



## External/internal renders on stones and traditional clay bricks, mortar finishing, manual application

Natural hydraulic lime mortars are dedicated to natural substrates such as stone (hard or soft stones) or clay bricks. Their set and their strength don't damaged and protect the substrates and lime mortars are reversible in time.

*i.pro CENT% SOUS ENDUIT* and *i.design CENT% FINITION* range have been created especially for the natural substrates, for manual or mechanical applications. For a manual application, a first coat to prepare the substrate is recommended before the undercoat.

It exists in two versions: 1 for the undercoat and 1 for the finishing with different possibilities and 32 pigmented colors + 5 traditional colors (with natural sands).

### Mortar design

- Introduce a small amount of water in the mixer to clean the preceding mix
- Introduce the mortar and the rest of the water in the mixer
- Mix 3 to 5 minutes to obtain a perfect homogeneity without any lump or pellet

### Preparation of the substrate

- Roughen the joints or the old render. Apply, if necessary a primer to help the hanging of the new render. Wet the wall the day before the application until refusal.
- If the wall is powdery and friable, apply a lime wash without dampening the wall to harden the substrate, then place a galvanized metal lath before applying the render.
- Substrates must be clean before starting

### Application

It is recommended to apply traditionally in 3 coats.

- **1st coat:** Thickness of 1 to 5 mm. Its function is to help the 2d coat hanging to the substrate. The mortar shall contain a most important amount of binder. After application of the render, screed it and leave the surface rough to prepare the application of the second coat
- **2nd coat:** Thickness of 15 to 20 mm (including the first coat). The second coat guarantees the waterproofing of the wall and its flatness. Wait minimum 2 days between the application of the first coat and the second (7 days by wet and cold weather). Wet the first coat before the application of the second coat (the day before). The amount of binder in the mix should be less important as for the first coat. After application of the render, screed it and leave the surface rough to prepare the application of the second coat

- **Finishing plaster:** Thickness of 5 to 8 mm. This coat decorates and protects the wall at the same time. Wait 4 to 7 days between the application of the second coat and this last decorative one (2 weeks if the mortar is a pure lime mortar). Wet the second coat before the application of the finishing coat (the day before). The amount of binder in the mix should be less important as for the two previous coats. After application of the render, screed it and make the finishing aspect on fresh mortar or during the setting.

### Choice of finish

- **Crushed render:** Made in a fresh mortar with a float
- **Smooth:** Obtained on a fresh mortar with a trowel.
- **Rough render:** Made on a hard mortar (setting finished) with a scrapper.
- **Sponged render:** Made on a fresh mortar with a sponge float. Sand grains are cleaned. When setting starts, it's possible to work with a sponge to give an aged appearance to the render.
- **Raked plaster:** The finish is made on a dry mortar (after the setting) with a nail float

### Special care

Always protect the render from the wind, the rain and the sun during the application and also the setting (with a tarpaulin scaffold for example). Always close the shutters during the first days of the setting to guarantee a homogeneous colour.



## Indicated consumption (kg/m<sup>2</sup>/cm of thickness)

1 <sup>st</sup> coat	
Dry sand	10 to 18.5 kg
Mortar	<b>i.pro CHAUX SOCLI or i.pro RENOBAT</b>
Amount of mortar	3 to 6 kg
Water	5 to 10 litres

2 <sup>nd</sup> coat	
<b>i.pro CENT% SOUS ENDUIT</b>	16 kg

Finishing plaster	
<b>i.design CENT% FINITION colored</b>	16 kg
<b>i.design CENT% FINITION white sand</b>	13 kg
<b>i.design CENT% FINITION red and saffron sand</b>	11 kg
<b>i.design CENT% FINITION grey-pink and grey-white sand</b>	14 to 15 kg

## Indicated quantities

	1 <sup>st</sup> coat	2 <sup>nd</sup> coat	Finishing plaster
Mortar	<b>i.pro CHAUX SOCLI or i.pro RENOBAT</b>	<b>i.pro CENT% SOUS ENDUIT</b>	<b>i.design CENT% FINITION colored</b>
Amount of mortar	1 bag of 35 kg	1 bag of 30 kg	1 bag of 30 kg
Dry sand	11 to 13 buckets	/	/
Water	Around 20 litres	Around 3.5 to 4 litres	Around 4 to 5 litres

Or

	1 <sup>st</sup> coat	2 <sup>nd</sup> coat	Finishing plaster
Mortar	<b>i.pro CHAUX SOCLI or i.pro RENOBAT</b>	<b>i.pro CENT% SOUS ENDUIT</b>	<b>i.design CENT% FINITION white, red and grey-pink sand</b>
Amount of mortar	1 bag of 35 kg	1 bag of 30 kg	1 bag of 30 kg
Dry sand	11 to 13 buckets	/	/
Water	Around 20 litres	Around 3.5 to 4 litres	Around 4.5 to 5 litres

Or

	1 <sup>st</sup> coat	2 <sup>nd</sup> coat	Finishing plaster
Mortar	<b>i.pro CHAUX SOCLI or i.pro RENOBAT</b>	<b>i.pro CENT% SOUS ENDUIT</b>	<b>i.design CENT% FINITION saffron and grey-white sand</b>
Amount of mortar	1 bag of 35 kg	1 bag of 30 kg	1 bag of 30 kg
Dry sand	11 to 13 buckets	/	/
Water	Around 20 litres	Around 3.5 to 4 litres	Around 5.5 to 6 litres

## Why use a lime mortar?

- Well proven since many centuries, lime is now well known as the most suitable binder for the realization of renders
- Lime protects all types of substrates. It can be removed without damage. That's why lime is recommended in restoration
- Lime is a natural and eco-friendly product
- It allows movements of the buildings and avoids cracks inside the walls
- During and after the setting, lime mortars are permeable to air and waterproof. They allow the evaporation of the water and the walls "breathe"
- Lime mortars are easy to colour to obtain almost all the desired colours
- Finally lime mortars are easy to apply and sticky for a good adhesion.

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