

SYSTEM DESCRIPTION MIGUTAN EXPANSION JOINT CONSTRUCTIONS WITH EXCHANGEABLE CENTRE SEAL

FOR SEALING AGAINST NON-PRESSURIZED WATER

Areas of application

MIGUTAN expansion joint covers have been used for more than 40 years for waterproofing in car parks, parking decks (exposed to weather), underground car parks, swimming pools, canteen kitchens, footbridges, airports etc. A large number of reference projects can be verified.

Special features

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

To ensure watertightness, the watertight Migutan expansion joint covers must be connected to the on-site waterproofing in accordance with DIN 18531, 18532, 18533 or to the waterproofing surface protection system. The double-sided connection sheets of the expansion joint covers are available for coating (short AAS sheets), bituminous layer (long AAS sheets, 300 mm long) as well as liquid sealings, mineral or bituminous liquid membranes/waterproofing slurry (XA sheets = Fibre fabric bonded sheets). The special design of the of the respective connecting sheets ensures the best possible bonding with the adjacent surface waterproofing.

Solid stainless steel caps Solid stainless steel caps are adapted to the requirements of the usage and are made of high-quality material 1.4301. Stainless steel 1.4571 or other material qualities are available upon request.

Screwing the stainless steel caps (Ni caps) to the profiles with a defined torque ensures that the sealing inserts are evenly compressed with the connecting sheets, thus guaranteeing permanent watertightness (see also sketch of the expansion joint cover set-up structure on page 7). For reasons of slip resistance, the surface of the Ni caps is additionally structured.

Exchangeable centre seal: Elastic, weather-proof, petrol, oil and de-icing salt resistant, watertight weldable centre seal with double-web to ensure two-fold security against 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. Therefore, the expansion joints remain dry within the joint.

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

Fully leveled connection of the joint covers by means of connection pins or by sliding the fixing legs into each other. Factory-mounted spacer brackets ensure optimally adjusted joint covers - for economical installation and functionally reliable positioning of the joint cover construction. Factory-made pre-settings of the joint covers are available upon request - thus maximising the one-sided movement absorption.

Fire protection: The products FP 80 NI, FP 90 NI, FPG 90 NI, FP 110 NI, FPG 80, FPG 110 and FP 130 have been subjected to comprehensive fire testing at MPA NRW (Material testing institute of Northrhine-Westfalia, Germany). 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). The FP 155 was newly classified with Bfl-s2.



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

Suitability in accordance with German law of water protection

WHG § 19: For applications to be executed in accordance with WHG § 19, individual solutions are available. Please contact us, if required.

Recommendations for application

Stainless steel cover caps: Re-tighten all fastening screws of the stainless steel cover caps by means of a torque wrench (7 Nm) after approx 14 days.

Mastic asphalt: When using in mastic asphalt, joint covers in 25 mm height should be used only as end profile in the wall area (upright joint) due to their little overlap.

Coatings: in case you plan to use Migutan expansion joint covers with short sheets on open decks and with a joint cover height of 25 mm, kindly ask for our technical advice.

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

Cover plates: When using expansion joint covers with cover plates, there is no absorption of settlement movements.

MIGUTAN in the swimming pool sector: In case MIGUTAN expansion joint constructions are used in swimming pool areas, the required chloride resistance call for a higher quality stainless steel alloy that has to be pickled (stained). Therefore, please mention this area of use specifically for tenders and inquiries!

Increased hygienic requirements: For use with increased hygienic hygienic requirements in e.g. swimming pools, hospitals or retirement homes, hygienically safe, even movement inserts of the types FPG 80, FPG 90 and FPG 110 are available. This system is physiologically flawless, especially in combination with the sealing stainless steel caps.