

## ***PSGi GeogROUT 1***

### **Properties:**

*PSGi GeogROUT 1* is a single component injection system based on a nanometric colloidal silica suspension.

The gel time can be adjusted by adding the *PSGi GeogROUT SIL* catalyst to component A. Due to the hydrophilic nature of the product it can also be used on wet surfaces. The processing equipment can be cleaned with water.

*PSGi GeogROUT 1* was developed for the stabilization of sand and mud layers and for injection into fine rock joints and cracks. The product is particularly suitable for:

- Pre-injection in tunnel construction
- Mine sealing and stabilization
- Sloping rock stabilization
- Soil improvement
- Sealing of existing tunnel structures

### Advantages:

- very low viscosity
- adjustable gel time
- good adhesion to wet surfaces
- Application temperature between 5 and 40°C
- Mixing and pumping plants as for cement injections
- non-aggressive, environmentally friendly, solvent free
- contains no toxic substances

### **Technical Data:**

#### Component Data:

##### *PSGi GeogROUT 1 Component A*

Color	clear
Specific Density (20°C)	1,1 g/ml
Dynamic Viscosity (20°C)	10 mPas
pH Value (20°C)	9 - 11

##### *PSGi GeogROUT SIL catalyst*

Color	clear
Specific Density (20°C)	1,07 g/ml
Dynamic Viscosity (20°C)	1 mPas
pH Value (20°C)	7

#### Mix:

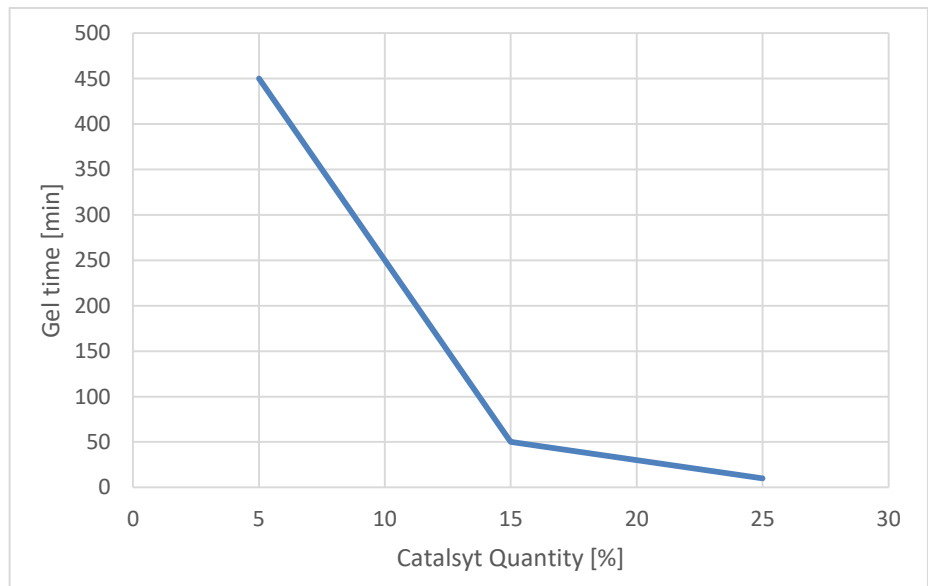
Specific Density (20°C)	1,1 g/ml
Dynamic Viscosity (20°C)	10 mPas
pH Value (20°C)	9 - 10

### **Application:**

The catalyst is added to component A during its mixing.

The mixture is injected into the layer by means of a single-component pump, as used for cement injections, through a packaging system. If a two-component pump is used, a static mixer must be used to achieve good mixing of component A with the catalyst.

The gel time depends on the amount of catalyst and temperature. It can be set between 10 minutes and several hours (see diagram).



**Safety Indications:**

*PSGi GeogROUT 1* and *PSGi GeogROUT SIL* catalyst are classified as non-hazardous according to Regulation (EC) No 1272/2008 (CLP). Even in the case of products that do not have to be labelled, the usual precautionary measures for chemicals must be observed.

Before use, it is therefore necessary to check the information in the safety data sheet in addition to the technical data sheet.

**Packaging:**

<i>PSGi GeogROUT 1</i> Componente A	220 kg barrel 1100 kg IBC
<i>PSGi GeogROUT SIL</i> catalyst	26,75 kg can

**Storage:**

At least 12 (twelve) months from the date of manufacture in the original sealed containers in well-ventilated rooms at a temperature between +10°C and +25°C.

Legal storage conditions must be observed. When using products stored for long periods of time, it is recommended to check with TPH the actual characteristics of the product according to the specification before use.

**Disposal:**

Small quantities of cured product residues can be disposed of as normal domestic waste. Dispose of not cured product components must be effected in accordance with the corresponding local regulations. For further information please refer to the material safety data sheets.

**Test certificates:**

Basic test on chemical injection material with the designation *PSGi GeogROUT 1* according to ÖBB construction contract B13047, part B/3.2.2 annex 02; Materialprüfanstalt HARTL Wolkersdorf 2020



**Legal Notice:**

The correct and thus successful application of our products is not subject to our control. A guarantee can be issued for the quality of our products within the framework of our sales and supply conditions, however not for successful processing. All data and specifications in this specification sheet are based on the present state of the art and the right to changes and adaptations for the sake of development remains explicitly reserved. The consumption specifications designated by us can be only average empirical values, where deviations are possible on an individual basis and therefore cannot be excluded by us.

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**TPH.**  
*Waterproofing Systems*