

PRODUCT DATA SHEET

Sika Waterbar® - PVC-P Recyclate

Waterbars based on recycled PVC-P for for joint sealing in watertight concrete construction according to factory standard.

DESCRIPTION

Sika Waterbar PVC-R are waterbars made from recycled PVC-P, which are products designed to be used for the sealing of movement and construction joints in new reinforced concrete structures. They are available in a range of different types, shapes and sizes to suit internal and external applications in different areas of use. They are not compatible or suitable for use in contact with bitumen or bitumen based waterproofing materials.

USES

- Watertight joint sealing in new reinforced concrete structures, including products as solutions for both movement (expansion) and construction joints
- Typical structures that are built using Sika Waterbar PVC-R joint sealing solutions are all types of residential and commercial building basements

FEATURES

- Cost-effective range of products
- Suitable for medium levels of hydrostatic pressure and exposure / stress
- Resistant to all natural mediums in soil and the groundwater, including acidic and alkaline conditions
- Weldable

CERTIFICATES AND TEST REPORTS

Manufacturer's test certificates provided, other certificates by agreement. Approved type as above standards.

PRODUCT INFORMATION

| | |
|--------------------|--|
| Composition | Recycled Polyvinyl Chloride Plasticized, not bitumen resistant |
| Packaging | <ul style="list-style-type: none"> ▪ Standard rolls 20 or 25 m dependent on profile, on euro or disposable pallets ▪ Prefabricated formpieces supplied on euro or disposable pallets dependent on size |
| Shelf life | The product does not expire if stored correctly |

Storage conditions

- To be stored on the pallets as supplied on a flat base
- For long-term storage ≥ 6 months in enclosed areas: The storage area should be covered, cool, dry, free from dust and moderately ventilated. The Sika Waterbars PVC-R must be protected from heat sources and strong artificial lights with a high UV content
- Short-term storage > 6 weeks and < 6 months in enclosed areas on construction sites, outdoors: As for long-term storage i.e, in dry storage protected by suitable covers from direct sunlight, snow and ice or any other form of contamination, store separate from other potentially harmful materials, plant and equipment such as structural steel, reinforcement or fuels etc., store away from traffic and site roads in a dry area
- Short-term storage ≤ 6 weeks on construction sites, outdoors: Protected from contamination or damage, protected by suitable covers from strong sunlight and snow or ice etc.

| | |
|-----------------------|-------|
| Appearance and colour | Black |
|-----------------------|-------|

TECHNICAL INFORMATION

| | | |
|---------------------|---------------------------|-------------------|
| Shore A hardness | 83 \pm 5 | DIN 53505 |
| Tensile strength | ≥ 8 MPa | DIN EN ISO 527-2 |
| Elongation | ≥ 250 % | DIN EN ISO 527-2 |
| Service temperature | For pressurised water | - 20°C bis + 40°C |
| | For non pressurised water | - 20°C bis + 60°C |

Chemical resistance

Exposure to different temperatures and chemicals:
For special stresses or exposure to different temperatures and/or chemical mediums outside the substances or situations specifically defined in DIN 4033, separate tests are always necessary.

SYSTEM INFORMATION

System structure

The information for the below mentioned waterbar types regarding joint movement and water pressure are given on special request.

Internal Construction Joint Waterbars

| Type | Total width (mm) | Width of movement part (mm) | Thickness of movement part (mm) |
|--------|------------------|-----------------------------|---------------------------------|
| A 15 R | 150 | 45 | 2.3 |
| A 19 R | 190 | 75 | 2.6 |
| A 24 R | 240 | 85 | 2.8 |
| A 32 R | 320 | 110 | 3.5 |
| A 40 R | 400 | 120 | 4.5 |

Internal Expansion Joint Waterbars

| Type | Total width (mm) | Width of movement part (mm) | Thickness of movement part (mm) |
|--------|------------------|-----------------------------|---------------------------------|
| D 15 R | 150 | 50 | 3 |
| D 19 R | 190 | 75 | 3 |
| D 24 R | 240 | 85 | 3 |
| D 32 R | 320 | 110 | 4 |
| D 40 R | 400 | 125 | 5 |
| D 50 R | 500 | 172 | 6 |

