

# PLAM ROCK

## Thixotropic cement mixture for decorative mortars

### DESCRIPTION

Plam Rock Isoplam® is a premixed fiber-reinforced product made of concrete, selected aggregates, oxides and additives; it is used to prepare high thickness thixotropic mortars and it can be both kneaded manually or stamped with Isoplam® rubber mats.

It is possible to shape it into fake rocks, stones, wood and scenic elements of various kind.

### FIELDS OF USE

Plam Rock Isoplam® is very appreciated in all those environments where already existing vertical and horizontal elements have to be aesthetically enhanced, and it is widely used in the civil sector (to coat fireplaces, columns, walls ...) as well as in sales areas (walls of showrooms, shops, offices, etc.).

It is even more appreciated in all those places where the creation of important scenic structures is required (theme parks, water parks, gardens, bars and restaurants, etc.).

### TECHNICAL FEATURES & PERFORMANCES

The product Plam Rock Isoplam® conforms to UNI EN 998-1:2010 standards.

<i>Performance feature</i>	<i>Test method</i>	<i>Product performance</i>
Reaction to fire	-	A1
Water absorption	UNI EN 1015-18:2004	W2
Water permeability	-	NPD
Vapor permeability	UNI EN 1015-19:2008	46 $\mu$ , 17,4 $\mu$
Adhesion	UNI EN 1015-12:2002	1,48 N/mm <sup>2</sup>
Adhesion after cycles of ageing and freeze-thaw	UNI EN 1015-21:2004	1,22 N/mm <sup>2</sup> on concrete slab
Thermal conductivity / Density	-	0,54 [W/(m·K)]
Thermal conductivity	-	NPD
Durability of one coat	-	NPD
Durability of several coats	-	NPD
VOC emissions	UNI EN ISO 16000-9:2006	A+
Bending strength	UNI EN 1015-11:2007	5,44 N/mm <sup>2</sup>
Compressive strength	UNI EN 1015-11:2007	16,14 N/mm <sup>2</sup>
Hydraulic shrinkage	UNI 11307:2008	ε 0,0011 at 90 days
Sound absorption	UNI EN ISO 11654:1998	0,40

## ADVANTAGES

The mortar made with Plam Rock Isoplam®:

- is easy to use and is very ductile;
- is suitable for both internal and external projects;
- can be used also in marine environments and at high altitudes;
- allows to realize high thickness without having to be applied in several steps;
- has a high degree of impermeability;
- has excellent resistance to impacts;
- has a good adhesion strength.

## SUPPORT PREPARATION

The substrate must be cleaned from oils, resins, dirt, wax, efflorescence and must be well cohesive and not friable. Existing paint on the surface must be removed by sanding. Roughen support when possible. Fill any cracks or holes with Isoplam® Ipm Epoxy Kit, observing carefully any structural joints.

Where necessary, you may lay a rough coat with sand and cement.

The support must be previously reinforced: under "normal" conditions, you must apply Isoplam® Fiberglass Network or Isoplam® Plam Brick Net in clay; in case of significant size realizations, you must apply galvanized wire mesh on especially created supports. In both these cases, the net will be anchored to the surface and drowned in the mortar.

In case the support is particularly porous, or in case of high temperatures or with windy weather, you must moisten the surface just before the application of Plam Rock Isoplam® in order to avoid the rapid absorption of the water contained in the mortar and its rapid drying.

Treat the support (especially if it is smooth concrete) with specific Isoplam® primers.

The inadequate preparation of the surface can affect the adhesion of the mortar.

Plam Rock Isoplam® does not apply to plaster, metal, wood (blocks and panels) and to too damp walls. It is applicable on certain types of polystyrene: please check our technicians before applying on this kind of surfaces.

## APPLICATION

In a cement mixer or by hand (avoid larger concrete mixers), prepare the mortar with Plam Rock Isoplam® thoroughly mixed with 4-7 liters of clean water. The amount of water must be constant in order to avoid differences in color.

The obtained mortar should be used within one hour.

Once applied, the mortar should be shaped with a professional Trowel Isoplam® and then stamped with Isoplam® mats for walls (making sure to moisten them with Plam Liquid Rele Isoplam®) or cut with a Correction Kit Isoplam® until you reach the desired effect.

Plam Rock Isoplam® can be kneaded when still fresh or, at most, within 18-24 hours after the application, depending on the weather conditions.

You can obtain variable thicknesses, from 1 cm to 8 cm.

Within a couple of days, if required, you can color the plaster with Isoplam® Plam Wax or Isoplam® Plam Paint.

Protect the surface with a water-based protection (Plam Wax Neutral Isoplam®, Plamacryl Isoplam®, Plam Pol Water Isoplam®, IDROREP/A Isoplam®) or solvent-based protection (Plam Sealing Isoplam®, Plam Pol Isoplam®): always consult Isoplam's Technical Office for the choice of the most suitable protection.

Note: The hardening time depends on the support, the thickness of the mortar and the environmental conditions.

It is important to pay attention to the climatic and atmospheric conditions: avoid the application of Isoplam® Plam Rock with a windy weather, during the hottest hours of the day (in summer), under the summer sun (in this case make sure to keep the plaster's surface wet for a couple of days) or with temperatures that are not between 5 °C and 30 °C. If applied indoor, you must avoid thermal shocks. These measures will prevent the formation of cracks and fissures.

## CONSUMPTION

12-13 Kg/m<sup>2</sup> for each 10 mm of thickness.

## PACKAGING & COLORATIONS

Isoplam® Plam Rock is packaged in sealed polyethylene double-layer bags of 25 kg and it is available in three colors: brown and white.

Upon request and for a minimum quantity of 1200 kg, Isoplam can supply customized colors.

## STORAGE, EXPIRY, WARRANTY AND SAFETY

Plam Rock Isoplam® is guaranteed for 10 months if stored in the original packaging in a dry and ventilated place, with temperatures no lower than 5 ° C).

The packaging date is shown on the package (the lot number indicates, in sequence, year / week / day). Isoplam® does not guarantee its products if mixed or overlapped with other similar products.

The quality of the raw materials used and Isoplam® production system are ensured by the ISO 9001:2008 quality system.

Consult the Safety Data Sheet before use.

**Each individual work must be completed using a single production lot, otherwise Isoplam Srl is not responsible for differences in color.**

### IMPORTANT:

The product PLAM ROCK is intended for the use as indicated above. Adding any other product will impair the final result. All information contained herein is based on the best practical experiences and laboratory research. It is the customer's responsibility to determine whether the product is suitable for the intended application. The manufacturer declines all responsibility on the results due to incorrect application of its products. The product shall always be tested on a small area before full scale application. This data sheet replaces all previous data sheets. ISOPLAM reserves the right to change the data on the data sheet at any time. PLAM ROCK is intended for professional use only. ISOPLAM provides frequent and on demand trainings for its customers. The use of ISOPLAM products without receiving the proper certification will be at the customer's own risk.