PU Injection Resins

WEBAC® PURseal M

Range of Application

- Anchor bonding
- Subsoil and rock mass stabilization
  - Solidification of rock and stabilization of soil
  - Reinforcement of foundation
  - Ground consolidation of existing buildings
  - Lifting of concrete slaps
  - Slope stabilization
- Securing of foundation pits and tunnel systems
  - Quick stopping of flowing water and durable sealing
  - Stabilization and connection of tubbings to rock mass
  - Waterproofing against pressing water in fractured rock and loose ground
  - Underground securing of retaining walls in road construction
  - Consolidation and sealing of flood protection systems, road and railway embankments
- Permanent sealing

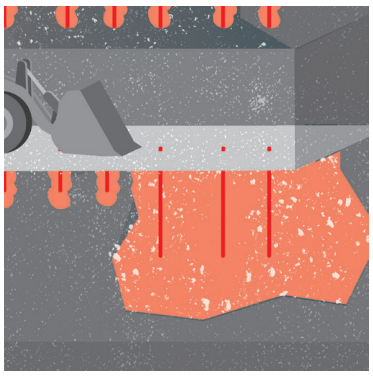
Properties

- Polyurethan-based injection resin
- Cures without water contact to form a compact and high strength material
- Extremely fast development of high strengths
- Slight foam formation upon contact with water
- Reaction time and foaming activity adjustable (**WEBAC® PUR***seal M ACC3* and **WEBAC® PUR***seal M SF*)

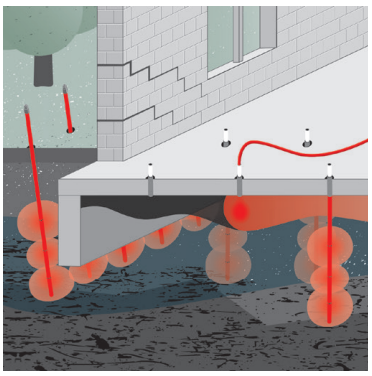
Test Certificates

- German Mining Approval (LOBA E 62.12.22.67-2013-1)
- Test certificate according to KTW recommendations: B (containers)
- UBA-KTW (repair system for containers)
- Environmental Product Declaration (EPD)

Examples



Consolidation and sealing



Subsoil stabilization

WEBAC-Chemie GmbH
Fahrenberg 22
22885 Barsbüttel
Germany
Tel. +49 40 67057-0
Fax +49 40 6703227
info@webac.de

www.webac.de

Technical Information

PU Injection Resins

WEBAC® PURseal M

Technical Data	Values	
Mixing ratio		1 : 1 parts by volume
Density, 23 °C (DIN ISO 2811)	Comp. A Comp. B	≈ 1.02 g/cm³ ≈ 1.23 g/cm³
Viscosity, 23 °C (DIN ISO 3219)	Comp. A Comp. B	≈ 280 mPa·s ≈ 260 mPa·s
Reaction time Flow limit · Solid		23 °C ≈ 80 s · ≈ 100 s
Compressive strength, uniaxial, 24 h, 21 °C at 10% compression (DIN EN 196-1)		≈ 60 MPa (N/mm²)
Bending tensile strength, 24 h, 21 °C at 10% compression (DIN EN 196-1)		≈ 60 MPa (N/mm²)
Tensile strength, 7 d, 21 °C (DIN ISO 527)		≈ 30 MPa (N/mm²)
Shore hardness D, 21 °C (DIN ISO 868)	3 h 24 h	≈ 80/75 ≈ 88/85
Heat development*, 30 °C		max. 145 °C
Density, cured material (DIN ISO 2811)		≈ 1.09 g/cm³
Ultimate strength (based on DIN EN 196)		Bonding strength ≥ 10 MPa (N/mm²)
Flashpoint (DIN ISO 2719)	Comp. A Comp. B	> 160 °C > 200 °C
GISCODE		PU40
EPD		EPD-FEI-20220021-IBG1-EN
Exposure scenarios according to REACH		Assessment of industry standard application

* free temperature development with 200 g of material

The specified data are values determined under laboratory conditions and are subject to a certain fluctuation. Deviations are possible in practice depending on the respective object situation.

WEBAC-Chemie GmbH
Fahrenberg 22
22885 Barsbüttel
Germany
Tel. +49 40 67057-0
Fax +49 40 6703227
info@webac.de

www.webac.de

Technical Information

PU Injection Resins

WEBAC® PURseal M

Preparatory Work

- Check the injectability of the rock, subsoil or building structure
- Determine a remediation concept in accordance with the applicable rules and standards
- Carrying out a test injection if necessary

Application Instruction

- Injection by 2C pump
- We recommend storing the components at a minimum temperature of 15 °C for at least 12 hours prior to use to ensure optimum application performance
- Protect components from moisture penetration (skin formation, pump-damaging precipitates, foam formation due to moisture)
- Only use pure WEBAC material without any residues of cleaning agents or other impurity
- The reaction speed is influenced by the temperature of the material and the building structure – higher temperatures accelerate, lower temperatures slow down the reaction

Only use injection pumps for one type of material (silicate resin or polyurethane resin). When changing the material, the pump must be cleaned thoroughly and all material and cleaning agent must be removed entirely. For further information, please contact WEBAC.

Mixing

- Fill component A and B into the respective hoppers of **WEBAC® IP 2K-PU** or process directly from the containers (**WEBAC® IP 2K-40**)
- Components are mixed by a static mixer in the mixing head

Application

- Depending on application

We will be pleased to advise you.
Please contact us! Phone +49 40 670 57-0

Cleaning

- When interrupting work for a short period of time the mixing head can be cleaned with component A of the injection material
- When interrupting work for a longer period of time and after conclusion of the injection process it is necessary to rinse the hoses and the pistons of both components with **WEBAC® Cleaner A**
- Observe the technical data sheet of the injection pump and cleaners used
- For detailed information refer to the operating manual of the injection pump

WEBAC-Chemie GmbH
Fahrenberg 22
22885 Barsbüttel
Germany
Tel. +49 40 67057-0
Fax +49 40 6703227
info@webac.de

www.webac.de

PU Injection Resins

WEBAC® PURseal M

Product Data

	Comp. A	Comp. B
Delivery form	990 kg 20.2 kg	1,200 kg 24.8 kg
Storage	• Between 5 °C and 30 °C • Protected from moisture • In original, sealed containers	

Occupational Safety

The safety regulations of the industrial trade associations and the WEBAC Safety Data Sheets are to be observed at all times when working with this product. Safety data sheets according to Regulation (EC) No. 1907/2006 (REACH) must be accessible to all persons responsible for occupational safety, health protection and the handling of materials. For further information, please see the separate information sheet "Occupational Safety" in our product catalog or www.webac-grouts.com.

Waste Disposal

In Germany, empty containers can be disposed of via "Interzero Circular Solutions Germany GmbH" observing the respective terms and conditions. It is not possible to dispose of containers at production facilities or delivery warehouses. For more detailed information, please see the separate information sheet “Disposal Notes“ in our product catalog or www.webac-grouts.com and the safety data sheets.

WEBAC-Chemie GmbH
Fahrenberg 22
22885 Barsbüttel
Germany
Tel. +49 40 67057-0
Fax +49 40 6703227
info@webac.de

www.webac.de