External Construction Joint Waterbars

| Type | Total width (mm) | Width of movement part (mm) | Thickness of movement part (mm) |
|---------|------------------|-----------------------------|---------------------------------|
| AF 19 R | 190 | 88 | 2.6 |
| AF 24 R | 240 | 90 | 2.8 |
| AF 32 R | 320 | 104 | 3.5 |

External Expansion Joint Waterbars

| Type | Total width (mm) | Width of movement part (mm) | Thickness of movement part (mm) |
|---------|------------------|-----------------------------|---------------------------------|
| DF 19 R | 190 | 92 | 2.8 |
| DF 24 R | 240 | 90 | 3 |
| DF 32 R | 320 | 104 | 3.5 |

BASIS OF PRODUCT DATA

All technical data stated in this Data Sheet are based on laboratory tests. Actual measured data may vary due to circumstances beyond our control.

ECOLOGY, HEALTH AND SAFETY

For information and advice on the safe handling, storage and disposal of chemical products, users shall refer to the most recent Material Safety Data Sheet containing physical, ecological, toxicological and other safety-related data.

To select an appropriate protective equipment under www.sika.de our info datasheets are available: "General information on OSH" (Code 7510) and "General information on the wearing of protective gloves" (Code 7511).

APPLICATION INSTRUCTIONS

APPLICATION METHOD / TOOLS

General

Only butt joints should be formed on site with Sika Waterbars PVC-R.

Prefabricated formpieces:

Standard formpieces (flat or vertical) for Sika Waterbars PVC-R include: Cross pieces, T-pieces, L-pieces. Prefabricated formpieces help to reduce the required butt joints on site to a minimum.

Special formpieces:

Combined formpiece systems using combinations of different standard connections and profiles. The standard maximum total length of formpiece system is 20m maximum. Longer formpiece systems on request.

Handling:

- Careful transport and handling on site
- Installation at ambient and waterbar material temperatures $\geq 0^{\circ}\text{C}$
- Protection until the waterbar system is fully cast in the concrete
- Special care must be taken with the waterbar system ends
- Waterbars must be cleaned before casting in

Detailed information on installation is given in the relevant method statement and instruction for use. If there are very high stresses or difficult concreting conditions, the waterbars can be combined with integrated injection hoses installed locally on the lateral anchoring ribs to additionally inject / grout around the cast-in parts at a later date.

Jointing on site:

The Sika Waterbars PVC-R are butt jointed by welding. Jointing with adhesives is not permitted.

Requirement: Minimum ambient temperature $+ 5^{\circ}\text{C}$ and dry weather conditions.

Site joints must be formed only by trained and qualified personnel. The welding training certificates are valid for 2 years.

Training courses leading to certification are run by Sika Deutschland GmbH, Stuttgart.

LOCAL RESTRICTIONS

Note that as a result of specific local regulations the declared data and recommended uses for this product may vary from country to country. Consult the local Product Data Sheet for exact product data and uses.

LEGAL NOTES

The information, and, in particular, the recommendations relating to the application and end-use of Sika products, are given in good faith based on Sika's current knowledge and experience of the products when properly stored, handled and applied under normal conditions in accordance with Sika's recommendations. In practice, the differences in materials, substrates and actual site conditions are such that no warranty in respect of merchantability or of fitness for a particular purpose, nor any liability arising out of any legal relationship whatsoever, can be inferred either from this information, or from any written recommendations, or from any other advice offered. The user of the product must test the product's suitability for the intended application and purpose. Sika reserves the right to change the properties of its products. The proprietary rights of third parties must be observed. All orders are accepted subject to our current terms of sale and delivery. Users must always refer to the most recent issue of the local Product Data Sheet for the product concerned, copies of which will be supplied on request.