

## POLYMER SP

### TECHNICAL DATA SHEET

Exclusively produced by



### Application area

Scope of application: excavation of various types of tunnels with mechanized tunnel boring complexes in particularly difficult geological conditions (cohesive soils, water content, etc.), as well as in seismic areas.

Polymer SP is a unique multifunctional additive, specially designed for use in solutions mixtures required for injection behind the lining of tunnels in order to ensure the prevention of subsidence of the earth's surface, ensuring uniform transfer of rock pressure to the tunnel lining, maintaining the lining rings in the design position, increasing the water resistance of the lining for a period of the tunnel operation.

Polymer SP is designed to regulate and maintain specified parameters of the solution such as viscosity, water separation, degree of hydration and shrinkage of the solution.

The uniqueness of the technologies used in the production of the material is based on advanced scientific and engineering developments, which allows achieving the highest results during operation.

The product is developed taking into account the geological, hydrogeological and climatic conditions of the region of application.

### Description and technical specifications

Appearance	Granular Powder
Color	White
Specific Gravity	1520 kg/m <sup>3</sup>
Solubility in Water @ 20°C	Dispersible
Purity, weight (%)	≥ 95.0
Water gain	3 %
Particle Size	3% max retained on 25 mesh screen
Fluid Loss (mL)	≤ 15

The setting time of the mortar with the addition of Polymer SP ensures that the construction gap is filled in full and prevents the mortar from sticking to the shield shell and brush seals.

The mobility of the mixture using Polymer SP corresponds to the conditions for transporting the solution prepared at the mortar unit to the face.

## Safety

Polymer SP is not classified as harmful to the environment and does not contain hazardous substances in concentrations exceeding threshold values.

In terms of the degree of impact on the human body, Polymer SP is classified as a low-hazard harmful substance.

Polymer SP is non-self-igniting and non-explosive.

Bioassay information is available upon request. Handle as an industrial chemical, wearing protective equipment and observing the precautions as described on the Transportation and Material Safety Data Sheet (MSDS).

## Packaging and Storage

Polymer SP is supplied in Big Bags of 1500 kg.

Polymer SP shall be stored and transported in containers under conditions that prevent the possibility of spillage or getting wet.

Store in a dry location away from sources of heat or ignition, and minimize dust.



The information contained herein is based on data considered accurate with representative samples. However, no warranty is expressed or implied regarding the accuracy of this data or the results to be obtained from the use thereof. The above data does not imply specifications for this product. Maple Toos Anis Inc. assumes no responsibility for personal injury or property damage to vendees, users or third parties, caused by the material. Such vendees or users assume all risks associated with the use of the material. Consult the Material Safety Data Sheet before using this product.