

# Teknorep 520 Ex

### Natural Hydraulic Lime Based Mortar



### **Product Description**

Based on hydraulic lime, designed for historical buildings, containing harmless natural minerals, fibers, It is a thixotropic mortar. Cement and soluble salts (alkalis, sulfates, chlorines and nitrates).

### **Areas of Usage**

- · Restoration or strengthening of historic masonry structures,
- · Repair or re-construction of cashew domes and vaults,
- The foundation of the present historical masonry walls,
- · Used for filling large gaps,
- · Repair works for the restoration of lost carrying capacity of stone, brick or foam walls,
- Constructed of stone, brick or alluvial attachments to be used for repair or reinforcement.
- It is a repair mortar used for the placement of carbon bars in wall joints.

## Features and Benefits

- · Easy to apply
- Cement-free
- · High adhesion strength
- Mechanical strength is high.
- Flowering resistance is high.
- Water vapor has a high permeability, it can breathe.
- Easy and rapid applicable.
- Contains no water soluble salts.
- Low capillary has water absorption properties.

### Application Instructions

Surface Quality: Surfaces should be clean, smooth, free from all kinds of dust, oil, dirt, rust, mould oil, detergents, etc. Weak Parts on the surface should be removed.

Surface Preparation: Absorbent surfaces should be wetted in advance, but no accumulation of water should be left.

Mixing: The required amount of water is put in a clean mixing bucket with the help of a scale of 16 kg Kraft bag (water is  $^{\sim}4,0$  kg) an the TEKNOREP 520 EX mortar is gradually added and mixed with a mixer of 400-500 rpm for approximately 4 minutes.

The prepared mortar is applied with trowel to the previously dampened surface. Application in applications to be made in more than once layer, after the hardening of the previous layer, application should be made so that each layer is up to 5 cm thick. Before applying the new layer, the previous layer should be dampened.

In screed and concrete-like applications, the fresh mortar is washed clean by 30-35% by weight and the grain size can be added to the aggregates ranging from 1-2 mm.

## Application Notes / Restrictions

- In outdoor applications, the sun should be protected from rain and frost for the first 3 hours.
- Reaction times are affected by ambient and ground temperatures. The reaction times are shortened in the hot place and the cold place is prolonged.
- · Warm water should be used in cold places.
- Iced mixture water should be used in hot places.



- During the application of the product, work clothes must be worn and appropriate glasses and masks must be worn in accordance with the occupationa healthand safety regulations.
- After application, it should be protected against adverse weather conditions such as direct sunlight, severe wind, high air temperature (above +35°C), rain and frost. The products should be cleaned with water and detergent before it gets cured.
- Immediately after application, equipment should be cleaned with water before curing. After the product has hardened, it should be cleaned by mechanical methods.

#### **Technical Data**

General Information				
Material Structure	Special blend with natural hydrualic lime based and adjusted gradients			
Appearance	Off-white and White coffee			
Shelf Life	12 months in dry place in unopened packaging.			
Package	16 kg kraft bag			
Application Information				
Implementation Process	Min. 30 minutes			
Application Ground Temperature	(+5°C) - (+35°C)			
Grain Size	d <sub>max</sub> :8 mm			
Application Thickness	Each storey 1 - 5 cm			
Performance Information				
Deflexion Strength	> 2,0 N/mm²			
Compressive Strength (EN 1015-11)	≥ 16 N/mm <sup>2</sup>			
Water Vapor Permeability (EN 1745)	µ<35			
Capillary Water Absorption (EN 1015-18)	0,2 kg m <sup>-2</sup> dk -0,5			
Bond Strength	>0,15 N/mm²			
Reaction to Fire	A1			

### **Consumption Table**

Teknorep 520	Mixture Density (kg/litre)	1 cm/1 m <sup>2</sup> Powder Consumption (kg)	Amount of Mixture Water (litre)
16 kg kraft bag	1,90	15	~4,0

Technical data are approximate values obtained from the laboratory study of Tekno Construction Chemicals for finished products obtained at +20°C air temperature and 50% relative air humidity and valid for its performance after 28 days.