings until the adhesive and grout have dried. In addition, ensure that the profile is solidly embedded in the setting material to prevent alkaline water from accumulating in small cavities.

In case of more demanding visual requirements, Schlüter® -SCHIENE-AE or -EB with post-treated, high-quality finishes are available.

Schlüter®-SCHIENE-AE made of anodised aluminium features an anodised finish that retains a uniform appearance during normal use. The finish may be damaged by aggressive substances or abrasive stresses. Since the effect of tile adhesive, mortar or grout may affect the finish, all contaminations must be removed immediately. Otherwise, the same description as for aluminium applies. Schlüter®-SCHIENE-E is roll formed using V2A (material 1.4301) or V4A (material 1.4404) stainless steel. Therefore, the profile's contour differs slightly from the extruded brass or aluminium profile.

Schlüter®-SCHIENE-E is highly durable and especially suited for application areas that must be resistant to chemicals and acids, such as the food industry, breweries, dairies, industrial kitchens, and hospitals.

The use of V4A is recommended if consistent exposure is expected, for example in the case of swimming pools (fresh water). Even stainless steel is not resistant to all chemicals and substances and may be affected by hydrochloric and hydrofluoric acid or certain chloride and brine concentrations. Chemical exposure should therefore be verified in advance. Depending on the anticipated chemical stresses, customers can choose between the alloy materials 1.4301 or 1.4404.

We recommend the use of 1.4404 in areas with special stresses, such as swimming pools (fresh water). Even stainless steel of quality 1.4404 is not resistant to all chemical stresses. Substances such as hydrochloric or hydrofluoric acid or certain chloride and brine concentrations may cause damage. In certain cases, that also applies to seawater pools. Special anticipated stresses should therefore always be verified in advance.

Installation

1. Select the profile according to the tile thickness.
2. Apply tile adhesive to the area where the tile covering will end, using a notched trowel.
3. Press the trapezoid-perforated anchoring leg of the profile firmly into the adhesive and align it.
4. Trowel additional tile adhesive over the trapezoid perforated anchoring leg to ensure full coverage.
5. Firmly press the adjoining tiles into place and align them in such a way that the upper profile edge is flush with the tile (the profile should not protrude over the surface of the covering; preferably, it should be approx. 1 mm below the top level of the covering). The tiles must be fully embedded in the area of the profile.
6. The tile is set to the lateral joint spacer, which creates an evenly spaced joint of 1.5 mm. In the case of profiles without joint spacer, a joint of approx. 1.5 mm is recommended.
7. Completely fill the space between the tile and the profile with grout.

Maintenance

Schlüter®-SCHIENE requires no special maintenance or care. Do not use abrasive cleaning agents on the sensitive surfaces. Oxidation films on brass or aluminium may be removed with a common polishing agent; however, they do reoccur. Damaged anodised finishes may only be repaired by recoating. Stainless steel surfaces develop a sheen when treated with a chrome polishing agent etc. Stainless steel surfaces exposed to the environment or aggressive substances should be cleaned periodically using a mild household cleaner. Regular cleaning maintains the neat appearance of stainless





steel and reduces the risk of corrosion. All cleaning agents must be free of hydrochloric and hydrofluoric acid.

Avoid contact with other metals such as steel, since this can cause rust. This also includes tools such as trowels or steel wool, i.e. tools used to remove mortar residue.

We recommend the use of the stainless steel cleaning polish Schlüter®-CLEAN-CP.

