

## SYSTEM DESCRIPTION MIGUTAN EXPANSION JOINT CONSTRUCTIONS WITH EXCHANGEABLE CENTRE SEAL

FOR SEALING AGAINST NON-PRESSURIZED WATER

### Uses

MIGUTAN expansion joint covers have been in use for more than 30 years for sealing purposes in multi-storey car parks, parking decks (open air), underground car parks, swimming pools, industrial kitchens, pedestrian bridges, airports etc.

A wide variety of reference objects can be proven.

### Special features

**Aluminium expansion joint covers** with grooved aluminium brackets, elastic centre seal and, on both sides, long, short or concealed AAS sheets of MIGUFLEX quality, wear-proof, weather-proof, resistant to de-icing salt, and good resistance to waste water (hydrogen sulphide, microbes, bacteria) The AAS sheets can be used with hot bitumen.

Joint covers with 300 mm AAS sheets on both sides (both sides with grooves, ensuring best-possible adhesion with area seal), for watertight incorporation in various sealing systems in accordance with DIN 18195 (e.g. sheet seals, bituminous seals and surface protection systems etc.) Anti-sliding thanks to structured stainless steel surface.

**Solid stainless steel caps** ensure, the compression of the sealing elements, thanks to screw attachment using the appropriate torque. Fixture of stainless steel caps with torque guarantees permanently uniform compression.

**Exchangeable centre seal:** Elastic, weather, petrol, oil and de-icing salt resistant, watertight weldable centre seal with double-web to ensure two-fold security to prevent ingress of water.

The centre seal can be exchanged at any time, even when installed, without damaging the surface.

Absolutely no ingress of damp or de-icing salt through the centre seal at the level of the upper edge of the finished floor.

**Full sealing elements** across the entire expansion joint, ensuring 100% watertight seal.

**Test certification:** A General Building Inspectorate Test Certificate has been granted for our waterproof expansion joint covers of the FP 90 series. This certificate serves a proof of usability according to German construction law.

**Fire protection:** The products FP 80 NI, FP 90 NI, FPG 90 NI, FP 110 NI, FPG 80 and FPG 110 have been subjected to comprehensive fire testing at MPA NRW. These tests were passed in accordance with the test certificate and test report number 230007088. In accordance with EN 13501-1 all products are classified in accordance with Bfl-s1 (flame-resistant floorings, do not burn/drip).



**Intersections and connections** can also be made watertight even for the most complicated of expansion joints. We guarantee joint cover accuracy thanks to on-site measuring (factory system prefabrication including all intersections, transitions and connections). Joints appropriate in height and thus ensuring ongoing stability thanks to factory-prepared couplings in metal construction.

**Suitability in accordance with WHG § 19:** For applications to be executed in accordance with WHG § 19, we offer a special solution. Please contact us if this is required!

### Application recommendations

**Mastic asphalt:** When using in mastic asphalt the 25 mm height expansion joint covers should be used only as connection joint on the basis of the low protrusion (vertical expansion joint cover).

**Minimum expansion joint widths:** Due to the shape of the centre seal, minimum expansion joint widths are to be adhered to for the following expansion joint covers:

- 50 mm for FP 110/25 NI
- 75 mm for FP 130/25 NI and FP 130/35 NI
- 95 mm for FP 155/... with joint heights of less than 80 mm

**Fixture/dowelling:** For the fixture of expansion joint heights 35 mm and 45 mm in conjunction with long AAS sheets, counter-sunk screws of type MMS-F 7.5 x 80 are to be used. Gap between dowels approximately 300 mm.

For the following joint covers, the dowels must be used on both sides with a gap of approximately 300 mm:

- FP 80/25 NI with short AAS foils
- Series FP.../60 S NI.

For all other expansion joint covers, the gap between dowels is approximately 350 mm as standard.

### Cover plates:

**MIGUTAN in the swimming pool sector:** If the MIGUTAN expansion joint constructions are used in a swimming pool area, due to the required chloride resistance, a higher quality stainless steel alloy must be employed. This must also be pickled. Thus, this area of use must always be specified for tenders and inquiries!

**Stainless steel cover caps:** After 10 to 14 days, tighten all screws of the stainless steel cover caps with a torque wrench (7 Nm).

Please request our installation and assembly instructions. Alternatively, there is a download function available on the Internet ([www.migua.com](http://www.migua.com)).

**Expansion joint cover anchoring using anchor rods or loop anchors:** To secure to filigree plates, the expansion joint covers may be supplied with adjustable brackets fitted at the factory.

The connection of the individual lengths on the construction site is carried out using the pins installed at the factory. This ensures the height and side transitions of the individual joint lengths are the same.

For weight reasons and due to the improved handling, we recommend axial separation when assembling MIGUTAN expansion joint covers with loop anchors.

To securely fix the expansion joint construction, the anchoring rods or loops must be welded with the reinforcement. In the upper section, alongside the stainless steel caps, a gap must be left on both sides as expansion joint (approximately 10 x 20 mm) between the joint cover and the concrete. This must subsequently be filled with a suitable PU sealant to ensure it is watertight (3-flank adhesion). These expansion joints can be made economically and cleaning using the AAP 50/20 connection joint filler joint.

The **load specifications** of air-filled and rubberised tyre trucks apply to for a wheel contact patch of 200 x 200 mm.