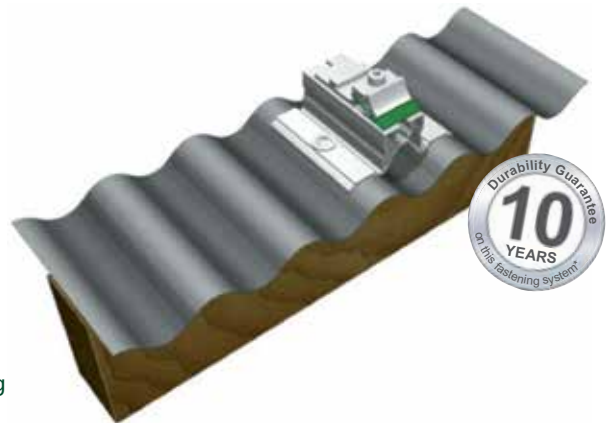


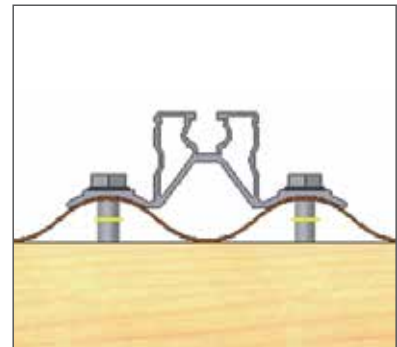
FixW-1876

The safe and economic type of fastening for corrugated sheet metal roofs with the profile design 18/76

- Quick assembly from above
- Program-generated structural verifications
- The components are made of aluminium and high-grade steel
- For roof-parallel applications
- Can be fastened both to purlins as well as on rafters with load-bearing battens¹
- Wood or metal substructure
- Suitable for corrugated metal roofs with pressure-load bearing capacity



Schletter FixW-1876 has been developed for a safe fastening of photovoltaic or solar thermal plants on corrugated metal roofs, using the profile shape 18/76 according to DIN 59231. In comparison to other mounting systems, this fastener has the advantage that under snow load it rests planarly on two corrugation crowns, resulting in an optimum load distribution onto the corrugated profile. Besides, the corrugated profile is not subject to stress by wind suction forces as these loads are transmitted directly into the substructure through the anchoring. Critical gusts and abruptly impacting squalls do not apply any extra loads on the corrugated profiles either. The fasteners can be deployed both on wood and steel constructions. A further advantage is the open area at the corrugation bottom that allows for an unimpeded run-off of rain water and avoids dirt accumulations.



Combination

FixW-1876 is usually used for installations that are parallel to the roof, combined with simple or with cross rail systems. This enables an optimum utilization of the roof area with vertical (portrait) or horizontal (landscape) arrangement of the modules. FixW-1876 is also suitable for elevations using the FixZ-7 system (see FixZ-7 product sheet). With suitable support distances in the substructures, a direct fastening of the modules is also possible, using Rapid clamps for example.

Different designs

FixW-1876 is available as a simple fastener or also combined with a pre-assembled KlickTop connector that allows for an even quicker mounting. We also offer FixW-1876 in special lengths, custom cut according to our customers' specifications. Thus, the fastener can also be utilized for special cases of application. For example if the desired fastening points are in-between two purlins or as a substitute for a vertical rail. Lengths can be chosen from 110 mm to 6000 mm. The drilled holes can then be made at the desired points on site. FixW-1876-EMU presents the convenient solution to compensate for unevenness of up to 30 mm in the roof structure.

In areas with little wind or snow, the special design FixW-1876 D4 can be used as this system is directly fastened on the corrugated metal roof by means of self-tapping screws.

Auxiliary equipment / accessories

For the fastening of FixW-1876, our product range provides self-tapping threaded screws for steel substructures and wood screws with wafer-head as well as self-tapping screws for direct fastening on the corrugated roof. You can also order suitable sealing washers for the wood screws. As an additional sealing between FixW-1876 and the metal corrugation, self-adhesive and UV-resistant EPDM rubber inlays are available on rolls.

