Supaflo PC790ST

High performance early strength concrete hyperplasticiser



Description

Supaflo PC790ST is a high performance super plasticising admixture based on polycarboxylic polymers with long chains specially designed to enable the water content of the concrete to perform more effectively.

This effect can be used in high strength concrete and flowable concrete mixes, to achieve highest concrete durability and performance.

Applications

- ▲ Self compacting concrete.
- ▲ Structures with congested reinforcement.
- → High strength and high performance concrete.
- ▲ Pre-cast concrete.
- ▲ Improved cohesion allow for use in mass concrete pours and piling.

Advantages

- ▲ Optimises cement utilization.
- ▲ High density and impermeable concrete through very high water reduction.
- ▲ Improves shrinkage and creep behaviors.
- ▲ Minimises segregation and bleeding problems by improving cohesion.
- ▲ Higher early and ultimate compressive strengths.
- ▲ Increases durability and resistance to aggressive atmospheric conditions thorough reduced permeability.

Compatibility

Supaflo PC790ST can be used with all types of Portland cement and cement replacement materials. Supaflo PC790ST should not be used in conjunction with other admixtures unless DCP technical department approval is obtained.

Standards

Supaflo PC790ST complies with ASTM C494, Type E.

Method of Use

Supaflo PC790ST should be added to the concrete with the mixing water to achieve optimum performance.

Technical Properties @ 25°C:

Colour: Brownish to yellowish liquid

Specific gravity: 1.09 ± 0.02

pH: 6 - 7

Chloride content: Nil

An automatic dispenser should be used to dispense the correct quantity of Supaflo PC790ST to the concrete mix.

Dosage

The guidance dosage of Supaflo PC790ST is 0.4 - 2.0 litre per 100 kg of cementitious materials in the mix, including GGBFS, PFA or microsilica.

Representative trials should be conducted to determine the optimum dosage of Supaflo PC790ST to meet the performance requirements by using the materials and conditions in actual use.

Effects of Over Dosage

Over dosing of Supaflo PC790ST will cause the following:

▲ Significant increase in retardation.

Ultimate concrete strength will not be adversely affected and will generally be increased provided that proper concrete curing is maintained.

Cleaning

Supaflo PC790ST can be washed with fresh cold water.

Packaging

Supaflo PC790ST is available in 20, 225 kg drums and 1000 litre bulks supply.

Storage

Supaflo PC790ST has a shelf life of 12 months from date of manufacture if stored at temperatures between 2°C and 50°C.

Supaflo PC790ST

If these conditions are exceeded, DCP Technical Department should be contacted for advice.

Cautions

Health and Safety

Supaflo PC790ST is not classified as hazardous material. Supaflo PC790ST should not come into contact with skin and eyes.

In case of contact with eyes wash immediately with plenty of water and seek medical advice promptly.

For further information refer to the Material Safety Data Sheet.

Fire

Supaflo PC790ST is nonflammable.

More from Don Construction Products

A wide range of construction chemical products are manufactured by DCP which include:

- ▲ Concrete admixtures.
- ▲ Surface treatments
- ▲ Grouts and anchors.
- Concrete repair.
- ▲ Flooring systems.
- ▲ Protective coatings.
- ▲ Sealants.
- ▲ Waterproofing.
- ▲ Adhesives.
- ▲ Tile adhesives and grouts.
- ▲ Building products.
- ▲ Structural strengthening.