Product Overview

Schlüter®-SCHIENE

M = brass / A = aluminium / AE = anodised aluminium
Length supplied: 2.50 m

Material	M	A	AE
H = 2 mm		•	•
H = 3 mm	•	•	•
H = 4.5 mm	•	•	•
H = 6 mm	•	•	•
H = 7 mm		•	•
H = 8 mm	•	•	•
H = 9 mm	•	•	•
H = 10 mm	•	•	•
H = 11 mm	•	•	•
H = 12.5 mm	•	•	•
H = 14 mm		•	•
H = 15 mm	•	•	•
H = 16 mm	•	•	•
H = 17.5 mm	•	•	•
H = 20 mm	•	•	•
H = 21 mm		•	•
H = 22.5 mm	•	•	•
H = 25 mm	•	•	•
H = 27.5 mm		•	•
H = 30 mm	•	•	•

Length supplied: 1.00 m

Material	M	A	AE
H = 4.5 mm	•	•	•
H = 6 mm	•	•	•
H = 8 mm	•	•	•
H = 10 mm	•	•	•
H = 12.5 mm	•	•	•
H = 15 mm	•	•	•

Schlüter®-SCHIENE-E

E = stainless steel / EV4A = stainless steel 1.4404 (V4A) / EB = brushed stainless steel
Length supplied: 2.50 m

Material	E	E V4A	EB
H = 2 mm	•		
H = 3 mm	•		
H = 4.5 mm	•	•	
H = 6 mm	•	•	•
H = 7 mm	•		
H = 8 mm	•	•	•
H = 9 mm	•		
H = 10 mm	•	•	•
H = 11 mm	•	•	•
H = 12.5 mm	•	•	•
H = 14 mm	•	•	
H = 15 mm	•	•	
H = 16 mm	•	•	
H = 17.5 mm	•	•	
H = 20 mm	•	•	
H = 22.5 mm	•	•	
H = 25 mm	•	•	
H = 30 mm	•	•	

Length supplied: 1.00 m

Material	E
H = 6 mm	•
H = 8 mm	•
H = 10 mm	•
H = 11 mm	•
H = 12.5 mm	•

Schlüter®-SCHIENE-ES

Stainless steel profile with joint spacer
E= stainless steel / EB = brushed stainless steel
Length supplied: 2.50 m

Material	E	EB
H = 8 mm	•	•
H = 9 mm		
H = 10 mm	•	•
H = 11 mm	•	•
H = 12.5 mm	•	•

Length supplied: 1.00 m

Material	E
H = 6 mm	
H = 8 mm	•
H = 10 mm	•
H = 11 mm	•
H = 12.5 mm	•



**Text template for tenders:**

Supply

_____ per metre Schlüter®-SCHIENE as a transition and edge protection profile

- -M = brass
- -A = aluminium
- -AE = anodised aluminium

with a trapezoid perforated anchoring leg connected to an 87° angled finishing section, which widens to a sloped top flange and features an integrated joint spacer to create the joint cavity.

_____ per metre Schlüter®-SCHIENE-E as a transition and edge protection profile

- -E = stainless steel 1.4301 (V2A)
- -E V4A = stainless steel 1.4404 (V4A)
- -EB = brushed stainless steel 1.4301 (V2A)

with trapezoid perforated anchoring leg, angled (87°) wall section, and sloped top flange, made of roll formed stainless steel.

Profile height: _____ mm

Art.-No.: _____

- in individual lengths of _____ m
- in various lengths, as required
- as edge protection for individual fields of covering with adjacent expansion joints
- as covering surround
- to position
- according to detail drawing

and install according to manufacturer's application and working instructions.

Material: _____/m

Labour: _____/m

Total: _____/m

Text template for tenders:

_____ linear meters of Schlüter®-SCHIENE-ES as a finishing and edge protection profile made of

- -E = stainless steel 1.4301 (V2A)
- -EB = brushed stainless steel 1.4301 (V2A) with a trapezoid perforated anchoring leg with an adjoining finishing leg at an 87° angle with a double-seamed head of stainless steel strip material and a joint spacer to form a joint chamber...

Profile height: _____ mm

Art. no.: _____

- in individual lengths of _____ m
- in various lengths as required
- to protect the edges of coverings at adjoining expansion joints
- as a finishing profile
- for position
- as specified in the detail plan

...to be supplied and professionally installed while observing the manufacturer's operating and installation instructions.

Material: _____/m

Labour: _____/m

Total: _____/m