Structural analysis

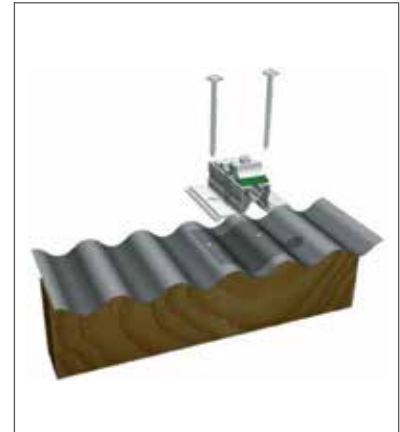
Structural analysis according to the current specific national standards (in Germany EN 1991 EC1) for installations parallel to the roof using the Schletter software tools and charts specifying the number of fastening points.

Mounting information

Before mounting FixW-1876, the roof cladding must be pre-drilled at the wave crest (corrugation crown). The tightening torque is selected according to the respective substructure; the FixW-1876 system must be securely connected to the substructure but with no risk of deformation to the corrugated profile.

A variety of load-bearing profile rails can be fastened to the FixW-1876, for example: the rails Eco05, Solo05, Profi05, ProfiPlus05, DN0, DN1, DN2.5 or the supplementary elevation system FixZ-7. The rail length should be limited to 10 m in view of the thermal expansion.

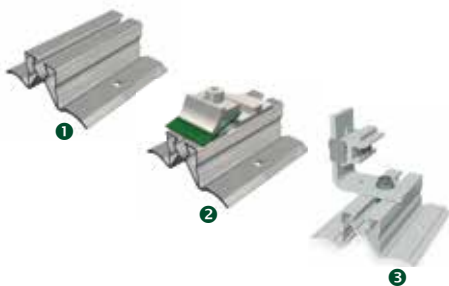
Where self-tapping screws are applied to a steel profile substructure, the steel substructure must be pre-drilled according to its thickness.



Steel profile thickness	Drilling diameter
up to 4 mm	6.8 mm
up to 11 mm	7.0 mm
11 mm or more	7.2 mm

- ❶ Pre-drill the corrugated profile with a diameter $d=10$ mm, if required, also pre-drill the steel substructure.
- ❷ Position the FixW-1876 and fasten it using self-drilling wafer-head screws in wood substructure or using self-tapping threaded screws in steel substructures.

Component overview



FixW-1876 for mounting on the substructure

❶	111013-002	FixW-1876
❷	111013-003	FixW-1876 KlickTop
❸	111013-004	FixW-1876-EMU (height-adjustable profile mounting)
	128013-001	FixW-1876 custom cut
	911000-279	FixW-1876 6m profile

Mounting on wood substructure (2 pcs per fastener)

943208-080	Wood screw with wafer-head VA 8x80
943208-100	Wood screw with wafer-head VA 8x100
943208-120	Wood screw with wafer-head VA 8x120
943208-160	Wood screw with wafer-head VA 8x160
943208-200	Wood screw with wafer-head VA 8x200
119016-000	Seal for wafer-head screws diam 8 EPDM





Mounting on steel substructure, thickness of min. 1.5 mm (2 pcs per fastener)

943718-064	Self-tapping threaded screw	8x64
943718-100	Self-tapping threaded screw	8x100
943718-125	Self-tapping threaded screw	8x125
943718-150	Self-tapping threaded screw	8x150
943718-200	Self-tapping threaded screw	8x200



FixW-1876 for direct mounting on the corrugated roof profile

111013-005	FixW-1876 D4
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Direct mounting on the corrugated roof profile (4 pcs per fastener)

943000-700	Self-tapping screw JF3-2/A2	5.5x25
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Further accessories



EPDM rubber inlay 3 mm self-adhesive, UV-resistant

973000-013	10 m roll, 25 mm wide
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Please note:

FixW-1876 is designed exclusively for roof areas where corrugated sheeting is deployed for the entire covering. The application of the product on corrugated sheets in roof openings (partial PV roof integration) may require the approval of the patent owner EP1985944B1.

¹ Edge distances and screwing depths have to be adhered to according to the structural requirements of the valid technical standards.

System prices can be obtained quickly and easily with our auto-calculator!
Please find further information and our declaration of warranty at: www.schletter.eu

*in accordance with our General Terms and Conditions of Sale and Supply (www.schletter.de/AGB_en)
Subject to changes and/or technical modifications.