TECHNICAL DATA SHEET

TriStar PCE WR50

A HRWR - High Range Water Reducer PolyCarboxylate Ether (PCE) Polymer

TriStar PCE WR50 is a comb-type Polycarboxylate Ether Polymer, with superior dispersing ability to cement, which can significantly enhance the workability of concrete mix.

TriStar PCE WR50 is a base material for third-generation superplasticizer/concrete admixture. The product features:

- High water reducing ability
- high initial workability
- regular retention workability
- Superior dispersing ability and generate extremely fluid concrete
- High compatibility with cements and mineral admixtures
- Preferable compatibility with materials- containing high content of powder or clay
- Good surface appearance of concrete

Advantages:

- Cost-saving through enhancing performance
- · Generate self-filling concrete by creating high fluidity
- High durability through increased strength
- High strength concrete with low W/C

Specifications:

Property	Value	Method
Appearance	White to Light Yellow Liquid	Visual
Concentration	Min 50%	160°C for 20min
pH (undiluted)	2 -5.5	Stock solution
Specific Gravity	1.085-1.12	Hydrometer, 25°C
Viscosity	450-1000	25°C, No.3, 60rpm

Application:

- Raw material for PCE type superplasticizers blending
- High strength concrete
- Pre-cast concrete
- High fluidity concrete
- General strength concrete
- Concrete for high-rise building and complex structures





Recommended Usage:

The Product has a recommended dosage range of 0.3-1.0 liters/100kgs of binders on a basis of undiluted solution. We recommend to dilute it as your application. The optimum dosage of the Product may depend on specific requirements of concrete properties and materials. It can be determined by trials using the materials and conditions.

Side effects of Overdosing:

Overdosing can cause the segregation of concrete materials and thus the strength of concrete may become severely lower than the target value.

Compatibility:

All our PCE product line is well compatible with each other. To achieve either higher water reduction or longer retention, proper blending with other type of PCE is recommended to achieve demanding result. The product is compatible with LignoSulfonate-based plasticizers, but NOT compatible with SNF based ones.

Storage & Handling

The Product should be stored at room temperature and should be avoided from direct sunlight. If stored in original unopened container, it will have a shelf life of twelve (12) months. If product is frozen, please agitate it slowly until it melts again.

Packing

Bulk (21,000Kgs/Flexi Tank) or 1,100 Kgs/IBC

Precautions

The Product contains no hazardous materials and is completely transport class free. However, it is recommended to use standard handling procedures with the product. Wear gloves and eye protection and was splashes to the skin with soap and water at the end of shifts or at breaks. For more information, please refer to the Material Safety Data Sheet.

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