

## **Technical Data Sheet**

### **Kratasol Flowret (grades A and B)**

#### **Slump loss retention agent**

Kratasol Flowret – high effective slump loss retention agent based on polycarboxylates.

#### **Applications**

Kratasol Flowret – component of admixtures for regulation of the slump life of concrete mix. Kratasol Flowret can be used as basis of plasticizing, water-reducing admixtures, which increases slump life. Kratasol Flowret – basis of admixtures for the ready-mix concrete. Kratasol Flowret – high effective component of the self-compacting concrete.

#### **Advantages**

- Retention of concrete workability over a long period (more than 2 hours)
- High initial strength of concrete
- Good compatibility with different cements
- No significant influence on setting time
- Possibility to adjust the concrete workability by simultaneous usage of Kratasol Flowret grade A and Kratasol Flowret grade B
- Excellent compatibility with water reducing polycarboxylates (Kratasol Flowcast) allows to achieve high slump life and concrete strength.

## Technical specification

	<b>grade A</b>	<b>grade B</b>
Appearance	from yellow to brown homogeneous liquid, some opalescence is allowed	
Solid content, % wt.	49-51	49-50
Viscosity, cPs at 23°C (Brookfield #3, 50 rpm)	370-570	350-550
pH	4,5±1	4,5±1
Specific gravity, g/cm <sup>3</sup> , (at 20°C)	More than 1,09	More than 1,09

## Recommendations for use

Kratasol Flowret – highly concentrated polycarboxylate aqueous solution (50 % wt.). It is recommended to dilute product (to 15-30 % wt.) before usage. Preservation of the diluted product is recommended.

To control the air content in the concrete we recommend to use the defoamer.

It should be noted that Kratasol Flowret can increase slump:

Kratasol Flowret grade A – on 20-50 mm form initial slump during 30-60 min  
Kpapaool Flowret grade B – on 30-70 mm form initial slump during 40-80 min

For concrete workability for 3 hours and more use Kratasol Flowret grade B. The best results can be achieved by combination of Kratasol Flowret grade A and grade B. Kratasol Flowret grade A/ Kratasol Flowret grade B ratio depends on required concrete workability, and on concrete components (cement, aggregates, etc.). It should be noted that Kratasol Flowret grade B has lower (by 5-10 %) water reduction than Kratasol Flowret grade A.

We recommend simultaneous usage of Kratasol Flowret and Kratasol Flowcast for the water reduction increasing. Check the right Kratasol Flowret A/Kratasol Flowcast ratio by lab tests (depending on required concrete workability and concrete components).

Admixture should be add to concrete mix with water (preferably with final third part of the mixing water). Do not blend the admixture with dry mix. Give sufficient time for mixing with concrete for the equitable distribution of the admixture.

Recommended dosage (for slump life increasing) – 0,1÷0,3 % of admixture solid content on cement weight . The range of recommended dosages can be expanded. Optimal dosage should be determined by lab tests. Admixture overdose should be prevented. Kratasol Flowret dosage depends on:

- cement chemistry;
- required concrete workability
- aggregates (clay content and others);
- concrete recipe.

### **Storage**

Admixture should be stored at +15÷+30°C. Keep containers closed when not in use. Admixtures containers should be protected from sunlight and any heat sources. Improper storage can change admixture physical properties and usefulness. Compliance the storage conditions allow to keep admixture during 6 months from the production date.

See the Safety Data Sheet for detail information on safety-related issues.

This information is based on our knowledge and experience at right product storage and usage. Nothing herein is to be guaranteed product properties whether expressed or implied. The customer should test and inspect the goods to determine the applicability of such information or the suitability of any products for their own practical purpose.

## Technical Data Sheet

### Kratasol Flowret grade V

#### Slump loss retention agent

Kratasol Flowret grade V – high effective slump loss retention agent based on polycarboxylates.

#### Applications

Kratasol Flowret grade V – component of admixtures for regulation of the slump life of concrete mix. Kratasol Flowret grade V can be used as component of plasticizing, water-reducing admixtures, which increases slump life. Kratasol Flowret grade V – basis of admixtures for the ready-mix concrete. Kratasol Flowret grade V – high effective component of the self-compacting concrete.

#### Advantages

- Retention of concrete workability over a long period (more than 2 hours)
- High initial strength of concrete
- Good compatibility with different cements
- No significant influence on setting time
- Excellent compatibility with water reducing polycarboxylates (Kratasol Flowcast, Kratasol Flowcast NP) allows to achieve high slump life and concrete strength.

#### Technical specification

	<b>grade V</b>
Appearance	from yellow to brown homogeneous liquid, some opalescence is allowed
Solid content, % wt.	49-51
Viscosity, cPs at 23°C (Brookfield #3, 50 rpm)	370-600
pH	4,5±1
Specific gravity, g/cm <sup>3</sup> , (at 20°C)	More than 1,09

#### Recommendations for use

Kratasol Flowret grade V – highly concentrated polycarboxylate aqueous solution (50 % wt.). It is recommended to dilute product (to 15-30 % wt.) before usage. Preservation of the diluted product is recommended.

To control the air content in the concrete we recommend to use the deformer. It should be noted that Kratasol Flowret grade V can increase slump:

Kratasol Flowret grade V – on 30-60 mm form initial slump during 30-60 min

We recommend simultaneous usage of Kratasol Flowret grade V and Kratasol Flowcast (Kratasol Flowcast NP) for the water reduction increasing. Check the right Kratasol Flowret grade V/Kratasol Flowcast (Kratasol Flowcast NP) ratio, nature and quantity of defoamer by lab tests (depending on required concrete workability and concrete components).

Admixture should be add to concrete mix with water (preferably with final third part of the mixing water). Do not blend the admixture with dry mix. Give sufficient time for mixing with concrete for the equitable distribution of the admixture.

Recommended dosage (for slump life increasing) – 0,1÷0,3 % of admixture solid content on cement weight. The range of recommended dosages can be expanded. Optimal dosage should be determined by lab tests. Admixture overdose should be prevented. Kratasol Flowret grade V dosage depends on:

- cement chemistry;
- required concrete workability
- aggregates (clay content and others);
- concrete recipe.

### **Transportation and Storage**

Temperature of the product during transportation should be not less than 10°C and high than 35°C.

Admixture should be stored at +15÷+30°C. Keep containers closed when not in use. Admixtures containers should be protected from sunlight and any heat sources. Improper storage can change admixture physical properties and usefulness. Compliance the storage conditions allow to keep admixture during 6 months from the production date.

See the Safety Data Sheet for detail information on safety-related issues.

This information is based on our knowledge and experience at right product storage and usage. Nothing herein is to be guaranteed product properties whether expressed or implied. The customer should test and inspect the goods to determine the applicability of such information or the suitability of any products for their own practical purpose.